

# National Health Accounts Pakistan 2007-08

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### **Foreword**

This report provides the second round of National Health Accounts (NHA) for Pakistan, compiled by the Pakistan Bureau of Statistics (PBS). Its reference year is 2007-08. The first round was released in 2010 for 2005-06. The third round with reference year 2009-10 is under preparation.

The PBS is responsible for the collection, compilation, descriptive analysis, publication and data dissemination of all sorts of national statistics through its regular surveys / censuses and through secondary data collected from various sources. PBS has taken initiative to collect data from all sources available in the country including Accountant General Pakistan Revenues (AGPR), its regional sub-offices, and provincial Accountant Generals. Also Securities Exchange Commission of Pakistan, Economic Affairs Division, provincial Employees Social Security Institutions, Military Accountant General, Ministry of Religious Affairs, Zakat and Usher and provincial Finance Departments have provided the requisite data for this report. I am thankful to them as well as to other stakeholders for facilitating supply of data to bring out this report.

For the second round, the autonomous bodies and corporations owned by federal or provincial government have also been covered in order to include them in their capacities as employers and as producers of health services in own facilities. In this round of NHA two additional surveys have been conducted especially for NHA: (i) A sub-sample of the Pakistan Social and Living Standards Measurement Survey was dedicated to specific questions of households' out-of-pocket (OOP) spending on health services. (ii) The private health care providers have been covered by a census for the big hospitals and a sample survey for the small providers. I am thankful to all respondents who have shared their data with PBS for this important endeavor.

I am also thankful to experts from German International Cooperation (GIZ) for valuable resources and inputs for producing such a comprehensive report and for partly funding data collection for the aforementioned surveys. It is hoped that this report will be useful for researchers, policymakers and other users of data on financing health services. It does not only provide the results of NHA as such but also the results of the surveys carried out especially for NHA.

PBS offers to provide more details of the results as given in this report if required by researchers and planners or any other kind of user. This especially holds for further research in out-of-pocket expenditures of private households by social indicators like sex, age, size and composition of households and the like (combination PSLM-Survey with the survey on out-of-pocket expenditures on micro data basis).

Suggestions for improvement of the report will be appreciated.

Sohail Ahmad Secretary / Chief Statistician

Government of Pakistan Ministry of Economic Affairs & Statistics Statistics Division Islamabad March, 2012

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# List of abbreviations

AGPR Accountant General Pakistan Revenues

ABs/C Autonomous Bodies / Corporations

BHUs Basic Health Units
CoA Chart of Accounts

CMHs Combined Military Hospitals

DAOs District Account Offices

DHQ District Headquarter Hospital EAD Economic Affairs Division

ESSI Employment Social Security Institution

FBR Federal Board of Revenue

FY Financial Year

GDP Gross Domestic Product

GIZ Deutsche Gesellschaft für Internationale Zusammenarbeit, German Intl. Cooperation

HIES Household Integrated Economic Survey

ICHA International Classification of Health Accounts

ILO International Labour Organization

ICT Islamabad Capital Territory
IMF International Monetary Fund

MCHC Maternal and Child Health Center

MoF Ministry of Finance

MoPW Ministry of Population Welfare

MoH Ministry of Health

NGOs Non-Government Organizations

NHA National Health Accounts

NPOs Non-profit Organizations (synonymous with non-profit institutions)

OECD Organization for Economic Co-operation and Development

OOP Out Of Pocket

PAOs Provincial Accounts Offices
PBS Pakistan Bureau of Statistics

PIFRA Project for Improvement in Financial Reporting and Auditing
PSLM Pakistan Social and Living Standards Measurement Survey

RoW Rest of the World

SECP Securities & Exchange Commission of Pakistan

SHA System of Health Accounts

TB Tuberculosis

WHO World Health Organisation

# **Executive Summary**

National Health Accounts (NHA) is a macro-economic accounting framework for revealing a country's aggregated expenditures on health. The compilation for Pakistan obeys international standards set by WHO and OECD, yet it is tailor made for the country as far as possible. This report presents the results for fiscal year 2007-08 which is the second round of such a compilation. The first one was done for fiscal year 2005-06; the third one for 2009-10 is in process.

The results for FY 2007-08 show that out of total health expenditures in Pakistan, 25% are funded ("financing sources") by government. Out of total government health expenditures, 35% are funded by the federal government where out of 10 Rupees 7 accrue from its civilian part and 3 from its military setup. Over 70% of the health expenditures are funded through private sector out of which 9 over 10 is out of pocket (OOP) health expenditures by private households.

For "financing agents" it is found that out of total health expenditures in Pakistan, 25.1% are made by general government. The private expenditures constitute 72% of total health expenditures in Pakistan, out of which 92% are households' out-of-pocket (OOP) health expenditures. Development partners/ donors organizations have 3% share in total health expenditures. Figure 1 shows the share of financing agents in total health expenditures of Pakistan for FY 2007-08.

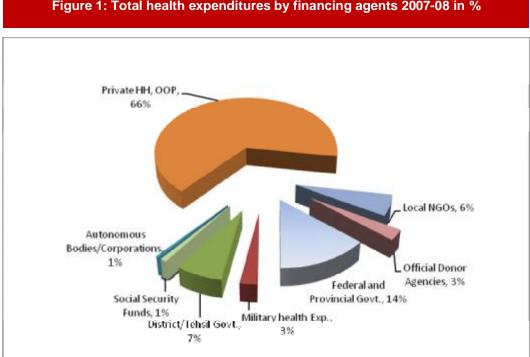


Figure 1: Total health expenditures by financing agents 2007-08 in %

The annual per capita health expenditures for Pakistan as per NHA 2007-08 are 35 US\$. This is much more than the figures which have been reported to WHO for their publication (22 US\$ as the average between 2007 and 2008). For comparison, the respective figures reported to WHO by India and Bangladesh are 41.5 US\$ and 17 US\$, respectively. The reason for deviation between WHO figures and NHA is that NHA includes a lot of components which the figures reported to WHO did not account for. The ratios of health expenditures according to NHA over GDP 2007-08 are 3.36% while public sector health expenditures according to NHA over government expenditures are 6.57%. The private sector health expenditures according to NHA over total private expenditures are 3.07%.

The first round of NHA for Pakistan could not cover the expenditures of autonomous bodies /corporations working under the administrative control of the federal/provincial governments. The results for 2007-08 show that they cater for 7.7% of the health care expenditure of the public sector. Moreover, it was found that the OOP health expenditures of private households had been understated in the first round. They had been calculated on the basis of HIES data which in Pakistan is the predominant survey on expenditures of private households. This survey includes questions on health expenditures, however in a row with a lot of other expenditures and uniformly having the last year as the reference and recall period. In its first round (2005-06) NHA made use of this information. For the second round it was considered to ask for health expenditures with a separate questionnaire, confined to a sub-sample of the HIES in order to gather more detailed and more disaggregated data on OOP spending on health.

Given the same deficiency in 2005-06 the results for OOP expenditures of the first round have to be enhanced by 43%. The following table shows results for 2005-06 which have accordingly been revised (enhanced) for OOP expenditures and for inclusion of the autonomous bodies. It enables to have a realistic picture of comparison between the two first rounds of NHA. In the second round of NHA the expenditures of the local NGOs involved in providing health services have also been covered. For improvement of comparison Table 1 includes an estimate for the local NGOs for 2005-06.

| Table 1: Total I | health expenditures 200 | )5-06 and 2007-08 by fir | nancing agents in million Rs |
|------------------|-------------------------|--------------------------|------------------------------|
|                  |                         |                          |                              |

|                                 | 2005-06*                    |                      |         | Change in %    |                      |  |
|---------------------------------|-----------------------------|----------------------|---------|----------------|----------------------|--|
|                                 | Current prices<br>(2005-06) | Prices of<br>2007-08 | 2007-08 | Current prices | Prices of<br>2007-08 |  |
| 1                               | 2                           | 3                    | 4       | 5              | 6                    |  |
| Federal Government              | 23,816                      | 28,460               | 27,664  | 16.2           | -2.8                 |  |
| Provincial Government           | 19,007                      | 22,713               | 27,757  | 46.0           | 22.2                 |  |
| District/Tehsil Government      | 14,215                      | 16,987               | 23,547  | 65.6           | 38.6                 |  |
| Social Security Funds           | 2,839*                      | 3,393                | 3,259   | 14.8           | -3.9                 |  |
| Autonomous Bodies/Corporation   | 1,450**                     | 1,733                | 1,725   | 19.0           | -0.4                 |  |
| Private health insurance        | 285*                        | 341                  | 523     | 83.5           | 53.6                 |  |
| Private households' OOP payment | 177,010*                    | 211,523              | 220,508 | 24.6           | 4.2                  |  |
| Local NGO's                     | 15,919**                    | 19,023               | 19,023  | 19.5           | 0.0                  |  |
| Official donor agencies         | 3,565                       | 4,260                | 9,626   | 170            | 126.0                |  |
| Total health expenditures       | 258,106*                    | 308,433              | 333,632 | 29.3           | 8.2                  |  |

<sup>\*</sup>Revised figures \*\*Estimated

It should be noted that the figures for both years reflect current prices. Therefore, the overall increase in health expenditures of 29% includes inflation of health care goods and services. If the figures for 2005-06 are inflated by the rate recorded for "Medicare" in the Consumer Price Index (19.50% for the average of 2007-08 over 2005-06) then the change of 2007-08 over 2005-06 (at prices of 2007-08) comes down to 8% (see columns 3 and 6 in Table 1). The share of OOP payments of private households over total health expenditures has come down from 68.6%

to 66.1%. This is a positive sign as this share is generally perceived as an indicator for a country's coverage of pooling the risk of illness.

In its second round, NHA has also improved by inclusion of data for the health care providers. The expenditures calculated from the providers' perspective were not covered in the first round of NHA 2005-06 while in the second round of NHA they are. This, however, was only possible by extrapolating backward the results of a census of big hospitals and a survey of the rest of health care providers for FY 2009-10. The big advantage of including data of the providers is to authenticate or reconcile data from the supply side of health related goods and services with the other information based on the demand side (private households, government and other financial agents). Benchmarking the data of financing agents and sources with those of providers follows the idea that health services cannot be stored and thus tautologically the health services produced for treatment of human beings must have been consumed and also must have been financed (if for this benchmarking export and import of goods and services related to health are neglected and if health expenditures are confined to the current ones).

Thus, theoretically the revenues of all health care providers must match the amount of funds spent for health care (if expenditures for capital formation are deducted). Actually, the results show that the health expenditures as per revenues of the health care providers (in total 294.8 billion Rs) are below the current expenditures of the financial agents and sources (315 billion Rs). Reasons for that are that some providers have not been covered by the survey (e.g. opticians, chemists, florists, taxi drivers etc.). Nevertheless, a small statistical discrepancy would remain. Matrix 2 (page 27) of this report specifies the connection between agents and providers in more detail. During the next round it is expected that the gap narrows as the margin of errors from retropolating the survey results will decrease.

Despite of its name "National" Health Accounts, NHA also provides figures for the four provinces Punjab, Sindh, Khyber-Pakhtunkhwa and Balochistan. It is not fully comprehensive as the total health expenditures for the provinces do not sum up to the national total. For empirical reasons only 315 billion Rs of Pakistan's total health expenditures could be allocated to the provinces ("regionalized"). Overall, the results for the provinces in Chapter 3 of this report show that the shares of financing agents of the health expenditures are relatively heterogeneous between different provinces.

This report provides the results of censuses and surveys triggered through NHA, also:

- Census of private health care providers (only hospitals with 50 beds and more)
   2009-10
- Sample survey of private health care providers (including hospitals with less than 50 beds and rest of other health care providers) 2009-10
- Sample survey on OOP expenditures of private households 2009-10
- Census of autonomous bodies/corporations 2007-08

NHA Pakistan estimates for the year 2007-08 are based on the concepts, accounting framework and guidelines of WHO. The compiled accounts are also internationally comparable, as NHA Pakistan has adopted the International Classification of Health Accounts (ICHA) of WHO. The annexures provide abbreviated versions.

## 1 Introduction

#### 1.1 Scope, purpose and limits of health accounts

The definition recommended for developing countries by WHO for health expenditures is as follows:

"National health expenditure encompasses all expenditures for activities whose primary purpose is to restore, improve, and maintain health for the nation and for individuals during a defined period of time". Health expenditures in the context of NHA as well as in the context of this report stand for inclusion of the health care functions under classification codes HC.1 to HC.7 plus capital formation by health care providers (HC.R.1). For details see Annexure 9 of this report.

NHA Pakistan comprises of the health expenditures for the four provinces (Punjab, Sindh, Khyber-Pakhtunkhwa and Balochistan) and federal health expenditures, which amounts to the national health expenditures. NHA Pakistan shows health expenditure for and of Pakistani citizens and residents as well as spending by external agencies, like bilateral donor agencies and UN offices, on inputs to health care in Pakistan. This means that NHA Pakistan:

#### Includes:

- ■Health expenditures by citizens and residents temporarily abroad
- ■Donor spending (both cash and in-kind) whose primary purpose is the production of health and health-related goods and services in Pakistan

#### Excludes:

- ■Health spending by foreign nationals on health care in Pakistan (as NHA treats this as export of health care services and does not include in NHA estimation) in Pakistan
- ■Donor spending on the planning and administration of such health care assistance

It is recommended that NHA should use the accrual method in accounting for expenditures, not the cash method. This would mean that expenditures are related to the time period during which the actual activity takes place. The accrual method uses the expenditures, which are attributed to the time period during which the economic value was created whereas the cash method refers to the expenditures, which are registered when the actual cash disbursements take place. However, the data situation in Pakistan does not yet allow for application of the accrual method. For the time being the figures presented for Pakistan's NHA are cash-based.

The first round of NHA for Pakistan was dedicated to FY 2005-06. According to advice from the WHO the scope of tables for the first round was limited. While in the second round of NHA, besides the updated information on previous tables it contains information on the dimension of health care providers as well. More comprehensive NHA will be available in the third round as it is a cumbersome task to collect data on all the required entities, though the preliminary and partial NHA reports would be published time to time as per availability of data.

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<sup>&</sup>lt;sup>1</sup> World Health Organization, 2003, Guide to Producing National Health Accounts: with special applications for low-income and middle-income countries, pp. 20.

It is hoped that NHA in Pakistan would be a milestone towards the evidence based policy making in health sector.

The primary aim of developing NHA framework for Pakistan is to ...

- To describe the flow of funds, sources and uses of funds in the health care system,
- To map out the profile of the health care system,
- To build and enhance sustainable capacity for NHA in PBS.

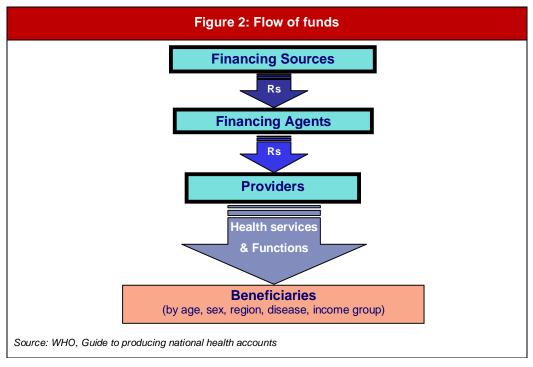
One of the objectives of NHA is to give the comprehensive picture of health care spending in the country and to show the flow of funds dedicated to health expenditure in an overall, comprehensive and self-checking accounting framework of internationally agreed standards (see Figure 2).

NHA is a standard set of matrices, or tables, that presents various aspects of a nation's health expenditures and deals with the questions like, (i) who is financing health care in a particular country?; (ii) how much do they spend? and (iii) on what type of services? This globally accepted tool based upon the expenditure review approach, highlights the "financial health" of national health systems in respective country<sup>2</sup>.

NHA identifies and tracks health sector financing sources and uses both, public and private, to support developing the health policy and to monitor it. NHA on the one side shows the flow of funds from financing sources to financing agents to providers and on the other side the function on which the expenditure were made and also the beneficiaries of those expenditures (although it requires some further information). In that way, NHA estimates total health expenditures in the country, identifies all the important actors in the health sector and their respective contribution in the health sector of the country.

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<sup>&</sup>lt;sup>2</sup>World Health Organization, 2003



NHA is designed particularly as a tool for improving the capacity of health sector planners to manage their health systems. The NHA methodology organizes and presents health spending information in a manner that even those who do not have a background in economics or statistics can easily understand and interpret the results. It allows policy makers to understand how resources are used in a health system and to assess the efficiency of resource used (if NHA is combined with other data sets) and to evaluate impact of health reforms on different stake holders i.e. who are the beneficiaries of health expenditures, poor or rich?

NHA have a vital role in devising a better informed and more participatory policy and health sector reforms and developing a more equitable and sustainable health financing system in the country. Figure 3 shows how NHA can be linked to the health policy questions. NHA also allows for comparisons of health expenditures at different points in time as well as the cross country comparisons where data is available.

#### Figure 3: NHA links to health policy Health policy decision Flow of resources in Some key policy questions health financing areas How are resources mobilized? Financing Sources Resource mobilization / Who pays? Who finances? financing strategies Under what scheme? How are resources managed? **Financing Agents** Pooling arrangements What is the financing structure? Cost recovery regulation What pooling arrangements? of payers What payment / purchasing arrangements? Inputs, Providers, Financial incentives Who provides what services? **Functions** Under what financing arrange-Subsidies Resource Allocation ments? Provider regulation With what inputs? Targeting redistributive Important distributions Who benefits? policies e.g. age, gender, location, Who receives what? social status How are resources distributed?

Source: National Health Accounts Trainer Manual 2004

Financing Sources are institutions or entities that provide the funds used in the system by Financing Agents. In Pakistan, the Financing Sources would typically include the Federal Government, Provincial Governments, donors, NGOs, insurance companies, and households.

Financing Agents include institutions or entities that channel the funds provided by Financing Sources and use those funds to pay for, or purchase, the activities inside the health accounts boundary. In Pakistan, these include the Ministry of Health,(It can be replaced with Ministry of Interprovincial Coordination), Ministry of Defense, autonomous bodies, NGOs, and households etc.

*Providers* include entities that receive money in exchange for or in anticipation of producing the activities inside the health accounts boundary. Examples of providers are hospitals, clinics, Community Health Centers in the public and private sectors, pharmacies, private practitioners, traditional health care providers etc.

Functions are the types of goods and services provided and activities performed within the health accounts boundary. It includes services of curative care (inpatient and outpatient), medical goods (e.g. pharmaceuticals, and appliances), prevention and public health services, health administration and health insurance, etc.

Presently there are different methodologies in practice around the world to estimate the health accounts, most common are (i) System of Health Accounts (SHA) developed and used by OECD and some other countries; (ii) National Health Accounts (NHA) which are based on SHA but with more flexibility regarding classifications and more appropriate for developing countries because it allows to add the traditional care providers in the system. In this regard, WHO has published "Guide to Producing National Health Accounts: with special ap-

plication for low income and middle income countries". More recently, WHO and OECD jointly worked on revision of SHA and came up with a single coherent document (SHA version2.0) which is to be followed globally for conducting health accounts. SHA version 2.0 has now been released and available on the website of WHO.

The main purposes of the System of Health Accounts are the provision of internationally comparable health accounts, the definition of internationally harmonized boundaries, the presentation of tables for the analysis of flows of financing and the monitoring of economic consequences of health care reform and health care policy.

As suggested, the NHA work in Pakistan has been done under the guidelines of WHO. Also, the International Classifications of Health Accounts (ICHA) has been used, tailor-made to include the categories relevant to Pakistan. These classifications assign a unique code to different actors in health sector and classify each of them in sub-classification codes, allowing for a systematic tracking of health expenditures in the economy. Once these classifications are available, one can have many possible combinations/ cross tables of these categories i.e. financing sources by financing agents, financing sources by providers, providers by functions. Each table would tell that (i) How much has been spent by each actor and (ii) Where exactly their funds have been transferred to.

In this report as well as in NHA-related literature the terms "health expenditures" and "health care expenditures" are used almost as synonyms. "Health expenditures" is the broader term covering administrative and other services while "health care expenditures" usually is used for the medical and curative part of these services in a narrower sense.

Despite of the fact that NHA gives very detailed and comprehensive information on health expenditures and provide a basis for evidence based health policy, there are some limitations of NHA as well. Mainly NHA cannot provide information on efficiency and cost effectiveness. The following table gives the insight to strengths and limitations of NHA.

| Table 2: Limitations of NHA   |                               |  |  |  |  |
|---|-------------------------------|--|--|--|--|
| Question  | Does NHA address it?          |  |  |  |  |
| What is total spending on health?   | Yes                           |  |  |  |  |
| Who is spending it?   | Yes                           |  |  |  |  |
| What is being spent on?   | Yes                           |  |  |  |  |
| What are the sources of this expenditure?   | Yes                           |  |  |  |  |
| How does this compare to other countries?   | Yes, if other country has NHA |  |  |  |  |
| What are the main trends?   | Yes, if there is time series  |  |  |  |  |
| How efficiently are the funds being allocated and spent?                              | No                            |  |  |  |  |
| How to improve the financing of health services by:                                   |                               |  |  |  |  |
| a) Increasing the resources available?  | No                            |  |  |  |  |
| b) Using existing resources more efficiently?   | No                            |  |  |  |  |
| Are subsidies or public transfers effectively targeted to poor and vulnerable groups? | Generally no                  |  |  |  |  |

Source: Mark Pearson, National Health Accounts: What Are They and How Can We Use Them? Briefing Paper, A paper produced by the Department for International Development Resource Centre for Health Sector Reform, 2000.

To build and enhance capacity within PBS, NHA Section has conducted different trainings on NHA as well. The objective is to make PBS capable of conducting NHA studies at regular intervals (usually every two/three years) without external technical assistance. Institutionalization of NHA is facilitated by investment in the development of data tracking and reporting systems, accounting systems, and associated activities such as the various surveys

required by the NHA study. This investment not only produces required financial data but also improves country capacity in health sector analysis, evidence-based policymaking as well as skills in designing and conducting various types of surveys.

#### 1.2 Steps taken to develop NHA in Pakistan

The health system in Pakistan is multifarious. To understand the places and roles of different actors, the health system has been reviewed and mapping has been done so that it can help in specifying classifications and data collection.

Relevant literature on NHA and studies done specially focusing on the South Asian experiences were reviewed because the health sector and data situation is very similar in those countries as in Pakistan.

National Health Accounts section of PBS assessed which data is available at federal level and in the provinces, i.e.

- Government entities including social insurance, military and cantonments etc.
- Private health insurance
- Autonomous bodies and firms and employers providing health care to their employees
- Households out of pocket expenditures
- Local and international non-governmental organizations
- Donors / development partners

The data has been collected from the following sources

- Federal government, provincial governments' and district governments' data from respective Accountant General Pakistan Revenues (AGPR) and Accountant General (AG) offices
- Military health expenditures data from Military Accountant General (MAG) office
- Cantonment boards health expenditures data from Military Lands and Cantonment Department
- Insurance companies (private health insurance) data from Securities and Exchange Commission of Pakistan (SECP)
- Donor's health expenditures data from Economic Affairs Division (EAD) of Ministry of Economic Affairs and Statistics
- Autonomous Bodies/Corporations health expenditures data obtained from the Census of Autonomous bodies/Corporations
- Households' OOP health expenditures data obtained from a special survey
- Health expenditures by the private health care providers was estimated by a special Private Health Care provider survey
- Social security health expenditures data from Employees Social Security Institutions (ESSI) and Ministry of Labour
- Zakat and Bait-ul- Mal data from Ministry of Zakat & Usher and Pakistan Bait-ul-Mal (PBM)

All data obtained and analyzed are classified according to financing sources, financing agents and health care providers. After that, the information was allocated to matrices to trace the original sources. Errors, conflicts and missing data were resolved and then graphs and tables were prepared. For the first round, only the matrix of financing sources by financing

agents was developed. The second round also includes the matrix of health care providers by financing agent.

Workshops/ conferences are part of the advocacy efforts needed to promote, communicate, build demand, and to sell the NHA activity to all major Pakistani stakeholders (government and private) and to the media. It is also meant to address health policy issues or questions that NHA can shed light on. In this regard, PBS has conducted training courses on NHA and invited participants from all over the Pakistan and different stakeholders.

## 2 Results of NHA at National Level

#### 2.1 Financing sources

Total health expenditure in Pakistan in the FY 2007-08 was 334 billion Rupees. Table 3 shows the breakdown by financing sources up to the maximum level of disaggregation. Upto the three digits the classification has been maintained according to the International Classification of Health Accounts, next levels of disaggregation are adopted according to the Pakistan specific situation and policy relevance.

| Table 3: Total health expenditure 2007-08 by financing sources |                                |                       |                       |          |  |  |  |
|--|--------------------------------|-----------------------|-----------------------|----------|--|--|--|
| Financing source   |                                | 2005-06<br>Million Rs | 2007-08<br>Million Rs | % Change |  |  |  |
| FS.1   | Public funds                   | 64,934                | 89,357                | 37.6     |  |  |  |
| FS.1.1   | Government funds               | 59,559                | 82,514                | 38.5     |  |  |  |
| FS.1.1.1   | Federal government             | 24,723                | 28,778                | 16.4     |  |  |  |
| FS.1.1.1.1   | Ministry of Finance            | 24,723                | 28,778                | 16.4     |  |  |  |
| FS.1.1.2   | Provincial government          | 20,589                | 30,151                | 46.4     |  |  |  |
| FS.1.1.2.1   | Punjab Dept. of Finance        | 9,152                 | 13,645                | 49.1     |  |  |  |
| FS.1.1.2.2   | Sindh Dept. of Finance         | 5,816                 | 7,485                 | 28.7     |  |  |  |
| FS.1.1.2.3   | KP Dept. of Finance            | 3,917                 | 7,027                 | 79.4     |  |  |  |
| FS.1.1.2.4   | Baluchistan Dept. of Finance   | 1,704                 | 1,994                 | 17.0     |  |  |  |
| FS.1.1.3   | District/ Tehsil Bodies        | 14,247                | 23,585                | 65.5     |  |  |  |
| FS.1.1.3.1   | District government            | 14,080                | 23,379                | 66.0     |  |  |  |
| FS.1.1.3.2   | Cantonment Boards              | 167                   | 206                   | 23.3     |  |  |  |
| FS.1.2   | Autonomous Bodies/Corporations | 5,375**               | 6,843                 | 27.3     |  |  |  |
| FS.1.2.1   | Federal government             | 4,830                 | 6,110                 | 26.5     |  |  |  |
| FS.1.2.2   | Provincial government          | 545                   | 733                   | 34.5     |  |  |  |
| FS.2   | Private funds                  | 189,607*              | 234,649               | 23.8     |  |  |  |
| FS.2.1   | Employer funds                 | 2,756                 | 3,887                 | 41.0     |  |  |  |
| FS.2.2   | Household funds                | 170,932*              | 211,739               | 23.9     |  |  |  |
| FS.2.3   | Local/National NGO's           | 15,919**              | 19,023                | 19.5     |  |  |  |
| FS.3   | Rest of the world funds        | 3,565                 | 9,626                 | 170.0    |  |  |  |
| FS.3.1   | Official donor agencies        | 3,565                 | 9,626                 | 170.0    |  |  |  |
| Total health expenditure                                       |                                | 258,106*              | 333,632               | 29.3     |  |  |  |

<sup>\*</sup>Revised figures \*\*Estimated

Financing sources have three major categories, namely public funds, private funds and rest of the world funds. In case of public funds, at federal level the Ministry of Finance is the source of funding which provides the money to civil government and military part. For provincial government, the provincial finance departments provide the money. And in case of local bodies/ district government, there are district government and cantonment boards that spend on health in their respective jurisdiction areas. The last category of the public funds is Autonomous Bodies/Corporations working under federal and provincial governments. They spend money on the health care of their employees (mostly by reimbursements) as well as on own health care facilities.

FS.2 shows all the private entities which are providing funds for health care. FS.2 is further categorized in employer funds and household funds. The household funds are net of reimbursements from employers and insurance companies (claims) but include insurance premiums. Employers are providing funds in three ways. They are contributing through occu-

pancy health care (which is neglected in NHA due to lack of data), through social security (managed by ESSIs) or through health insurance of their employees (group insurance). However, insurance figure here is a lump sum which also includes the premiums paid by individual households. Disaggregated data is not available, but according to experts' opinion group insurance/ insurance through employer has the major share in insurance expenditures. The lump sum figure has fully been put under employers' funds.

In Pakistan the insurance companies are not a source of financing. They are agents, instead, and to a certain extent (premiums minus claims) they are provider of (administrative) health services as well.

Household funds mainly comprise of OOP health expenditures, Bait-ul-Maland Zakat. Zakat contains all bank accounts whether owned by private households or some employers. But due to non-availability of disaggregated data it has fully been counted under household funds.

FS.3 shows the rest of the world funds which comprises of donor agencies. Development partners are also spending on health; however, only there direct spending is included. The money, which has been granted to the government (budgetary aid) and which thus is in the budget is reflected in government spending. NHA has to compromise in this regard as to avoid the double counting of funds transferred from one source to another. Out of total health expenditures in Pakistan, 25% of health spending is funded by government. Out of total government health expenditures federal government is funding 35%, provincial government is funding 37% and district government/ local bodies are funding 29%. Out of total federal health expenditures, 70% are for civil part of the government and the rest 30% is disbursed through military setup. Of 70% of the health expenditures funded through private sector, 90% is OOP health expenditures by households.

#### 2.2 Financing agents

#### 2.2.1 Overview

In well compiled NHA, the total health expenditures by financing sources must match the total health expenditures by financing agents. Both figures result in a total of 334 billion Rs. They only differ in their breakdown. For the interlocking of financial agents by sources see Section 2.3. The results for Pakistan by agents are shown in Table 4 up to the maximum level of disaggregation confined, however, to those codes of the classification for which data was available. The detailed classification for Pakistan has been discussed in Chapter 1. Up to the three digits level the classification has been maintained according to the International Classification of Health Accounts, next levels of disaggregation are adopted according to the Pakistan specific situation and policy relevance. Further explanation of each category is given in later sections. Financing agents also have public funds, private funds and rest of the world funds as the main categories. HF.1 denotes the general government and HF 1.1 shows the territorial government which is further disaggregated into federal government, provincial government and district government / local bodies. HF 1.2 shows the social security funds which are managed through government. It is further broken down into (i) employees social security institutions (ESSI) which are working in all four provinces and (ii) Zakat funds which are collected from bank accounts, deposit receipts, saving certificates etc. and then partly spent by government on health related activities. HF 1.3 shows the autonomous bodies/corporation which are working under the administrative control of federal and provincial governments.

| Table 4: Total he        |  |          |         |          |
|--------------------------|--|----------|---------|----------|
|                          | nts by HF classification                   | 2005-06  | 2007-08 | % change |
| HF.1                     | General government                         | 61,327   | 83,952  | 36.9     |
| HF.1.1                   | Territorial government                     | 57,038   | 78,968  | 38.4     |
| HF.1.1.1                 | Federal Government                         | 23,816   | 27,664  | 16.1     |
| HF.1.1.1.1               | Federal (Civil)                            | 16,413   | 18,976  | 15.6     |
| HF.1.1.1.1.1             | MoH & Other                                | 12,167   | 15,461  | 27.1     |
| HF.1.1.1.1.2             | MoPW                                       | 4,241    | 3,506   | -17.3    |
| HF.1.1.1.1.3             | Health Education                           | 5        | 9       | 16.0     |
| HF.1.1.1.2               | Military                                   | 7,403    | 8,688   | 17.4     |
| HF.1.1.2                 | Provincial government                      | 19,007   | 27,757  | 46.0     |
| HF.1.1.2.1               | Punjab                                     | 8,405    | 12,461  | 48.3     |
| HF.1.1.2.1.1             | Dept. of Health & Others                   | 7,161    | 11,953  | 66.9     |
| HF.1.1.2.1.2             | Dept. of Population Welfare                | 1,072    | 19      | -98.2    |
| HF.1.1.2.1.3             | Health Education                           | 172      | 489     | 184.3    |
| HF.1.1.2.2               | Sindh                                      | 5,334    | 6,796   | 27.4     |
| HF.1.1.2.2.1             | Dept. of Health & Others                   | 3,798    | 5,669   | 49.6     |
| HF.1.1.2.2.2             | Dept. of Population Welfare                | 718      | 27      | -96.2    |
| HF.1.1.2.2.3             | Health Education                           | 818      | 1,100   | 34.5     |
| HF.1.1.2.3               | KP   | 3,739    | 6,763   | 80.8     |
| HF.1.1.2.3.1             | Dept. of Health & Others                   | 2,882    | 5,756   | 99.7     |
| HF.1.1.2.3.2             | Dept. of Population Welfare                | 382      | 7       | -98.2    |
| HF.1.1.2.3.3             | Health Education                           | 475      | 1000    | 110.5    |
| HF.1.1.2.4               | Balochistan                                | 1,529    | 1,737   | 13.6     |
| HF.1.1.2.4.1             | Dept. of Health & Others                   | 1,248    | 1,419   | 13.7     |
| HF.1.1.2.4.2             | Dept. of Population Welfare                | 9        | -       | _        |
| HF.1.1.2.4.3             | Health Education                           | 272      | 318     | 16.9     |
| HF.1.1.3                 | District/Tehsil Government                 | 14,215   | 23,547  | 65.6     |
| HF.1.1.3.1               | District Government                        | 14,080   | 23,379  | 66.0     |
| HF.1.1.3.2               | Cantonments Boards                         | 135      | 168     | 24.4     |
| HF.1.2                   | Social security funds                      | 2,839*   | 3,259   | 14.8     |
| HF.1.2.1                 | Social security funds through Government   | 2,839*   | 3,259   | 14.8     |
| HF.1.2.1.1               | ESSI                                       | 2,028*   | 2,375   | 17.1     |
| HF.1.2.1.2               | Zakat Council                              | 523      | 557     | 6.5      |
| HF.1.2.1.3               | Bait ul Mal                                | 288      | 327     | 13.5     |
| HF.1.3                   | Autonomous Bodies/Corporation              | 1,450**  | 1,725   | 19.0     |
| HF.1.3.1                 | Federal government                         | 1,253**  | 1,500   | 17.7     |
| HF.1.3.2                 | Provincial government                      | 197**    | 225     | 14.2     |
| HF.2                     | Private sector                             | 193,214* | 240,054 | 24.2     |
| HF.2.2                   | Other private health insurance             | 285      | 523     | 83.5     |
| HF.2.3                   | Private households' out-of-pocket payment  | 177,010* | 220,508 | 24.6     |
| HF.2.4                   | Local Non-Government Organizations (NGO's) | 15,919** | 19,023  | 19.5     |
| HF.3                     | Rest of the World                          | 3,565    | 9,626   | 170.0    |
| HF.3.1                   | Official donor agencies                    | 3,565    | 9,626   | 170.0    |
| Total health expenditure |  | 258,106  | 333,632 | 29.3     |

\*Revised \*\*Estimated

HF.2 shows the private financing agents. For the first round we had only two categories namely private health insurance and household OOP health expenditures. In the second round of NHA, the data of local/national NGOs are included.HF.3 (Row) shows the expenditures by donor agencies/ development partners as financing agents.

Out of total health expenditures in Pakistan, 25.1% is made by general government agents who include the social security and Zakat health expenditures as well. The private expenditures constitute the 72% of total health expenditures in Pakistan, out of which 92% are households' OOP health expenditures. The share of development partners/ donors organizations in total health expenditures is 3%.

#### 2.2.2 Civilian (territorial) government

The title of this section is not common language in Pakistan. It has been chosen as a term for the total of Federal Government (which excludes military expenditures) and the provincial as well as the district governments. In the context of health financing this figure (the civilian territorial government health expenditures) is considered to be of special interest. It sums up to 79 billion Rupees out of overall 334 billion Rupees of total health expenditures in Pakistan during FY 2007-08.

Table 5 shows the federal and provincial (including districts) health expenditures by minor functions of Chart of Accounts (CoA) classification adopted by AGs and AGPR to record the government expenditures under the project named Project for Improvement in Financial Reporting and Auditing (PIFRA). This classification is based on Government Finance Statistics by IMF, so they are in line with the international classifications.

| Table 5: Civilian territorial government health expenditures 2007-08 by function |            |        |        |       |                       |          |
|--|------------|--------|--------|-------|-----------------------|----------|
|  | Million Rs |        |        |       |                       |          |
| Function (CoA)   | Federal    | Punjab | Sindh  | КР    | Ba-<br>lochis-<br>tan | Pakistan |
| General Services   | 3,506      | 0      | 27     | 7     | 0                     | 3,540    |
| General Public Services Not Elsewhere Defined                                    | 6          | 0      | 0      | 0     | 0                     | 6        |
| Health Administration  | 167        | 614    | 712    | 462   | 1,783                 | 3,738    |
| Hospital Services  | 5,743      | 21,610 | 9,627  | 5,377 | 1,183                 | 43,540   |
| Operations Services  | 14         | 0      | 0      | 0     | 0                     | 14       |
| Medical Products, Appliances & Equipment   | 56         | 0      | 26     | 2     | 19                    | 103      |
| Public Health Services   | 8,962      | 573    | 789    | 713   | 133                   | 11,170   |
| R & D Health   | 128        | 0      | 3      | 0     | 0                     | 131      |
| Medical Education  | 9          | 758    | 1,100  | 938   | 319                   | 3,124    |
| Basic Research   | 83         | 0      | 0      | 0     | 0                     | 83       |
| Other Administration   | 0          | 0      | 0      | 71    | 0                     | 71       |
| Construction and Transport   | 155        | 0      | 98     | 2,108 | 0                     | 2,361    |
| Economic, Commercial & Labour Affair   | 11         | 11     | 0      | 0     | 20                    | 42       |
| Hospital Administration  | 0          | 1,970  | 0      | 0     | 0                     | 1,970    |
| Transfers  | 135        | 0      | 30     | 0     | 0                     | 165      |
| Water Supply   | 0          | 0      | 3      | 0     | 0                     | 3        |
| Others   | 1          | 0      | 0      | 6     | 42                    | 49       |
| Total  | 18,976     | 25,536 | 12,415 | 9,684 | 3,499                 | 70,110   |

The data on government health expenditures has been extracted from the appropriation accounts of respective provinces and districts as well as federal level. It contains all the health expenditures by any ministry or department. All the expenditures of Ministry/ Department of Health and Ministry/ Department of Population Welfare are included as a whole whether it is hospital expenditures or administrative expenditures whereas from all the other ministries only health related expenditures are extracted which are mainly covered under Code 07 (health) of CoA classifications. In addition to that, the medical and health education expenditures (medical and nursing colleges etc.) are also included as health expenditures. About 62% of the expenditures are on hospital services, about 16% on public health services, and about 5% on health and medical education.

#### 2.2.3 Military health expenditures

The military health expenditures have been provided by the Military Accountant General. They include the expenditures by Army, Navy, Air Force, Defense Production Establishments, Inter Services Organizations and Accounts Offices including Pakistan Military Accounts Department. The Navy and Air Force province wise figures were estimated based on overall (army and others) province wise percentages. Military health expenditures are funded by government / Ministry of Finance through Ministry of Defense. The following figures show these health expenditures by province (federal area mainly consist of ICT) and by different expenditure categories as well as by entity.

| Table 6: Military health expenditures by organization 2007-08 in million Rs |         |         |        |        |                  |          |  |
|---|---------|---------|--------|--------|------------------|----------|--|
| Organization / category   | Federal | Punjab  | Sindh  | KP     | Baluchis-<br>tan | Pakistan |  |
| Army  | -       | 4799.10 | 453.10 | 315.07 | 761.82           | 6329.09  |  |
| Air Force   | 84.26   | 252.77  | 140.43 | 28.09  | 56.17            | 561.71   |  |
| Navy  | 107.95  | 344.22  | 188.40 | 37.68  | 75.36            | 753.61   |  |
| D.P. Establishment  | -       | 462.90  | -      | -      | -                | 462.90   |  |
| ISO'S (Excl P. M. A. D)   | -       | 628.64  | -      | -      | -                | 628.64   |  |
| A/C Org (Incl. P. M. A. D)  | -       | 29.97   | 0.00   |        | 0.20             | 30.18    |  |
| Total   | 192.20  | 6517.60 | 781.93 | 380.83 | 893.56           | 8766.12  |  |
| Of which in category  |         | •       |        |        |                  |          |  |
| Medical Store & Equipment (Local Purchase)                                  | 118.5   | 2944.6  | 297.8  | 98.1   | 244.2            | 3703.2   |  |
| Medical Store & Equipment (import)  | 3.2     | 228.2   | 13.8   | 2.8    | 5.5              | 253.4    |  |
| Reimbursement. of Medical Charges   | 0.2     | 76.4    | 0.5    | 0.1    | 0.4              | 77.6     |  |
| Other Medical Expenditure   |         | 1.1     | 0.4    | 0.1    | 0.3              | 2.0      |  |
| Pay & Allowances  | 70.3    | 3267.2  | 469.5  | 279.8  | 643.1            | 4730.0   |  |

It should be noted that in the figures for the agents the reimbursements of medical charges are shown under private households as they are the ones directly paying the health care provider. Therefore, in Table 4 the amount is 8,688 million Rs, only.

#### 2.2.4 Cantonment Boards

The data on cantonment boards' health expenditures has been taken from Military Land and Cantonment Boards Department. Cantonment boards act as local bodies and are financially autonomous. The data is broken down into provinces and different health expenditures categories. As the table shows most of the expenditures has taken place in province Punjab and lowest health expenditures in Balochistan. Major proportion of health expenditures is on salaries of medical staff and the second category is medicine and reimbursement.

| Table 7: Health expenditures of cantonment boards (agents) 2007-08 in million Rs |        |       |    |                  |       |  |  |  |  |
|--|--------|-------|----|------------------|-------|--|--|--|--|
| Province   | Punjab | Sindh | KP | Balochis-<br>tan | Total |  |  |  |  |
| Medicine & reimbursements  | 52     | 16    | 5  | 2                | 75    |  |  |  |  |
| Medical equipment  | 11     | 1     | 1  | -                | 13    |  |  |  |  |
| Salaries of medical staff  | 66     | 21    | 16 | 3                | 106   |  |  |  |  |
| Construction / maintenance of Disp./Hospital                                     | 10     | 1     | 1  | -                | 12    |  |  |  |  |
| Total  | 139    | 39    | 23 | 5                | 206   |  |  |  |  |

#### 2.2.5 Autonomous bodies/corporations

Census of Autonomous Bodies/Corporations has been carried out for the reference period 2007-08. The purpose of this census was to collect data on remuneration of health expenditures of their employees. For more detail see Chapter 5. In the context of financial agents the expenditures are confined to those on own health care facilities. This is 1725 million Rupees for 2007-08.

#### 2.2.6 Social Security

Employees Social Security Institutions (ESSI) are working in all four provinces. The data for ESSIs' health expenditures has been taken from them. The health expenditures are shown by province and by categories of health expenditures. The administration / operational cost are included. As the table shows expenditures on health facilities have the major share in total ESSIs health expenditures followed by the cash benefits expenditures. Most of the expenditure has been made in province Punjab followed by Sindh and the KP and Balochistan.

| Table 8: Employees social security institutions health expenditures 2007-08 |        |       |            |             |          |  |  |
|---|--------|-------|------------|-------------|----------|--|--|
| Time of booleh over an disting  |        |       | Million Rs |             |          |  |  |
| Type of health expenditure  | Punjab | Sindh | KP         | Balochistan | Pakistan |  |  |
| Expenditures on health facilities   | 1,466  | 601   | 85         | 36          | 2,188    |  |  |
| Reimbursement of medical charges  | 24     | 22    | 9          | 4           | 59       |  |  |
| Cash benefits relevant to health expenditure                                | 134    | 46    | 5          | 2           | 187      |  |  |
| Total   | 1,624  | 669   | 99         | 42          | 2,434    |  |  |

In the presentation of the agents' figures the reimbursements of medical charges are excluded. They are in the figures for the households in their capacity as agents, instead.

In Pakistan ESSI is only an agent as they do not have own funds. They are funded by employers' contributions, instead. In amount of their administrative service (contributions minus payments of health care providers) they are also providers of health care.

#### 2.2.7 Zakat and Bait-ul-Mal

The data on health expenditures through Zakat is taken from Ministry of Religious Affairs, Zakat and Ushar. Table 9 shows that Zakat funds at the provincial and national level allocated and utilized in 2007-08 for health care was 557 million Rupees for 335,495 beneficiaries.

| Table 9: Zakat for health care by program, 2007-08 |                  |                 |               |  |  |  |
|--|------------------|-----------------|---------------|--|--|--|
| Ducasus  | Millio           | on Rs           | Beneficiaries |  |  |  |
| Program  | Budget allocated | Budget utilized | (persons)     |  |  |  |
| Health Care (national)                             | 500              | 388             | 216,827       |  |  |  |
| Health Care (provincial)                           | 215              | 169             | 118,462       |  |  |  |
| Leprosy Patients                                   | 1                | 1               | 206           |  |  |  |
| Total  | 718              | 557             | 335,495       |  |  |  |

Source: Zakat & Usher Department: Brief on Zakat System

The overall Zakat funds of 557 million Rupees have been utilized by the Provinces / areas according to the diversified set of programs. The share of the provinces (million Rupees) is as follows: Punjab 107, Sindh 33, KP 26, Balochistan 2, and Federal level or unre-

gionalized 501. Further disaggregation is not available except one category of expenditures on leprosy patients in Punjab which amounts to 0.57 million Rupees. For Northern areas, 2.26 million Rupees were allocated for health care and there were 7,112 beneficiaries.

In NHA, Zakat is an agent and not a source. Zakat funds are collected mainly from private households and are redistributed among some of them. Though the pure redistributive part of Zakat may be considered for the reimbursement of health expenditures of the downtrodden, it is not sure that the money is actually spent for health care services. And even if this is the case, this expenditure would be covered under OOP payments of households. Therefore, only the direct payments of Zakat to hospital and other health care providers on behalf of the poor are considered to be health expenditures. The purely redistributive part should be excluded on the source side, already. However, empirically it is not possible to estimate this split. Thus, to a small extent the agent figures of Bait-ul-Mal are overstated. This will be looked at during the third round of NHA.

| Table 10: Pakistan Bait-ul-Mal individual financial assistance for health |               |            |               |            |               |            |  |  |
|---|---------------|------------|---------------|------------|---------------|------------|--|--|
|   | 2005/0        | 06         | 2007/0        | 08         | 2008/         | 09         |  |  |
| Province  | Beneficiaries | Million Rs | Beneficiaries | Million Rs | Beneficiaries | Million Rs |  |  |
| Punjab  | 4460          | 164.56     | 5135          | 253.93     | 5081          | 418.15     |  |  |
| Sindh   | 1366          | 59.19      | 492           | 18.30      | 950           | 53.36      |  |  |
| KP  | 1309          | 53.87      | 701           | 42.43      | 994           | 77.82      |  |  |
| Balochistan   | 240           | 10.82      | 375           | 12.68      | 306           | 13.23      |  |  |
| Total   | 7375          | 288.44     | 6703          | 327.34     | 7331          | 562.56     |  |  |

Pakistan Bait-ul-Mal is providing individual financial assistance for health care across the Pakistan. The above table shows that it has provided health care assistance specifically to 6703 individuals in year 2007-08. The overall amount of 327 million Rupees has been received by the Provinces as individual financial assistance for the health care. Out of total amount distributed by PBM in provinces, Punjab received the highest share followed by KP, Sindh and Balochistan. For the treatment of the purely redistributive assistance see the remark above on Zakat.

#### 2.2.8 Private Health Insurance

Health insurance is covered under the non-life insurance. In 2007-08 there were 52 insurance companies in Pakistan offering group health insurance or individual health insurance. The insurance companies are funded by premiums of their clients. They are not financing source but are agents as well as providers of (administrative) health services. Since the Security and Exchange Commission of Pakistan (SECP) is the formal regulator of the insurance industry under the Insurance Ordinance 2000, the data on private health insurance has been taken from SECP. The premiums written minus the incurred claims are taken as the remuneration of the administrative efforts of the companies to be recorded in the provider figures.

| Table 11: Private health insurance 2007-08 |                       |                       |  |  |  |  |  |
|--|-----------------------|-----------------------|--|--|--|--|--|
|  |                       | N                     | lillion Rs   |  |  |  |  |
| Year                                       | Gross premium written | Gross incurred claims | Administrative health service provided (premiums minus claims) |  |  |  |  |
| 2007                                       | 1327.7                | 728.9                 | 598.8  |  |  |  |  |
| 2008                                       | 1577.5                | 1130.6                | 446.9  |  |  |  |  |
| 2006                                       | 817.7                 | 479.1                 | 338.6  |  |  |  |  |
| 2005                                       | 589.8                 | 358.5                 | 231.3  |  |  |  |  |
| Average of 2005-2006                       | 703.8                 | 418.8                 | 285.0  |  |  |  |  |
| Average of 2007-2008                       | 1452.6                | 929.8                 | 522.8  |  |  |  |  |

Source: Security and Exchange Commission of Pakistan

#### 2.2.9 Households OOP health expenditures

Households' OOP payments are defined as direct payments for health services from the households' income or saving. However, the direct payment might be reimbursed by employers or by health insurance. Therefore, it depends on the exact definition. In the future the households' OOP payments will be treated as a financial "scheme", just like insurances, as there are ingoing's and outgoings in their financial relationship with providers, employers and insurances (see "revision of the System of Health Accounts" in Section 7.3 of this report). For the time being, we distinguish between OOP recorded on behalf of households as financing agents (OOP "gross") and OOP as a source of financing health services (OOP "net" of reimbursements).

The OOP survey (see Chapter 5) aimed at collecting the "gross" figures of OOP. It indicates that total OOP health expenditures incurred by private households in the year 2009-10 amounts to 273 billion Rupees. Punjab has the highest share (56%) followed by Sindh (24%) and KP (13.7%) while Balochistan has just 5% share of Pakistan's OOP health spending.

| Table 12: OOP health expenditures of private households 2009-10 by province |         |      |  |  |  |  |  |
|---|---------|------|--|--|--|--|--|
| Province/Area Million Rs % Share  |         |      |  |  |  |  |  |
| Punjab  | 152,934 | 56.0 |  |  |  |  |  |
| Sindh   | 66,324  | 24.3 |  |  |  |  |  |
| KP  | 37,481  | 13.7 |  |  |  |  |  |
| Balochistan   | 14,232  | 5.2  |  |  |  |  |  |
| Islamabad   | 2,057   | 0.8  |  |  |  |  |  |
| Pakistan  | 273,028 | 100  |  |  |  |  |  |

Table 13 shows the OOP health expenditures for the year 2007-08 obtained by deflating the expenditures of 2009-10 (Table 12) on the basis of the Consumer Price Index for "Medicare" category for the year 2009-10 and 2007-08 and by extrapolating the result backwardly with the growth rate of population assuming that OOP correlates with the number of population.

Table 13: OOP health expenditures 2007-08 by province and component in million Rs Financing source / Province Punjab Sindh KP Pakistan OOP exp. of households as agents 123,516 53.566 30.271 11,494 1,661 220,508 ('gross") Reimbursement by federal Govt. 510 160 308 47 11 1,036 Reimbursement by provincial Govt. 1,184 689 264 257 2,394 4,610 Reimbursement by federal ABs/C 2,574 1,095 725 201 15 Reimbursement by provincial ABs/C 176 256 71 5 508 2 Reimbursement by other Govt. entities 102 9 3 116 Reimbursement by private health 930 930 insurance Reimbursement by Social health 24 22 9 4 59 insurance Net OOP health expenditures of 51,335 10,978 1,635 118,946 28.891 -930 210,855 households.

\*ICT: Islamabad Capital Territory

The "net" OOP figures for the year 2007-08 are obtained after deducting the third-party payments, such as insurance or reimbursements. Table 13 shows the result by province. OOP health expenditures do not include FATA, FANA and AJK.

#### 2.2.10 Development Partners/Donors

Data on health expenditures by development partners/ donor agencies has been taken from the Development Assistance Data Base (DAD) of Economic Affairs Division (EAD). All the figures were extracted in October 2009 and are off budget figures which mean that double counting of budget support from donors is avoided.

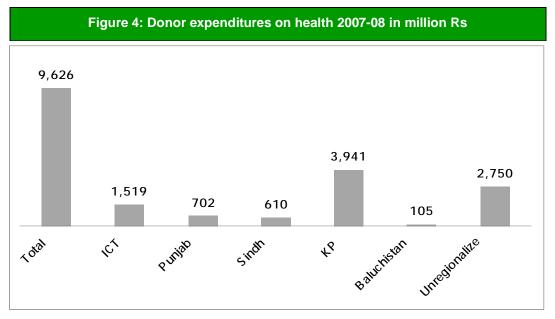
The data from DAD database only covers the off-budget expenditures/disbursements. It means those grants/amounts which appear in the government budgetary books and in appropriation accounts published by Accountant General are treated as on-budget activities, separately. Also the Public Sector Development Program (PSDP) allocations are not included in the DAD database, as they are covered or recorded in annual appropriation accounts, and these allocations are part of different health expenditures category which are recorded under health ministry in federal government or under health department in provinces.

The report for the year 2007-08 covers the donors' expenditures in the four provinces of Pakistan. For reasons of consistency it does not include the donors' expenditures in AJK, FATA & FANA though the data is available in the DAD database.

| Table 14: Donor health expenditures 2007-08 in million Rs |            |                       |        |  |  |  |  |
|---|------------|-----------------------|--------|--|--|--|--|
| Sector  | Off Budget | On Budget (estimated) | Total  |  |  |  |  |
| Food and Nutrition  | 69.9       | 83.8                  | 153.7  |  |  |  |  |
| Child Health  | 141        | 167.6                 | 308.6  |  |  |  |  |
| health and nutrition Unallocated                          | 1313.8     | 1566.2                | 2880.0 |  |  |  |  |
| Infectious Disease Control                                | 921.3      | 1100.0                | 2021.3 |  |  |  |  |
| Maternal Health   | 260.3      | 309.0                 | 569.3  |  |  |  |  |
| Medical Services  | 2.2        | 5.2                   | 7.4    |  |  |  |  |
| Other - Health and Nutrition                              | 489.6      | 586.7                 | 1076.3 |  |  |  |  |
| Primary Health  | 56.8       | 68.1                  | 124.9  |  |  |  |  |
| Unallocated   | 1132.5     | 1351.4                | 2483.9 |  |  |  |  |
| Unallocated (Population Welfare)                          | 0.7        | 1.0                   | 1.7    |  |  |  |  |
| Total   | 4388.3     | 5238.0                | 9626.3 |  |  |  |  |

Source: EAD, http://www.dadpak.org/dad/Documents/DAD User Guides.html

The biggest share has been spent in KP followed by the amount which has been spent at federal level but could not be allocated to provinces. Punjab, then Sindh and Balochistan have lower shares in the donors' expenditures on health.



Source: EAD, Islamabad

#### 2.2.11 Local Non-Government Organizations

Philanthropic/ Non-Government organizations (NGOs) are working in both urban and rural areas of Pakistan. These organizations are working in multiple sectors to uplift the community by providing awareness and basic amenities of life. Philanthropic organizations are registered under different laws whereas very few are unregistered. Philanthropic sector is different from 'state' as it collects donations, charity or alms from the community and uses it for deserving communities, voluntarily.

In Pakistan, Ministry of Social Welfare was responsible for registering philanthropic organizations at federal and provincial level. It provided a province-wise list of active NGOs, divided into two categories on the basis of their major activities, 'health care' and 'others' organizations to focus on the health related NGOs. However, the expenditures of the NGOs were not provided. They had to be estimated.

| Table 15:Local Non-Government Organizations 2007-08 |             |        |        |  |  |  |
|---|-------------|--------|--------|--|--|--|
| Province  | Health care | Others | Total  |  |  |  |
| Punjab  | 864         | 4,192  | 5,056  |  |  |  |
| Sindh   | 1,642       | 4,759  | 6,401  |  |  |  |
| KP  | 1,011       | 1,360  | 2,371  |  |  |  |
| Balochistan   | 308         | 1,524  | 1,832  |  |  |  |
| Total   | 3,825       | 14,420 | 18,245 |  |  |  |

Source: Ministry of Social Welfare

For this purpose the health expenditures per NGO were obtained from a sample of 263 NGOs related to health in all four provinces taken from a survey of NGOs conducted by PBS in 2008. The average (Column 5 of Table 16) was then applied to all health related NGOs in Pakistan. To avoid double counting, donations by international agencies have been excluded from the total health care expenditures by NGOs. These donations are already covered in Financing Sources.

| Table 16: Health expenditures of health related NGOs 2007-08 |  |     |            |                      |                        |  |       |  |
|--|--|-----|------------|----------------------|------------------------|--|-------|--|
|  | Health related Sample of health NGO's as per related NGO's |     |            | es of sample<br>60's | Health<br>Expenditures |  |       |  |
| Province   | Ministry   | PBS | total      | average              | (col 2 * col 4)        |  |       |  |
| Number   |  |     | Million Rs |                      |                        |  |       |  |
| 1  | 2  | 3   | 4          | 5                    | 6                      |  |       |  |
| Punjab   | 864  | 168 | 1,866      | 11.1                 | 6,471                  |  |       |  |
| Sindh  | 1,642  | 73  | 88         | 1.2                  | 12,299                 |  |       |  |
| KP   | 1,011  | 12  | 9 0.8      |                      | 12 9 0.8               |  | 7,572 |  |
| Balochistan  | 308  | 10  | 7          | 0.7                  | 2,307                  |  |       |  |
| Pakistan   | 3,825  | 263 | 1,970      | 7.5                  | 28,650                 |  |       |  |

Source: Ministry of Social Welfare and Pakistan Bureau of Statistics

Per NGO health expenditure is 7.5 million Rupees (factor) and total health expenditure incurred by health related NGOs is 28,650 million Rupees. The share of international funding estimated from NGOs survey is 34%. Therefore, the estimated donations by international agencies to health related NGOs is 9,626 million Rupees. After excluding the international funding, the total health expenditures incurred by health related local NGOs remain 19,023 million Rupees.

#### 2.3 Financing sources by financing agents

Matrix 1 shows the flow of funds for health expenditures in Pakistan. The rows are grouped according to financing sources while financing agents are listed in columns. The matrix shows the flow of funds from financing source to financing agent in Pakistan. For example in case of federal government Ministry of Finance is the financing source and Ministry of Health, Ministry of Population Welfare, Ministry of Education, Ministry of Defense through mili-

tary setup and other ministries are financing agents. In some of the cases financing sources and financing agents are the same which means that the financing sources are dedicated to own health care spending exclusively and the money spent for health services (agents) is fully funded from their own resources.

|             |                        |   |          | Matrix 1: Financ         | ing source                   | s by finan                | cing agen                        | ts in Paki          | stan 2007                   | 7-08 in n       | nillion Rs      |        |                    |         |                        |     |    |
|-------------|------------------------|---|----------|--------------------------|------------------------------|---------------------------|----------------------------------|---------------------|-----------------------------|-----------------|-----------------|--------|--------------------|---------|------------------------|-----|----|
|             |                        |   |          |                          |                              |                           |                                  |                     | Financi                     | ng Source       | S               |        |                    |         |                        |     |    |
|             |                        |   |          |                          |                              | FS.                       | .1 Public fund                   | ls                  |                             | FS              | 3.2 Private fu  | nds    | FS.3<br>ROW        |         |                        |     |    |
|             |                        |   |          |                          | FS.1.1                       | Government                | : Funds                          |                     | tonomous<br>dies            | FS.2.1          | FS.2.2          | FS.2.3 | FS.3.1<br>Official | Total   | %                      |     |    |
|             |                        | Financing                                     | , Agents |                          | FS.1.1.1<br>Fed. Gov-<br>ern | FS.1.1.2<br>Prov.<br>Gov. | FS.1.1.3<br>District /<br>Tehsil | FS.1.2.1<br>Federal | FS.1.2.2<br>Provin-<br>cial | ployer<br>funds | oyer hold Local |        | ployer hold Local  |         | donor<br>agen-<br>cies |     |    |
|             |                        |   |          | Health                   | 14,049                       |                           |                                  |                     |                             |                 |                 |        |                    | 14,049  | 4.2                    |     |    |
|             |                        | HF.1.1.1                                      | Minist   | Population Welfare       | 3,506                        |                           |                                  |                     |                             |                 |                 |        |                    | 3,506   | 1.0                    |     |    |
|             |                        | Federal<br>Govt.                              | of:      | Health Education         | 9                            |                           |                                  |                     |                             |                 |                 |        |                    | 9       | 0.0                    |     |    |
|             | HF.1.1                 |   |          |                          | Other Ministries             | 1,412                     |                                  |                     |                             |                 |                 |        |                    |         | 1,412                  | 0.4 |    |
|             | Territorial Govt.      |   | Militar  | y health expenditure     | 8,688                        |                           |                                  |                     |                             |                 |                 |        |                    | 8,688   | 2.6                    |     |    |
|             |                        | ovt.  HF.1.1.2  Provincial                    |          | Health                   |                              | 22,610                    |                                  |                     |                             |                 |                 |        |                    | 22,610  | 6.7                    |     |    |
| HF.1        |                        |   |          |                          |                              | Dept. o                   | of: Population Welfare           |                     | 53                          |                 |                 |        |                    |         |                        |     | 53 |
| General     |                        | Govt.   |          | Other                    |                              | 2,187                     |                                  |                     |                             |                 |                 |        |                    | 2,187   | 0.7                    |     |    |
| Govt.       |                        |   |          | Health education         |                              | 2,907                     |                                  |                     |                             |                 |                 |        |                    | 2,907   | 0.9                    |     |    |
|             |                        | HF.1.1.3                                      |          | District Government      |                              |                           | 23,379                           |                     |                             |                 |                 |        |                    | 23,379  | 6.9                    |     |    |
|             |                        | District Boo                                  |          | Cantonments Boards       |                              |                           | 168                              |                     |                             |                 |                 |        |                    | 168     | 0.1                    |     |    |
|             | HF.1.2<br>Social       | HF.1.2.1<br>Social secu                       | rity     | ESSI                     |                              |                           |                                  |                     |                             | 2,375           |                 |        |                    | 2,375   | 0.7                    |     |    |
|             | security               | funds throu                                   |          | Zakat health expenditure |                              |                           |                                  |                     |                             |                 | 557             |        |                    | 557     | 0.1                    |     |    |
|             | funds                  | Governmen                                     | it       | Bait Ul Mal              |                              |                           |                                  |                     |                             |                 | 327             |        |                    | 327     | 0.1                    |     |    |
|             | HF.1.3                 |   |          | Federal                  |                              |                           |                                  | 1,500               |                             |                 |                 |        |                    | 1,500   | 0.4                    |     |    |
|             | ABs/C                  |   |          | Provincial               |                              |                           |                                  |                     | 225                         |                 |                 |        |                    | 225     | 0.2                    |     |    |
| HF.2        | Private HF.2.3 Private | er private insu                               | rance    |                          |                              |                           |                                  |                     |                             | 523             |                 |        |                    | 523     | 0.2                    |     |    |
| Private     |                        | 2.3 Private households' out-of-pocket payment |          | 1,114                    | 2,394                        | 38                        | 4,610                            | 508                 | 989                         | 210,855         |                 |        | 220,508            | 66.1    |                        |     |    |
| Sector      | HF.2.4Loca             | l NGO's                                       |          |                          |                              |                           |                                  |                     |                             |                 |                 | 19,023 |                    | 19,023  | 5.7                    |     |    |
| HF.3<br>ROW | HF.3.1 Offic           | ial donor age                                 | ncies    |                          |                              |                           |                                  |                     |                             |                 |                 |        | 9,626              | 9,626   | 2.9                    |     |    |
|             |                        |   |          | Total                    | 28,778                       | 30,151                    | 23,585                           | 6,110               | 733                         | 3,887           | 211,739         | 19,023 | 9,626              | 333,632 | 100                    |     |    |
|             |                        |   |          | %                        | 8.6                          | 9.0                       | 7.1                              | 1.8                 | 0.2                         | 1.2             | 63.5            | 5.7    | 2.9                | 100     |                        |     |    |

#### 2.4 Health Care Providers

#### 2.4.1 Definition and rough classification

In addition to financing sources and financing agents health care providers are the third dimension of NHA. Health care providers are the end recipients of the health care funds. Figures related to them answer the question of "To whom did the money go?" Examples of providers include public and private hospitals, medical centers, dispensaries, individual solo clinics, pharmacies, laboratories etc. The following are the three broad categories of the health care providers:

- Public Provider
- Private Provider
- Non-Government Organization providers/Non-Profit Institutions

The public sector is running health care facilities for its employees and for the general public across the country. The public sector can further be subdivided into core government, autonomous bodies / public corporations and social security. The providers in the core government can further be divided into

- Ø Providers with the civilian territorial government (Federal & Provincial) which mainly are the health departments. Provision of health care is primarily the responsibility of the provincial governments. This health care provision is a three tiered system with primary, secondary and tertiary levels of care.
- Ø Providers within the military health care setup
- Ø Providers run by the Cantonment Board of Pakistan

Autonomous bodies/ Corporations are providing health care services primarily to their own employees through their own doctors, clinics and hospitals. Employees Social Security Institutions are provincial autonomous bodies. In Pakistan they entertain some own health care facilities.

The public sector health care providers have been covered by data obtained from the federal & provincial appropriation accounts, Military Accountant General, Cantonment Board of Pakistan, Employees Social Security Institutions and a census of autonomous bodies/corporations.

The main categories of private sector health care providers are:

- Ø Major hospitals with specialized health facilities
- Ø Other hospitals with variable quality / level of services
- Ø Individually owned clinics / general practitioners including dental and eye care. These clinics are either owned by a single person who is the sole proprietor of the facility or they are run on partnership basis
- Ø Homeopaths, hakeems, tabibs and other traditional health providers
- Ø Health care facilities from NGOs including the philanthropic organizations
- Ø Ambulatory health services
- Ø Facilities providing diagnostic & laboratory services
- Ø Pharmacies and other retail sellers of medical goods

The private sector has widely been covered through a survey of private health care providers and census of big hospitals (for details see Chapter 3). The pharmacies were covered from a secondary source (see Section 2.4.3). As a cross checking mechanism, the expenditures from the supply side were compared with out of pocket expenditures on health (demand side).

Some less significant providers of health services are not covered. This is mainly true for other retailers of medical goods, e.g. opticians and chemists, and for providers of ambulatory services carried out as secondary activity, only (e.g. taxi drivers). It is envisaged to extend the scope of the health care providers dimension in the third round of Health Accounts.

#### 2.4.2 Health care providers: overview of results

Table 18 gives an overview of the Total Health Expenditure by all those providers which were covered in the second round. The classification applied for this is given in detail in Annexure 7. HP.1 shows Hospitals and HP 1.1 denotes the General Hospitals which is further disaggregated into government-owned general hospitals, Hospitals under social security, Hospitals of autonomous bodies/corporations under the federal/provincial governments etc. HP 1.2 shows the category of mental health and substance abuse hospitals which are further disaggregated into three sub categories. HP 1.3 shows Other specialty Hospital (hospitals only for a specific disease or condition other than mental and substance abuse) which is further disaggregated into four subcategories. HP.3 denotes providers of ambulatory health care. HP.4 shows the retail sale and other providers of medical goods. HP.5 denotes provision and administration of public health programs, HP.6 General Health administration and insurance.

| Table 17: Health expenditures by health care providers 2007-08 |  |            |  |  |  |
|--|--|------------|--|--|--|
| Provide  | ers classified by relevant categories of HP-Classification | Million Rs |  |  |  |
| HP.1   | Hospitals  | 101,922    |  |  |  |
| HP.1.1   | General Hospitals  | 97,786     |  |  |  |
| HP.1.1.1   | Government-owned General Hospitals                         | 69,007     |  |  |  |
| HP.1.1.1.1   | Hospitals under Federal Government                         | 11,453     |  |  |  |
| HP.1.1.1.2   | Hospitals Under Provincial and District Government         | 57,554     |  |  |  |
| HP.1.1.2   | Hospitals under Social Security                            | 1,086      |  |  |  |
| HP 1.1.3   | Hospital of autonomous bodies/ corporations                | 1,725      |  |  |  |
| HP 1.1.4   | Private Hospitals (Private for Profit entities)            | 20,436     |  |  |  |
| HP 1.1.5   | Hospitals Owned by Charitable Institutions/NGOs            | 5,532      |  |  |  |
| HP.1.2   | Mental health and substance abuse hospitals                | 18         |  |  |  |
| HP.1.3   | Other specialty Hospitals                                  | 4,118      |  |  |  |
| HP.3   | Providers of ambulatory health care                        | 82,989     |  |  |  |
| HP.3.1   | Offices of Physicians                                      | 6,518      |  |  |  |
| HP.3.2   | Dental clinics   | 2,603      |  |  |  |
| HP.3.3   | Offices of other Health Practitioners                      | 44,505     |  |  |  |
| HP.3.4   | Outpatient care centers                                    | 14,200     |  |  |  |
| HP.3.5   | Medical and diagnostic laboratories                        | 6,097      |  |  |  |
| HP.3.6   | Providers of home health services                          | -          |  |  |  |
| HP.3.9   | Other Providers of Ambulatory care                         | 9,066      |  |  |  |
| HP.4   | Retail sale and other providers of medical goods           | 81,919     |  |  |  |
| HP.5   | Provision and administration of public health programmes   | 8,201      |  |  |  |
| HP.6   | General health administration and insurance                | 6,922      |  |  |  |
| HP.8   | Institutions providing health related services             | 3,184      |  |  |  |
| HP.9   | Rest of the world  | 9,626      |  |  |  |
|  | Total of Providers   | 294,763    |  |  |  |

#### 2.4.3 Retailers of pharmaceuticals

Data on sales / purchases of pharmaceuticals has been provided by Intercontinental Marketing Services (IMS)<sup>3</sup> in March 2010. IMS claims to be the world's leading provider of market intelligence to the pharmaceutical and healthcare industries. Their data set of sales of pharmaceuticals is divided into fifteen broad functional categories as represented in the table below covering the period from October 2008 to September 2009. Data for the complete fiscal year was given for the totals of pharmaceutical sales, only. Therefore, the percentage share for each functional category

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<sup>&</sup>lt;sup>3</sup>http://www.imshealth.com/portal/site/imshealth

for October 2008 to September 2009 was applied to the total pharmaceutical sales of FY 2007-08. Other years are in the Annexure 11.

The percentage share for retail of pharmaceuticals, doctors' purchase and private hospital pharmacies' purchase was calculated from the figures available for Oct 2008 to Sep 2009. This percentage share was then applied to the total pharmaceutical sales of fiscal year.

| Table 18: Purchases of pharmaceuticals in Pakistan 2007-08 in million Rs |                 |                          |                       |                                |  |  |  |  |
|--|-----------------|--------------------------|-----------------------|--------------------------------|--|--|--|--|
|  | Total purchases | Purchases through retail | Doctor's<br>Purchases | Private Hospital<br>Pharmacies |  |  |  |  |
| Total  | 91,247          | 81,919                   | 5,755                 | 3,572                          |  |  |  |  |
| A - Alimentary T.& Metabolism  | 19,541          | 17,905                   | 961                   | 675                            |  |  |  |  |
| B - Blood + B. Forming Organs  | 2,809           | 2,498                    | 173                   | 138                            |  |  |  |  |
| C - Cardiovascular System  | 6,454           | 6,128                    | 162                   | 164                            |  |  |  |  |
| D - Dermatological   | 3,134           | 2,887                    | 172                   | 75                             |  |  |  |  |
| G - G.U. System & Sex Hormones   | 2,793           | 2,510                    | 159                   | 123                            |  |  |  |  |
| H - Systemic Hormones  | 943             | 816                      | 77                    | 50                             |  |  |  |  |
| J - Systemic Anti-Infective  | 24,266          | 20,741                   | 2,297                 | 1,227                          |  |  |  |  |
| K - Hospital Solutions   | 492             | 439                      | 21                    | 32                             |  |  |  |  |
| L - Antineoplast+Immunomodul   | 2,176           | 1,744                    | 258                   | 175                            |  |  |  |  |
| M - Musculo-Skeletal System  | 6,455           | 5,878                    | 334                   | 243                            |  |  |  |  |
| N - Nervous System   | 8,838           | 8,130                    | 421                   | 287                            |  |  |  |  |
| P - Parasitology   | 2,807           | 2,584                    | 164                   | 59                             |  |  |  |  |
| R - Respiratory System   | 6,932           | 6,512                    | 262                   | 158                            |  |  |  |  |
| S - Sensory Organs   | 1,782           | 1,444                    | 243                   | 95                             |  |  |  |  |
| T - Diagnostic Agents  | 54              | 30                       | 7                     | 17                             |  |  |  |  |
| V - Various  | 1,772           | 1,673                    | 45                    | 55                             |  |  |  |  |

Source: IMS

Total pharmaceutical sales in Pakistan in 2007-08 were 80 billion Rupees and after applying the markup, purchasers' prices are 91 billion Rupees. Markups for sales of pharmacies and other retailers of pharmaceuticals is 12.5% and for doctor's purchase and private hospital purchase is 14.5%. Sales of systemic anti-infective are the category with the highest turnover (29 billion Rupees) while pharmaceuticals of diagnostic agents have the lowest sales (54 million Rs). All pharmaceutical products show an increasing trend of sales from the fiscal year 2007-08 to 2008-09.

The total of the purchases through retailers (82 billion Rs) is the one entering the tables of provision of health care goods and services. The other sales (doctors and pharmacies of hospitals) are part of the expenditures already captured through the surveys of the providers. Thus, there is no double-counting.

#### 2.5 Current versus capital health expenditures

The health expenditures shown by financing sources and agents include some functions which for certain analysis are needed under a separate heading. One requirement may be to have current and capital health expenditures separately as the capital expenditures (often called "development expenditures") will have a positive impact on health of the country's population in subse-

quent years and not yet in the current period the figures are collected for. The empty cells in Table 19 indicate where empirically the break up into current and capital expenditures was not possible during this round of NHA .This break up was also not possible for the autonomous bodies.

Table 19: Current and capital health expenditures of territorial government 2007-08 by financing agents in million Rs

|            | Financing source           | Current exp. | Capital ex | penditure  | Total     |
|------------|----------------------------|--------------|------------|------------|-----------|
|            |                            | Million      | Rs         | % of total | Million R |
| HF.1.1     | Territorial government     |              |            |            | 78,967    |
| HF.1.1.1   | Federal Government         |              |            |            | 27,663    |
| HF.1.1.1.1 | Federal (Civil)            | 4,411        | 14,566     | 76.8       | 18,976    |
| HF.1.1.1.2 | Military                   |              |            |            | 8,688     |
| HF.1.1.2   | Provincial government      |              |            |            | 27,757    |
| HF.1.1.2.1 | Punjab                     | 10,093       | 2,369      | 19.0       | 12,462    |
| HF.1.1.2.2 | Sindh                      | 6,125        | 672        | 9.9        | 6,796     |
| HF.1.1.2.3 | KP                         | 6,763        |            |            | 6,763     |
| HF.1.1.2.4 | Balochistan                | 1,515        | 222.       |            | 1,737     |
| HF.1.1.3   | District/Tehsil Government |              |            |            | 23,547    |
| HF.1.1.3.1 | District Government        |              |            |            | 23,378    |
|            | Punjab                     | 13,063       | 11         | 0.1        | 1,3074    |
|            | Sindh                      | 5,081        | 539        | 9.6        | 5,620     |
|            | KP                         | 2,923        |            |            | 2,923     |
|            | Balochistan                | 1,762        |            |            | 1,762     |
| HF.1.1.3.2 | Cantonments Boards         |              |            |            | 168       |

The total of depicted capital expenditures is 18,379 million Rs. It is supposed that this figure is widely comprehensive as for the social security funds and for the agents of the private sector the share of capital expenditure is confined to some minor capital formation or – in case of households – is even zero. Given this, the current health expenditures of all financial agents would be confined to 315,253 million Rs.

Other health expenditures which do not have a direct impact on the health of human beings are education and research. In the health expenditures compiled for 2007-08 these "health related services" are 3.0 billion Rs (Table 17).

#### 2.6 Health care providers by financing agents

Matrix 2 shows the flow of funds for health expenditures in Pakistan channeled by financing agents (in columns) to the providers of health care (in rows). Reading example: in case of federal government, Ministry of Health, Ministry of Population Welfare, Ministry of Education, Ministry of Defense through military setup and other ministries are financing agents while hospitals or other health care facilities under the federal/provincial/district governments are the health care providers. The allocation to providers has been done as far as empirically possible. However, some amount falls under row "unspecified". For some agents (Reimbursements, Zakat and Bait-ul-Mal, local NGOs and the donor agencies) spending for health is available as unspecified, only.

The provider figures are not fully comprehensive as retailers for other health goods than pharmaceuticals are missing (opticians, retailers of hearing aids, artificial limbs, orthopedics etc.). But in full-fledged recording of providers even taxi drivers as well as florists, bakeries or canteens

(row "all other industries") should be accounted for as the payments for transports, gifts etc. are included in the health expenditures reported by the private households under OOPs. Therefore, it is plausible that the figures of current health expenditures (315 billion Rs) are a bit higher that the figures compiled from the providers' perspective (295 billion Rs). Given the fact that this is the first ever endeavor to criss-cross the figures for agents and providers and that there has been a lot of extrapolation and assumptions this discrepancy is tolerable and encouraging. It tends to come down when estimates for the opticians, taxi drivers etc. would be included. But it tends to increase when the decomposition of so far unspecified expenditures (e.g. local NGOs) are partly attributed to private health care providers.

|                  |   |                | Matrix 2: Fi                | nancing a          | gents by      | y health     | care p     | rovider                         | s 2007-0      | 8 in mil          | lion Rs          |                   |               |                             |         |
|------------------|---|----------------|-----------------------------|--------------------|---------------|--------------|------------|---------------------------------|---------------|-------------------|------------------|-------------------|---------------|-----------------------------|---------|
|                  |   |                |                             | _                  | _             | _            | _          | _                               | Financin      | g agents          | _                | _                 | _             | _                           |         |
|                  |   |                |                             |                    |               | HF.1 Gen     | eral Gover | nment                           |               |                   | HF.2             | 2 Private Se      | ctor          |                             |         |
|                  |   |                |                             | HF.1.1 Territorial |               | I Government |            | HF.1.2 Social<br>Security Funds |               | HF.1.3            | HF.2.2<br>Other  | HF.2.3<br>Private |               | HF.3.1<br>Official<br>donor | Total   |
|                  |   |                |                             | Fed. G             | Sovt. Prov- D | District     |            | Zakat &                         | Auton omous   | private<br>insur- | house-<br>holds' | HF.2.4<br>NGOs    | agen-<br>cies | i Otai                      |         |
|                  |   | Health care    | providers                   | civil              | Military      | inces        | bodies     | ESSI                            | Baitul<br>Mal | Bodies            | ance             | OOP               |               | CIES                        |         |
|                  | HP.1.1  | HP.1.1.1       | Gov. owned gen. hosp.       | 4,270              | 7,183         | 16,453       | 17,135     |                                 |               |                   |                  | 23,966            |               |                             | 69,007  |
|                  | Gen-  | HP.1.1.2       | Hosp. under Soc. Secur.     |                    |               |              |            | 1,086                           |               |                   |                  |                   |               |                             | 1,086   |
| HP.1             | eral  | HP.1.1.3       | H. of federal ABs/C         |                    |               |              |            |                                 |               | 1,725             |                  |                   |               |                             | 1,725   |
| Hospi-           | Hospi-<br>tals                                      | HP.1.1.4       | Private Hospitals           |                    |               |              |            |                                 |               |                   |                  | 20,436            |               |                             | 20,436  |
| tals             |   | HP.1.1.5       | owned by Charity / NGOs     |                    |               |              |            |                                 |               |                   |                  | 5,532             |               |                             | 5,532   |
|                  | HP.1.2  | Mental Hea     | alth & Substance Abuse H.   |                    |               |              |            |                                 |               |                   |                  | 18                |               |                             | 18      |
|                  | HP.1.3  | Other Spec     | cialty hospitals            | 36                 | 61            | 139          | 144        |                                 |               |                   |                  | 3,738             |               |                             | 4,118   |
|                  | HP.3.1  | Offices of Phy | /sicians                    |                    |               |              |            |                                 |               |                   |                  | 6,518             |               |                             | 6,518   |
| HP.3             | HP.3.2  | Dental Clinics |                             |                    |               |              |            |                                 |               |                   |                  | 2,603             |               |                             | 2,603   |
| Pro-<br>vider    | HP.3.3  | Offices of oth |                             |                    |               |              |            |                                 |               |                   | 44,505           |                   |               | 44,505                      |         |
| of               | Outpoti   | ant Cara Can   | HP. 3.4.1 Public            | 859                | 1,444         | 3,308        | 3,492      | 1,289                           |               |                   |                  | 1,828             |               |                             | 12,220  |
| Ambu-            | Outpati   | ent Care Cen   | HP. 3.4.2 Private           |                    |               |              |            |                                 |               |                   |                  | 1,980             |               |                             | 1,980   |
| latory<br>Health | HP.3.5  | Medical & Dia  | agnostic Labs               |                    |               |              |            |                                 |               |                   |                  | 6,097             |               |                             | 6,097   |
| Care             | HP.3.6  | Provider of ho | ome health care services    |                    |               |              |            |                                 |               |                   |                  |                   |               |                             | 0       |
|                  | HP.3.9  | Other provide  | ers of ambulatory care      |                    |               |              |            |                                 |               |                   |                  | 9,066             |               |                             | 9,066   |
| HP.4 Re          |   |                | ders of medical goods       |                    |               |              |            |                                 |               |                   |                  | 81,919            |               |                             | 81,919  |
| HP.5 Pro         | ovision   |                | . Planning & Prim. H. Care  | 3,619              |               |              |            |                                 |               |                   |                  |                   |               |                             | 3,619   |
| & admin          |   | HP.5.2 Imm     | uniz. (EPI), Diarrheal Dis. | 1,961              |               | 250          | 53         |                                 |               |                   |                  |                   |               |                             | 2,264   |
| program          |   | HP.5.3 to HI   | P.5.10 Other Programs       | 1,905              |               | 249          | 164        |                                 |               |                   |                  |                   |               |                             | 2,318   |
| HP.6 Ge          | neral He  | alth admin &   |                             | 1,898              |               | 2,211        | 2,290      |                                 |               |                   | 523              |                   |               |                             | 6,922   |
|                  | P.7 All other industries                            |                |                             |                    |               |              |            |                                 |               |                   |                  |                   |               |                             | 0       |
|                  | HP.8 Institutions providing health related services |                |                             |                    |               | 2,907        | 269        |                                 |               |                   |                  |                   |               |                             | 3,184   |
|                  | HP.9 Rest of the world                              |                |                             |                    |               |              |            |                                 |               |                   |                  |                   |               | 9,626                       | 9,626   |
|                  |   |                | Unspecified                 | 4,420              |               | 2,240        |            |                                 | 884           |                   |                  | 12,302            | 19,023        | •                           | 38,869  |
|                  |   |                | Total health expenditures   | 18,976             | 8,688         | 27,757       | 23,547     | 2,375                           | 884           | 1,725             | 523              | 220,508           | 19,023        | 9,626                       | 333,632 |

#### 2.7 Comparison of NHA with WHO figures

The annual per capita health expenditures for Pakistan as per NHA 2007-08 are 35 US\$. This is much more than the figures which have been reported to WHO for their publication (22.5 US\$ as the average between 2007 and 2008) and respective numbers for India and Bangladesh are 41.5 US\$ and16 US\$ respectively. The reason is that NHA includes a lot of components which the data reported to WHO did not account for. The ratios of health expenditures 2007-08 according to NHA over GDP are 3.36% while public sector health expenditures according to NHA over government expenditures are 6.57%. The private sector health expenditures according to NHA over total private expenditures are 3.07%.

The WHO data has been taken from its website. WHO has presented this data by calendar year. The average of two calendar years 2007 and 2008 has been taken to make it comparable with Pakistan NHA which is based on FY 2007-08.

|        | Table 20: Comparison with WHO figures in million Rs |                         |                    |         |         |  |  |  |  |  |  |  |
|--------|---|-------------------------|--------------------|---------|---------|--|--|--|--|--|--|--|
|        |   |                         |                    | WHO     |         |  |  |  |  |  |  |  |
|        | Classification                                      | NHA Pakistan<br>2007-08 | Average<br>2007-08 | 2007    | 2008    |  |  |  |  |  |  |  |
| HF.1   | General government                                  | 83,952                  | 78,104             | 69,111  | 87,096  |  |  |  |  |  |  |  |
| HF.1.2 | Social Security Fund                                | 3,259                   | 3,431              | 3,028   | 3,833   |  |  |  |  |  |  |  |
| HF.2.3 | Private HH's OOP                                    | 220,508                 | 132,207            | 127,580 | 136,834 |  |  |  |  |  |  |  |
| HF.3.1 | Official Donor Agencies                             | 9,626                   | 10,456             | 7,875   | 13,037  |  |  |  |  |  |  |  |

Source WHO-figures: <a href="http://apps.who.int/nha/database/StandardReport.aspx?ID=REP\_WEB\_MINI\_">http://apps.who.int/nha/database/StandardReport.aspx?ID=REP\_WEB\_MINI\_
\_TEMPLATE\_WEB\_VERSION&COUNTRYKEY=84701</a>

The general government health expenditures according to NHA Pakistan exceed the WHO figures as NHA Pakistan includes the military health expenditures, reimbursement of medical charges for the government employees, health education expenditures etc. OOP expenditures exceed the WHO figures because NHA has incorporated the special OOP health expenditures survey. Donors' expenditures in NHA are less than WHO figures. This may be due to the fact that NHA Pakistan does not include FATA, FANA and AJK. Another issue, which is already discussed, is that NHA does not double-count the funds transferred from one source to other source i.e. donors to government. According to NHA:

- Total health expenditures are 3.36% of GDP (current factor cost) in2007-08.<sup>4</sup>
- General government health expenditures are 6.57% of general government expenditures in 2007-08 as according to national accounts.<sup>5</sup>
- Private health expenditures are 3.07% of private expenditures as according to national accounts.<sup>6</sup>

<sup>&</sup>lt;sup>4</sup> Pakistan Bureau of Statistics, National Accounts, Gross National Product of Pakistan (at current factor costs)

<sup>&</sup>lt;sup>5</sup> Pakistan Bureau of Statistics, National Accounts, Expenditure on GNP at current prices, general government current consumption expenditure

<sup>&</sup>lt;sup>6</sup> Pakistan Bureau of Statistics, National Accounts, Expenditure on GNP at current prices, private consumption expenditure

## 3 Provincial Health Accounts

The province wise breakdown of health expenditures in the literature is called Regional Health Accounts<sup>7</sup> or Provincial Health Accounts<sup>8</sup>. The following matrices show the total health expenditures for each Province.

Provincial Health Accounts are sub-accounts of the NHA and track expenditures on health for a specific regional section of the health system. Similar to NHA, the sub-accounts measure the expenditures by financing sources, financing agents, health care providers and functions and show the flow of resources through the construction of matrices. But it is imperative to understand the criterion of regionalization. The expenditures are allocated to the regions according to the location where the health care has been provided. The residency of the patient is not a criterion, at all. The expenditures of a resident of Punjab in a clinic at Peshawar would be recorded as expenditure in KP. Accordingly, the military health expenses are allocated to the location of the military health facilities. Nevertheless, it can be assumed that the figures widely reflect the regional distribution of benefits by residency of the patients.

It is worth mentioning here that in the second round the matrices do reflect the expenditures incurred by the Federal Government which were allocated to the respective provinces.

In Punjab, the expenditures made by its provincial government in its capacity as financial agent were the lowest among the provinces (7.4%). The share of social security is 1%. OOP expenditures of private households as agents account for 73.8% of overall all health expenditures made in Punjab.

In Sindh, agent's expenditures made by its government were 8.7% of overall expenditures. The share of social security is only 0.83%. The share of private households' OOP expenditure is 68.6%.

In KP, the expenditures made by the provincial government were 13.3%. In KP and Balochistan, the share of social security expenditures is 0.2% which is the lowest among all provinces. In KP, the share of OOP is 59.6%. The share of donor in overall health expenditures in KP is 7.8%.

In Balochistan, the share of expenditures of the provincial government is 9.5% and of the district government is 9.6% while the share of OOP health expenditures were 62.68%.

<sup>&</sup>lt;sup>7</sup>See WHO, Workshop on Health Financing in Pakistan, 2007, <a href="http://www.who.int/nha/events/en/">http://www.who.int/nha/events/en/</a>.

<sup>8</sup>See ADB, Technical Assistance Completion Report, 1997, <a href="http://www.adb.org/Documents/TACRs/PNG/tacr-png-2772.pdf">http://www.adb.org/Documents/TACRs/PNG/tacr-png-2772.pdf</a>.

|                 |                        |                          | Matrix 3            | : Financing           | sources by                   | financing                  | g agents -                                 | Punjab 2        | 2007-08 in ı       | nillion Re              | s              |                               |         |      |
|-----------------|------------------------|--------------------------|---------------------|-----------------------|------------------------------|----------------------------|--|-----------------|--------------------|-------------------------|----------------|-------------------------------|---------|------|
|                 |                        |                          |                     |                       |                              |                            |  | F               | Financing sour     | ces                     |                |                               |         |      |
|                 |                        |                          |                     |                       |                              | FS.1 Public                | funds                                      |                 | FS.2 Private funds |                         |                | FS.3 ROW                      |         |      |
|                 |                        |                          |                     |                       | FS.1.1 Government Funds      |                            |  | FS.2.1          | FS.2.2             | FS.2.3                  | FS.3.1         |                               |         |      |
|                 | F                      | inancing agents          |                     |                       | FS.1.1.1<br>Federal<br>Govt. | FS.1.1.2<br>Prov.<br>Govt. | FS.1.1.3<br>District /<br>Tehsil<br>bodies | FS.1.2<br>ABs/C | Employer<br>funds  | House-<br>hold<br>funds | Local<br>NGO's | Official<br>donor<br>agencies | Total   | %    |
|                 |                        | HF.1.1.1                 | Federal             | Govt. (civil)         |                              |                            |  |                 |                    |                         |                |                               |         |      |
|                 |                        | Federal<br>Govt.         | Military<br>penditu | health ex-<br>res     | 6,518                        |                            |  |                 |                    |                         |                |                               | 6,518   | 3.9  |
|                 |                        |                          | Health              |                       | 2,439                        | 11,942                     |  |                 |                    |                         |                |                               | 14,381  | 8.6  |
|                 | HF.1.1<br>Territorial  | HF.1.1.2<br>Provincial   | Dept.<br>of:        | Other                 | 639                          | 11                         |  |                 |                    |                         |                |                               | 650     | 0.4  |
|                 | Govt.                  | Govt.                    |                     | Population<br>Welfare | 1,629                        | 19                         |  |                 |                    |                         |                |                               | 1,648   | 1.0  |
| HF.1<br>General |                        |                          | Health e            | ducation              | 0                            | 489                        |  |                 |                    |                         |                |                               | 489     | 0.3  |
| Govt.           |                        | HF.1.1.3<br>District     | District            | Government            |                              |                            | 13,074                                     |                 |                    |                         |                |                               | 13,074  | 7.8  |
|                 |                        | Bodies                   | Cantt. B            | oards                 |                              |                            | 113  |                 |                    |                         |                |                               | 113     | 0.1  |
|                 | HF.1.2                 | HF.1.2.1<br>Social secu- | ESSI                |                       |                              |                            |  |                 | 1,600              |                         |                |                               | 1,600   | 1.0  |
|                 | Social security        | rity funds<br>through    | Zakat he            | ealth expend          |                              |                            |  |                 |                    | 107                     |                |                               | 107     | 0.1  |
|                 | funds                  | Govt.                    | Bait UI I           | Vlal                  |                              |                            |  |                 |                    | 254                     |                |                               | 254     | 0.2  |
|                 |                        | HF.1.3 A                 | Bs/C                |                       |                              |                            |  | 113             |                    |                         |                |                               | 113     | 0.1  |
| HF.2 Priv.      |                        | te households'           |                     |                       | 3,160                        | 1,184                      | 26   | 176             | 24                 | 118,946                 |                |                               | 123,516 | 73.8 |
| Sector          | HF.2.4 Loca<br>(NGO's) | l Non-Governm            | ent Organi          | zations               |                              |                            |  |                 |                    |                         | 4,297          |                               | 4,297   | 2.6  |
| HF.3 ROW        | HF.3.1 Offic           | ial donor agenc          | ies                 |                       |                              | _                          | _  | _               | _                  |                         |                | 702                           | 702     | 0.4  |
|                 |                        |                          |                     | Total                 | 14,385                       | 13,645                     | 13,213                                     | 289             | 1,624              | 119,307                 | 4,297          | 702                           | 167,462 | 100  |
|                 |                        |                          |                     | %                     | 8.59                         | 8.15                       | 7.89                                       | 0.17            | 0.97               | 71.24                   | 2.57           | 0.42                          | 100     |      |

|                 |                        |                          | Matrix              | 4։ Financin           | g sources by                 | / financin                 | g agents                                   | - Sindh 2       | 007-08 in n       | nillion Rs              |                |                               |        |       |
|-----------------|------------------------|--------------------------|---------------------|-----------------------|------------------------------|----------------------------|--|-----------------|-------------------|-------------------------|----------------|-------------------------------|--------|-------|
|                 |                        |                          |                     |                       |                              |                            |  | F               | inancing sour     | ces                     |                |                               |        |       |
|                 |                        |                          |                     |                       |                              | FS.1 Public                | funds                                      |                 | FS.2              | Private fund            | ls             | FS.3 ROW                      |        |       |
|                 |                        |                          |                     |                       | FS.1.1 Government Funds      |                            |  | FS.2.1          | FS.2.2            | FS.2.3                  | FS.3.1         |                               |        |       |
|                 | F                      | inancing agents          |                     |                       | FS.1.1.1<br>Federal<br>Govt. | FS.1.1.2<br>Prov.<br>Govt. | FS.1.1.3<br>District /<br>Tehsil<br>bodies | FS.1.2<br>ABs/C | Employer<br>funds | House-<br>hold<br>funds | Local<br>NGO's | Official<br>donor<br>agencies | Total  | %     |
|                 |                        | HF.1.1.1                 |                     | Govt. (civil)         |                              |                            |  |                 |                   |                         |                |                               |        |       |
|                 |                        | Federal<br>Govt.         | Military<br>penditu | health ex-<br>res     | 782                          |                            |  |                 |                   |                         |                |                               | 782    | 0.97  |
|                 | Health                 |                          | 896                 | 5,669                 |                              |                            |  |                 |                   |                         | 6,565          | 8.17                          |        |       |
|                 | HF.1.1<br>Territorial  | erritorial Provincial    | -E                  | of: other Population  | 114                          |                            |  |                 |                   |                         |                |                               | 114    | 0.14  |
|                 | Govt.                  |                          |                     | Population<br>Welfare | 696                          | 27                         |  |                 |                   |                         |                |                               | 723    | 0.90  |
| HF.1<br>General |                        |                          | Health 6            | education             | 0                            | 1,100                      |  |                 |                   |                         |                |                               | 1,100  | 1.37  |
| Govt.           |                        | HF.1.1.3<br>District     | District            | Government            |                              |                            | 5,620                                      |                 |                   |                         |                |                               | 5,620  | 7.0   |
|                 |                        | Bodies                   | Cantt. E            | Boards                |                              |                            | 31   |                 |                   |                         |                |                               | 31     | 0.04  |
|                 | HF.1.2                 | HF.1.2.1<br>Social secu- | ESSI                |                       |                              |                            |  |                 | 647               |                         |                |                               | 647    | 0.81  |
|                 | Social security        | rity funds               | Zakat h             | ealth expend          |                              |                            |  |                 |                   | 33                      |                |                               | 33     | 0.04  |
|                 | funds                  | through<br>Government    | Bait UI             | Mal                   |                              |                            |  |                 |                   | 18                      |                |                               | 18     | 0.02  |
|                 |                        | HF.1.3 A                 | Bs/C                |                       |                              |                            |  | 61              |                   |                         |                |                               | 61     | 0.08  |
| HF.2 Priv.      | HF.2.3 Priva           | te households'           | out-of-poo          | ket payment           | 1,256                        | 689                        | 8  | 256             | 22                | 51,335                  |                | _                             | 23,566 | 69.53 |
| Sector          | HF.2.4 Loca<br>(NGO's) | l Non-Governme           | ent Organi          | zations               |                              |                            |  |                 |                   |                         | 8,166          |                               | 8,166  | 10.17 |
| HF.3 ROW        | HF.3.1 Offic           | ial donor agenci         | es                  |                       |                              | _                          |  | _               | _                 |                         |                | 610                           | 610    | 0.76  |
|                 |                        |                          |                     | Total                 | 3,744                        | 7,485                      | 5,659                                      | 317             | 669               | 51,386                  | 8,166          | 610                           | 78,036 | 100   |
|                 |                        |                          |                     | %                     | 3.19                         | 9.32                       | 7.05                                       | 0.39            | 0.83              | 68.38                   | 10.17          | 0.76                          | 100    |       |

|                 |                        | Matrix 5                 | 5: Financ         | cing source           | s by financi                 | ng agents                  | s – Khybe                                  | er Pakhtu       | nkhwa 200                   | 7-08 in m               | illion Rs                |                               |        |       |
|-----------------|------------------------|--------------------------|-------------------|-----------------------|------------------------------|----------------------------|--|-----------------|-----------------------------|-------------------------|--------------------------|-------------------------------|--------|-------|
|                 |                        |                          |                   |                       |                              |                            |  | F               | Financing sour              | ces                     |                          |                               |        |       |
|                 |                        |                          |                   |                       |                              | FS.1 Public                | funds                                      |                 | FS.2                        | FS.2 Private funds FS   |                          |                               |        |       |
|                 |                        |                          |                   |                       | FS.1.1 Government Funds      |                            |  | 50.04           | FS.2.2                      | F0.00                   | FS.3.1                   |                               |        |       |
|                 | F                      | inancing agents          |                   |                       | FS.1.1.1<br>Federal<br>Govt. | FS.1.1.2<br>Prov.<br>Govt. | FS.1.1.3<br>District /<br>Tehsil<br>bodies | FS.1.2<br>ABs/C | FS.2.1<br>Employer<br>funds | House-<br>hold<br>funds | FS.2.3<br>Local<br>NGO's | Official<br>donor<br>agencies | Total  | %     |
|                 |                        | HF.1.1.1                 |                   | Gov. (civil)          |                              |                            |  |                 |                             |                         |                          |                               |        |       |
|                 |                        | Federal<br>Govt.         | Military penditur | health ex-<br>es      | 381                          |                            |  |                 |                             |                         |                          |                               | 381    | 0.75  |
|                 |                        |                          |                   | Health                | 867                          | 3,642                      |  |                 |                             |                         |                          |                               | 4,509  | 8.87  |
|                 | HF.1.1<br>Territorial  | Provincial Govt.         | Dept.<br>of:      | other                 | 10                           | 2,114                      |  |                 |                             |                         |                          |                               | 2,124  | 4.18  |
|                 | Govt.                  |                          |                   | Population<br>Welfare | 400                          | 7                          |  |                 |                             |                         |                          |                               | 407    | 0.80  |
| HF.1<br>General |                        |                          | Health e          | ducation              | 0                            | 1,000                      |  |                 |                             |                         |                          |                               | 1,000  | 1.97  |
| Govt.           |                        | HF.1.1.3<br>District     | District          | Government            |                              |                            | 2,923                                      |                 |                             |                         |                          |                               | 2,923  | 5.75  |
|                 |                        | Bodies                   | Cantt. B          | oards                 |                              |                            | 20   |                 |                             |                         |                          |                               | 20     | 0.04  |
|                 | HF.1.2                 | HF.1.2.1<br>Social secu- | ESSI              |                       |                              |                            |  |                 | 90                          |                         |                          |                               | 90     | 0.18  |
|                 | Social security        | rity funds               | Zakat he          | ealth expend          |                              |                            |  |                 |                             | 26                      |                          |                               | 26     | 0.05  |
|                 | funds                  | through<br>Govt.         | Bait UI N         | Mal                   |                              |                            |  |                 |                             | 42                      |                          |                               | 42     | 0.08  |
|                 |                        | HF.1.3 A                 | Bs/C              |                       |                              |                            |  | 49              |                             |                         |                          |                               | 49     | 0.10  |
| HF.2 Priv.      |                        | te households'           |                   |                       | 1,033                        | 264                        | 3  | 71              | 9                           | 28,891                  |                          |                               | 30,271 | 59.58 |
| Sector          | HF.2.4 Loca<br>(NGO's) | l Non-Governme           | ent Organi:       | zations               |                              |                            |  |                 |                             |                         | 5,028                    |                               | 5,028  | 9.90  |
| HF.3 ROW        | HF.3.1 Offic           | ial donor agenc          | ies               |                       |                              |                            |  |                 |                             |                         |                          | 3,941                         | 3,941  | 7.76  |
|                 |                        |                          |                   | Total                 | 2,691                        | 7,027                      | 2,946                                      | 120             | 99                          | 28,959                  | 5,028                    | 3,941                         | 50,811 | 100   |
|                 |                        |                          |                   | %                     | 5.30                         | 13.83                      | 5.80                                       | 0.24            | 0.19                        | 57.00                   | 9.90                     | 7.76                          | 100    |       |

|                 |                        | Ma                              | atrix 6: F          | inancing so           | ources by fir                | nancing a                  | gents - B                                  | Balochista      | n 2007-08 i       | n million               | Rs             |                               |        |       |
|-----------------|------------------------|---------------------------------|---------------------|-----------------------|------------------------------|----------------------------|--|-----------------|-------------------|-------------------------|----------------|-------------------------------|--------|-------|
|                 |                        |                                 |                     |                       |                              |                            |  | F               | inancing sour     | ces                     |                |                               |        |       |
|                 |                        |                                 |                     |                       |                              | FS.1 Public                | funds                                      |                 | FS.2              | Private fund            | İs             | FS.3 ROW                      |        |       |
|                 |                        |                                 |                     |                       | FS.1.1 Government Funds      |                            |  | FS.2.1          | FS.2.2            | FS.2.3                  | FS.3.1         |                               | 21     |       |
|                 | F                      | inancing agents                 |                     |                       | FS.1.1.1<br>Federal<br>Govt. | FS.1.1.2<br>Prov.<br>Govt. | FS.1.1.3<br>District /<br>Tehsil<br>bodies | FS.1.2<br>ABs/C | Employer<br>funds | House-<br>hold<br>funds | Local<br>NGO's | Official<br>donor<br>agencies | Total  | %     |
|                 |                        | HF.1.1.1                        | Federal             | Govt. (civil)         |                              |                            |  |                 |                   |                         |                |                               |        |       |
|                 |                        | Federal<br>Govt.                | Military<br>penditu | health ex-<br>res     | 894                          |                            |  |                 |                   |                         |                |                               | 894    | 4.74  |
|                 |                        |                                 | Health              |                       | 404                          | 1,356                      |  |                 |                   |                         |                |                               | 1,760  | 9.35  |
|                 | HF.1.1<br>Territorial  | HF.1.1.2<br>Provincial<br>Govt. | Dept.<br>of:        | other                 | 105                          | 62                         |  |                 |                   |                         |                |                               | 167    | 0.89  |
|                 | Govt.                  |                                 |                     | Population<br>Welfare | 247                          |                            |  |                 |                   |                         |                |                               | 247    | 1.31  |
| HF.1<br>General |                        |                                 | Health e            | ducation              | 0                            | 319                        |  |                 |                   |                         |                |                               | 319    | 1.69  |
| Govt.           |                        | HF.1.1.3<br>District            | District            | Government            |                              |                            | 1,762                                      |                 |                   |                         |                |                               | 1,762  | 9.36  |
|                 |                        | Bodies                          | Cantt. B            | oards                 |                              |                            | 4  |                 |                   |                         |                |                               | 4      | 0.02  |
|                 | HF.1.2                 | HF.1.2.1<br>Social secu-        | ESSI                |                       |                              |                            |  |                 | 38                |                         |                |                               | 38     | 0.20  |
|                 | Social security        | rity funds                      | Zakat he            | ealth expend          |                              |                            |  |                 |                   | 2                       |                |                               | 2      | 0.01  |
|                 | funds                  | through<br>Govt.                | Bait UI             | Vlal                  |                              |                            |  |                 |                   | 13                      |                |                               | 13     | 0.07  |
|                 |                        | HF.1.3 A                        | ABs/C               |                       |                              |                            |  | 2               |                   |                         |                |                               | 2      | 0.01  |
| HF.2 Priv.      | HF.2.3 Priva           | te households'                  | out-of-poc          | ket payment           | 249                          | 257                        | 1  | 5               | 4                 | 10,978                  |                |                               | 11,494 | 63.64 |
| Sector          | HF.2.4 Loca<br>(NGO's) | l Non-Governm                   | ent Organi          | zations               |                              |                            |  |                 |                   |                         | 1,532          |                               | 1,532  | 8.14  |
| HF.3 ROW        | HF.3.1 Offic           | ial donor agenc                 | ies                 |                       |                              |                            |  |                 |                   |                         |                | 105                           | 105    | 0.56  |
|                 |                        |                                 |                     | Total                 | 1,899                        | 1,994                      | 1,767                                      | 7               | 42                | 10,993                  | 1,532          | 105                           | 18,339 | 100   |
|                 |                        |                                 |                     | %                     | 8.76                         | 10,59                      | 9.38                                       | 0.04            | 0.22              | 62.30                   | 8.14           | 0.56                          | 100    |       |

Overall, these results show that the shares of financing agents of the health expenditures are relatively heterogeneous between different provinces. Table 20 provides the data of the provinces plus those for Islamabad Capital Territory (ICT) and the unregionalized part of Federal Government.

| Table 21: Total health       | expenditu | res 2007- | 08 by pro | ovinces ar      | nd type | of expend           | diture   |
|------------------------------|-----------|-----------|-----------|-----------------|---------|---------------------|----------|
| Type of health expenditure   | Punjab    | Sindh     | KP        | Balochis<br>tan | ICT     | Unregio-<br>nalised | Pakistan |
|                              |           | Millio    | n Rs      |                 |         |                     |          |
| Military Health Expenditure  | 6,518     | 782       | 381       | 894             | 192     | -                   | 8,76     |
| Federal Government           | 4,707     | 1,706     | 1,277     | 757             | 3,499   | 7,030               | 18,97    |
| Provincial Government        | 13,645    | 7,485     | 7,027     | 1,993           |         | -                   | 30,15    |
| District Government          | 13,074    | 5,620     | 2,923     | 1,762           |         | -                   | 23,37    |
| Cant. Boards                 | 139       | 39        | 21        | 5               |         | -                   | 20       |
| ESSI                         | 1,624     | 669       | 98        | 42              |         | -                   | 2,43     |
| Zakat Health Expenditure     | 107       | 33        | 26        | 2               | 1       | 388                 | 55       |
| Private Insurance            | -         | -         | -         | -               | -       | 960                 | 96       |
| OOP Health Expenditure       | 118,946   | 51,335    | 28,891    | 10,978          | 1,635   | -930                | 210,85   |
| Donors Organizations         | 702       | 610       | 3,941     | 105             | 1,519   | 2,750               | 9,62     |
|                              |           | %         | ,         |                 |         |                     |          |
| Military Health Expenditure  | 74.3      | 8.9       | 4.3       | 10.2            | 2.2     | -                   | 100      |
| Federal Government           | 24.8      | 9.0       | 6.7       | 4.0             | 18.4    | 37.0                | 10       |
| Provincial Government        | 45.3      | 24.8      | 23.3      | 6.6             | -       | -                   | 10       |
| District Government          | 55.9      | 24.0      | 12.5      | 7.5             | -       | -                   | 1(       |
| Cant. Boards                 | 68.1      | 19.1      | 10.3      | 2.5             | -       | -                   | 10       |
| Social Security Institutions | 66.7      | 27.5      | 4.0       | 1.7             | -       | -                   | 10       |
| Zakat Health Expenditure     | 19.2      | 5.9       | 4.7       | 0.4             | 0.2     | 69.7                | 10       |
| Private Insurance            | -         | -         | -         | -               | -       | 100.0               | 10       |
| OOP Health Expenditure       | 56.01     | 24.29     | 13.73     | 5.21            | 0.75    | -                   | 10       |
| Donors Organizations         | 7.3       | 6.3       | 40.9      | 1.1             | 15.8    | 28.6                | 10       |

Note: The table shows the health expenditures which is based on financing agent's classification. Reimbursements are included in Provincial Expenditures

The health expenditures shown in Table 21 as "unregionalized / federal" are those of federal government's civilian part. They include the vertical programs on health running across the country. Due to lack of data, they cannot be disaggregated by province. Since the disaggregated data on private health insurance is not available, this is included in the "unregionalised/federal" category. ICT means expenditure in Islamabad area which is separate from federal government.

# 4 Private Health Care Providers Census & Survey

#### 4.1 Introduction

Health care providers constitute one of the dimensions of the National Health Accounts (NHA). They include entities that receive money in exchange for or in anticipation of producing the activities inside the health accounts boundary. Examples of health care providers are hospitals, clinics, Community Health Centers, pharmacies, private practitioners, traditional health care providers etc.

For purpose of NHA, public sector and private sector providers were distinguished as two mutually exclusive groups. Public sector providers were covered from the federal, provincial appropriation accounts and district accounts. For coverage of the private providers, mix strategy of census and survey approach was adopted. Big hospitals (≥50 beds) were covered through census while the rest of private health care providers were covered through survey approach. For both census and survey, separate questionnaires were developed considering their operating mechanisms. The combination of census and survey was carried out in Pakistan for the very first time. The response rate was quite good, for the census of big hospitals it was almost100%, and for the survey of private health care providers it was 98%.

Estimated health expenditures incurred by both big hospitals (≥50 beds) covered in census and small hospitals (<50 beds) covered in the survey in 2009-10 amount to 25,753 million Rupees and 12,289 million Rupees respectively. For the purpose of report on private health care providers in Pakistan, both big hospitals and small hospitals have been merged in terms of number and expenditures and categorized as "Hospitals". Estimated total health expenditures for all type of private health care providers in Pakistan in FY 2009-10 are 122,048 million Rupees. Since the reference period of National Health Account report is 2007-08, health expenditures of private health care providers have also been deflated and retropolated from 2009-10 to 2007-08 by using various techniques. Deflated and retropolated expenditures of private health care providers for 2007-08 amount to 100,495 million Rupees.

#### 4.2 Methodology of the Census

For census, frame for big hospitals was developed by gathering information from all possible sources, e.g. Economic Census 2005, regional offices of Pakistan Bureau of Statistics, websites of corresponding hospitals and desk review. In census, 125 big hospitals were covered across the country which were functioning in 2009-10.

A separate questionnaire was developed (see Annexure 12) and the regional offices of Pakistan Bureau of Statistics collected the information from the hospitals in their field jurisdiction. Information about expenditures in last month, 2009-10 and 2007-08 was requested. The reason to collect the information about three reference periods was that if one hospital has no old record then it would have at least the latest record. All the hospitals responded and coverage was 100%. Out of 125 hospitals, 104 hospitals provided the information about the year 2007-08 while 121 hospitals provided the information about the year 2009-10. The missing values of health expenditures for the years 2007-08 and 2009-10 were estimated.

4.3 Methodology of the Survey

The survey was conducted in four province of Pakistan. A sample of 2160 primary sampling units (PSUs) was selected and 206,587 health care providers were estimated in Pakistan for FY 2009-10. The target population consists of following eight categories of health care providers/facilities. Listing Form was developed to cover health care facilities in the selected sample areas.

- Small hospitals up to 49 beds.
- Individually run General Practitioner clinics.
- Dental clinics.
- Specialty clinics.
- Paramedics running clinics.
- Outpatient care centers.
- Laboratories and diagnostic services.
- Homeopaths, Hakeems, Tabibs and other traditional health care providers.

A single stage stratified sample design was used for this survey. Enumeration blocks in the cities /towns comprising 200-250 households and villages were primary sampling units. PBS developed urban area frame for all urban areas of four provinces. This frame had been updated during Economic Census field work in 2003-04. The information about health facilities obtained in respect of each enumeration block was used as measures of size. Similarly list of villages/mouzas/dehs resulting from 1998 Population Census was adopted as sampling frame for rural areas. The information about health facilities as collected through Economic Census 2003-04 in respect of each village/mouza/deh was used as measure of size for selecting sample from rural areas of the four provinces. The stratification was planned as follows:

- Fourteen cities of four provinces, constituted an independent stratum. The selected big cities are Karachi, Lahore, Faisalabad, Rawalpindi, Gujranwala, Multan, Sargodha, Sialkot, Islamabad, Bahawalpur, Hyderabad, Sukkur, Peshawar and Quetta.
- Excluding big cities from the respective administrative division of each province, the remaining cities/towns of administrative division were grouped together to form another stratum.
- All rural areas within the jurisdiction of administrative division in the four provinces were combined together to constitute an independent stratum. This is called rural areas stratum.
- Within each stratum of big cities other urban and rural areas of the four provinces four sub-strata were formulated to control variation of health care facilities. Stratum-I was called certainly stratum that in each block/villages have (25 or more) health care facilities, Stratum-II having 10-24 facilities, Stratum-III have less than10 facilities and if there is no health care facility in any block/village named Stratum-IV.

In order to generate reliable estimates of the key variables of the survey at provincial level, an exercise to fix sample size has been undertaken. The sample size was fixed at 21884 health care facilities from 2160 sample areas (PSUs) comprising 1335 urban and 825 rural areas of the four provinces. It is expected that this sample will yield reliable estimates with the desired precision. The distribution of sample size among provinces is shown in Table 22.

Table 22: Primary Sampling Units (PSUs) for sample survey of private health care providers, 2009-10

| No. of blocks/ villages                           |     |     |     |     |     |  |  |  |  |  |  |  |
|---|-----|-----|-----|-----|-----|--|--|--|--|--|--|--|
| Province Big Cities Other Urban Urban Rural Total |     |     |     |     |     |  |  |  |  |  |  |  |
| Punjab  | 300 | 270 | 570 | 270 | 840 |  |  |  |  |  |  |  |
| Sindh   | 180 | 135 | 315 | 165 | 480 |  |  |  |  |  |  |  |
| KP  | 30  | 210 | 240 | 210 | 450 |  |  |  |  |  |  |  |
| Balochistan                                       | 30  | 180 | 210 | 180 | 390 |  |  |  |  |  |  |  |
| Total 540 795 1335 825 2160                       |     |     |     |     |     |  |  |  |  |  |  |  |

For sub-stratum-I, all blocks/villages have been selected with certainty. Probability proportional to size (PPS) method have been used to select the number of sample areas (PSUs), from the sub-strata-II &-III of all strata formulated in the urban and rural sub-universe of the four provinces. The number of health facilities available for each blocks/villages as obtained from sampling frame developed as a consequence of Economic Census 2003-04 has been used as measure of size. For stratum-IV, simple random sampling (SRS) has been used to select number of block/villages from the sub-strata of urban and rural areas of the four provinces.

Field work was initiated in October, 2010 on both census and survey part simultaneously. A comprehensive training was imparted on definitions, concepts, terminology, sample design and methodology of survey and census. Retrieval of filled-in Questionnaires started in Nov, 2010. Every filled-in questionnaire was edited/ coded properly by a skilled team, before sending it to data processing center for data entry. During editing/coding of questionnaires, if serious mistakes were found, they were immediately conveyed to concerned PBS regional/ field office to avoid further replication. The data quality was further ensured by field visits by National Health Accounts' team. Data processing center generated three consecutive lists of entered data to compare it physically with the hard copies of questionnaires to avoid any discrepancy. Edit checks were developed and incorporated in the Data processing center to strengthen the error findings. The whole task was completed in record period of four months. Summary tables were generated to check the reliability of data.

21,486 health care facilities were covered in the sample of 2160 areas across Pakistan. Sampling weights were developed on the basis of single stage stratified sample design for each selected area (PSU). The reliable estimates for the 'Total health care facilities' and other variables of interest, for example total expenditures by health care providers etc., were obtained at national level by applying weights of the respective areas (PSUs).

#### 4.4 Main findings for reference year 2009-10

Table 23 shows total estimated health care providers at national level worked out to be 206,712 in 2009-10. The distribution of health care providers varies among the provinces. Punjab being the most populous province leads with 63% of the total health care providers. Being the least populated province Balochistan has only 2% of the total health care providers. Sindh and Khyber Pakhtunkhwa (KP) contain 16% and 18% of health care providers respectively.

| Table 23: Private health care providers by province / region 2009-10 |        |    |         |    |         |     |  |  |  |  |  |
|--|--------|----|---------|----|---------|-----|--|--|--|--|--|
| Area/Region  | Urban  |    | Rural   |    | Total   |     |  |  |  |  |  |
| Area/Region  | Number | %  | Number  | %  | Number  | %   |  |  |  |  |  |
| Pakistan   | 83,689 | 40 | 123,023 | 60 | 206,712 | 100 |  |  |  |  |  |
| Punjab   | 47,005 | 36 | 83,406  | 64 | 130,411 | 63  |  |  |  |  |  |
| Sindh  | 23,642 | 71 | 9,637   | 29 | 33,279  | 16  |  |  |  |  |  |
| KP   | 11,047 | 29 | 27,052  | 71 | 38,099  | 18  |  |  |  |  |  |
| Balochistan  | 1,995  | 41 | 2,928   | 59 | 4,923   | 2   |  |  |  |  |  |

The urban/rural comparison for provinces shows that Sindh has the highest percentage of the urban health care providers (71%) followed by Balochistan (41%), Punjab (36%) and KP (29%). In case of rural health care providers, KP has the highest percentage (71%) followed by Punjab (64%), Balochistan (59%) and Sindh (29%).

| Table 24: Private health care providers 2009-10 by type, size and province |                    |                     |       |                        |                            |         |  |  |  |  |  |
|--|--------------------|---------------------|-------|------------------------|----------------------------|---------|--|--|--|--|--|
| Province   |                    | Hospitals           |       | Out-Patient<br>Service | Laboratory<br>& Diagnostic | Total   |  |  |  |  |  |
| Frovince   | big<br>( ≥50 beds) | small<br>(<50 beds) | total | Providers              | Service<br>Providers       | I Oldi  |  |  |  |  |  |
|  |                    | N                   | umber |                        |                            |         |  |  |  |  |  |
| Pakistan   | 125                | 4,255               | 4,380 | 196,843                | 5,489                      | 206,712 |  |  |  |  |  |
| Punjab   | 66                 | 2,610               | 2,676 | 125,171                | 2,564                      | 130,411 |  |  |  |  |  |
| Sindh  | 46                 | 1,018               | 1,064 | 30,742                 | 1,473                      | 33,279  |  |  |  |  |  |
| KP   | 11                 | 568                 | 579   | 36,205                 | 1,315                      | 38,099  |  |  |  |  |  |
| Balochistan  | 2                  | 59                  | 61    | 4,725                  | 137                        | 4,923   |  |  |  |  |  |
|  |                    |                     | %     |                        |                            |         |  |  |  |  |  |
| Pakistan   | 0.1                | 2.0                 | 2.1   | 95.2                   | 2.7                        | 100     |  |  |  |  |  |
| Punjab   | 0.1                | 2.0                 | 2.1   | 96.0                   | 2.0                        | 100     |  |  |  |  |  |
| Sindh  | 0.1                | 3.1                 | 3.2   | 92.4                   | 4.4                        | 100     |  |  |  |  |  |
| KP   | 0.0                | 1.5                 | 1.5   | 95.0                   | 3.5                        | 100     |  |  |  |  |  |
| Balochistan  | 0.0                | 1.2                 | 1.2   | 96.0                   | 2.8                        | 100     |  |  |  |  |  |

Table 24 shows the estimated number and percentage of health care providers by three major categories and in case of hospitals by size respectively. Expectedly, Out-patient service providers' are much more in number than 'Hospitals' and 'Laboratories and diagnostic service providers. It is estimated that, there are 125 big hospitals while 4255 small hospitals in Pakistan. For both the small and big hospitals, Punjab has the highest number, followed by Sindh, KP and Balochistan.

| Table 25: Out-patient service providers 2009-10 by type and province |  |  |                  |                            |                                |  |             |         |  |  |  |
|--|--|--|------------------|----------------------------|--------------------------------|--|-------------|---------|--|--|--|
| Area/ Region   | Indi-<br>vidually<br>run solo<br>clinics | Outpa-<br>tient<br>Centre <sup>9</sup> | Dental<br>Clinic | Homeo-<br>pathic<br>Clinic | Hakeem/<br>Herbalist<br>clinic | Tradi-<br>tional<br>birth<br>attendant/<br>Dai | Oth-<br>ers | Total   |  |  |  |
|  |  |  |                  | Number                     |                                |  |             |         |  |  |  |
| Pakistan   | 96,645                                   | 916                                    | 6,443            | 27,819                     | 28,985                         | 29,445   | 6,590       | 196,843 |  |  |  |
| Punjab   | 47,749                                   | 541                                    | 3,865            | 22,584                     | 23,402                         | 21,264   | 5,766       | 125,171 |  |  |  |
| Sindh  | 19,548                                   | 99                                     | 1,214            | 2,241                      | 3,062                          | 4,169  | 409         | 30,742  |  |  |  |
| KP   | 26,222                                   | 258                                    | 1,230            | 2,830                      | 2,225                          | 3,049  | 391         | 36,205  |  |  |  |
| Balochistan  | 3,126                                    | 18                                     | 134              | 164                        | 296                            | 963  | 24          | 4,725   |  |  |  |
|  |  |  |                  | %                          |                                |  |             |         |  |  |  |
| Pakistan   | 49.1                                     | 0.5                                    | 3.3              | 14.1                       | 14.7                           | 15.0   | 3.3         | 100     |  |  |  |
| Punjab   | 38.1                                     | 0.4                                    | 3.1              | 18.0                       | 18.7                           | 17.0   | 4.6         | 100     |  |  |  |
| Sindh  | 63.6                                     | 0.3                                    | 3.9              | 7.3                        | 10.0                           | 13.6   | 1.3         | 100     |  |  |  |
| KP   | 72.4                                     | 0.7                                    | 3.4              | 7.8                        | 6.1                            | 8.4  | 1.1         | 100     |  |  |  |
| Balochistan  | 66.2                                     | 0.4                                    | 2.8              | 3.5                        | 6.3                            | 20.4   | 0.5         | 100     |  |  |  |

Table 2 shows estimated number/ percentage of Out-patient service providers by type for the four provinces as well as at national level. Health care providers which only have arrangements for check-up of patients on outpatient basis and do not have the facility to admit the patients are categorized as Out-patient health service providers. For the whole Pakistan the estimated total number of Out-patient health service providers is 196,843 out of which individually run solo clinics (Allopathic clinics) have the highest share (49%) followed by Traditional birth attendant/ Dai (15%), Hakeem/Herbalist clinics (14.7%), Homeopathic Clinics (14%), Dental clinics (3.3%) and others (3.3%). Further analysis of the survey results (Table 25) with reference to provinces also finds that Punjab has the highest share (64%) of the total Out-patient service providers followed by KP (18%), Sindh (16%) and Balochistan (2%).

<sup>&</sup>lt;sup>9</sup> Outpatient centres are establishments engaged in providing allopathic outpatient services by a team of doctors, paramedical and support staff usually bringing together several specialties.

| Table 26: Private hospitals 2009-10 by kind of ownership |              |                              |  |      |       |        |       |  |  |
|--|--------------|------------------------------|--|------|-------|--------|-------|--|--|
| Province   | NGO /<br>NPO | Individual<br>Proprietorship | Private Lim-<br>ited Company Partnership Tru |      | Trust | Others | Total |  |  |
|  |              |                              | Number                                       |      |       |        |       |  |  |
| Pakistan   | 529          | 3,328                        | 51   | 309  | 155   | 8      | 4,380 |  |  |
| Punjab   | 143          | 2,147                        | 33   | 251  | 98    | 4      | 2,676 |  |  |
| Sindh  | 150          | 841                          | 12   | 21   | 36    | 4      | 1,064 |  |  |
| KP   | 225          | 301                          | 5  | 28   | 20    | 0      | 579   |  |  |
| Balochistan  | 11           | 39                           | 1  | 9    | 1     | 0      | 61    |  |  |
|  |              |                              | %  |      |       |        |       |  |  |
| Pakistan   | 12.1         | 76.0                         | 1.2  | 7.1  | 3.5   | 0.2    | 100   |  |  |
| Punjab   | 5.3          | 80.2                         | 1.2  | 9.4  | 3.7   | 0.1    | 100   |  |  |
| Sindh  | 14.1         | 79.0                         | 1.1  | 2.0  | 3.4   | 0.4    | 100   |  |  |
| KP   | 38.9         | 52.0                         | 0.9  | 4.8  | 3.5   | 0.0    | 100   |  |  |
| Balochistan  | 18.0         | 63.9                         | 1.6  | 14.8 | 1.6   | 0.0    | 100   |  |  |

Table 26 shows the number/ percentage of hospitals by kind of ownership for the four provinces and at the national level. The estimated total number of hospitals in Pakistan is 4,380 out of which those registered as "Individual Proprietorship" are highest in number (3,328, 76%) followed by "NGO/NPO"(529, 12%), "Partnership" (309, 7%), "Trusts" (155, 3.5%), "Private Limited Company" (51, 1.2%) and "others" (8, 0.2%).In all provinces the number of hospitals registered as "Individual Proprietorship" is highest in number.

| Table 27: Distribution of In-patient and out-patient visits in private hospitals 2009-10 in % |            |                   |       |  |  |  |
|---|------------|-------------------|-------|--|--|--|
| Area/ Region  | Admissions | Outpatient Visits | Total |  |  |  |
| Pakistan  | 7.3        | 92.7              | 100   |  |  |  |
| Punjab  | 5.4        | 94.6              | 100   |  |  |  |
| Sindh   | 11.8       | 88.2              | 100   |  |  |  |
| KP  | 12.3       | 87.7              | 100   |  |  |  |
| Balochistan   | 10.3       | 89.7              | 100   |  |  |  |

Table 27 depicts the percentage of inpatient and outpatient visits in private hospitals. At national level 7% of the patients get admission in the hospitals and 93% of the patients visit hospital as outpatient. KP and Sindh have the highest number of admissions (12%), followed by Balochistan (10%) and Punjab (5%).

| Table 28: Expenditures of private health care providers 2009-10 |           |                                  |   |         |  |  |  |  |
|---|-----------|----------------------------------|---|---------|--|--|--|--|
| Province  | Hospitals | Out-Patient Service<br>Providers | Laboratory & Diag-<br>nostic Service Pro-<br>viders | Total   |  |  |  |  |
|   |           | Million Rs                       |   |         |  |  |  |  |
| Pakistan  | 38,042    | 76,767                           | 7,239   | 122,048 |  |  |  |  |
| Punjab  | 14,653    | 39,905                           | 4,517   | 59,075  |  |  |  |  |
| Sindh   | 19,921    | 13,233                           | 1,877   | 35,030  |  |  |  |  |
| KP  | 3,285     | 21,194                           | 766   | 25,244  |  |  |  |  |
| Balochistan   | 184       | 2,436                            | 79  | 2,699   |  |  |  |  |
|   |           | %                                |   |         |  |  |  |  |
| Pakistan  | 31.2      | 62.9                             | 5.9   | 100     |  |  |  |  |
| Punjab  | 24.8      | 67.5                             | 7.6   | 100     |  |  |  |  |
| Sindh   | 56.9      | 37.8                             | 5.4   | 100     |  |  |  |  |
| KP  | 13.0      | 84.0                             | 3.0   | 100     |  |  |  |  |
| Balochistan   | 6.8       | 90.3                             | 2.9   | 100     |  |  |  |  |

Table 28 shows the estimated expenditures of private health care providers and its percentage break-up by major type of service. Total expenditure incurred by all types of health care providers at national level is 122,048 million Rupees in 2009-10. Share in total expenditure from health care providers is uneven among the provinces. Punjab has the highest share of 48% while Balochistan has the smallest share of 2% of the total expenditure. Sindh and KP have share of 29% and 21% respectively.

With regard to health care providers the category 'Out-Patient Service Provider' has the highest share in expenditure (63%) followed by 'Hospitals' (31.2%) and 'Laboratory & Diagnostic Service Providers' (5.9%) at national level. Table 27 also indicates that Balochistan and KP have the highest share in expenditure with reference to out-patient service providers as compared to Punjab and Sindh. In categories of Hospitals and Laboratory & diagnostic service providers, Punjab and Sindh have higher proportion than KP and Balochistan.

| Table 29: Expenditures of private hospitals by kind of ownership 2009-10 |              |                              |                            |                  |       |        |        |  |  |
|--|--------------|------------------------------|----------------------------|------------------|-------|--------|--------|--|--|
| Province   | NGO /<br>NPO | Individual<br>Proprietorship | Private Limited<br>Company | Partner-<br>ship | Trust | Others | Total  |  |  |
|  |              |                              | Million Rs                 |                  |       |        |        |  |  |
| Pakistan   | 2,174        | 8,960                        | 16,657                     | 1,241            | 6,804 | 2,206  | 38,042 |  |  |
| Punjab   | 815          | 5,127                        | 4,929                      | 577              | 3,016 | 189    | 14,653 |  |  |
| Sindh  | 1,178        | 2,438                        | 10,266                     | 293              | 3,729 | 2,016  | 19,921 |  |  |
| KP   | 163          | 1,293                        | 1,462                      | 308              | 59    | 0      | 3,285  |  |  |
| Balochistan  | 19           | 102                          | 0                          | 63               | 0     | 0      | 184    |  |  |
|  |              |                              | %                          |                  |       |        |        |  |  |
| Pakistan   | 5.7          | 23.6                         | 43.8                       | 3.3              | 17.9  | 5.8    | 100    |  |  |
| Punjab   | 5.6          | 35.0                         | 33.6                       | 3.9              | 20.6  | 1.3    | 100    |  |  |
| Sindh  | 5.9          | 12.2                         | 51.5                       | 1.5              | 18.7  | 10.1   | 100    |  |  |
| KP   | 5.0          | 39.4                         | 44.5                       | 9.4              | 1.8   | 0.0    | 100    |  |  |
| Balochistan  | 10.1         | 55.5                         | 0.0                        | 34.4             | 0.0   | 0.0    | 100    |  |  |

Table 29 shows the estimated expenditure and percentages of private hospitals by the kind of its ownership respectively. The highest expenditure is incurred by "Private limited company" (Rs16, 657 million, 44%) followed by "individual proprietorship" (Rs 8,960 million, 24%). The total expenditure of Sindh (Rs 19,921 million, 52%) is more than Punjab (PKR 14,653 million, 39%) apparently because metropolis Karachi, located in Sindh, is the hub of health facilities in Pakistan. The number of hospitals run by "Trusts" was 155 and incurring the expenditure of Rs 6,804 million (18%). The number of "Partnerships" and "NGO/NPO" is 309 and 529 respectively but incurring only 3.3% and 6% of the expenditures. The expenditure of hospitals organized as "Private limited company" is higher than all other ownership categories. Sindh and KP have the highest expenditures in "Private limited company" while Punjab and Balochistan have the highest expenditures in "individual proprietorship".

# 4.5 Private health care providers expenditures: Deflation/Retropolation from 2009-10 to 2007-08

The private health care provider expenditures survey for the reference period 2009-10 has been used to estimate the respective figures for the year 2007-08. This has been done in two steps: eliminating the increase of prices (deflation) and then retropolating the volume increase between the two years. This has been done separately for (i) hospitals, (ii) outpatient service providers and (iii) Laboratories & Diagnostic Service Providers.

Hospital expenditures have been deflated through the increase observed as 28% in the expenditure figures available in both financial years 2007-08 and 2009-10 in the census of big hospitals. The expenditures of Outpatient service providers and Laboratories & Diagnostic Service Providers have been deflated on the basis of Consumer Price Index (CPI) computed for a group of 29 health related commodities such as Doctor's fee, Laboratory tests and different medicines etc. categorized as "Medicare" in the Consumer Price Index. CPI for "Medicare" category for the year 2009-10 and 2007-08 are 157.02 and 132.23 respectively, resulting in a price increase of 18.75% within the time span of these two years.

Table 30 gives an estimate of expenditures of private health care providers in FY 2007-08 valued at prices of that year.

| Table 30: Expenditures of private health care providers 2007-08 |           |                                  |  |         |  |  |  |  |
|---|-----------|----------------------------------|--|---------|--|--|--|--|
| Province  | Hospitals | Out-Patient Service<br>Providers | Laboratory & Diagnostic<br>Service Providers | Total   |  |  |  |  |
|   |           | Million Rs                       |  |         |  |  |  |  |
| Pakistan  | 29,723    | 64,673                           | 6,099  | 100,495 |  |  |  |  |
| Punjab  | 11,471    | 33,618                           | 3,805  | 48,894  |  |  |  |  |
| Sindh   | 15,540    | 11,148                           | 1,581  | 28,269  |  |  |  |  |
| KP  | 2,567     | 17,855                           | 645  | 21,067  |  |  |  |  |
| Balochistan   | 146       | 2,052                            | 67   | 2,265   |  |  |  |  |
|   |           | %                                |  |         |  |  |  |  |
| Pakistan  | 29.6      | 64.4                             | 6.1  | 100     |  |  |  |  |
| Punjab  | 23.5      | 68.8                             | 7.8  | 100     |  |  |  |  |
| Sindh   | 55.0      | 39.4                             | 5.6  | 100     |  |  |  |  |
| KP  | 12.2      | 84.8                             | 3.1  | 100     |  |  |  |  |
| Balochistan   | 6.5       | 90.6                             | 2.9  | 100     |  |  |  |  |

Table 31 provides the details of the expenditures of hospitals by kind of ownership.

| Table 31: Expenditures of hospitals by kind of ownership 2007-08 |              |                              |                   |      |        |       |        |  |  |
|--|--------------|------------------------------|-------------------|------|--------|-------|--------|--|--|
| Province   | NGO /<br>NPO | Individual<br>Proprietorship | Partnershin Trust |      | Others | Total |        |  |  |
|  |              |                              | Million Rs        |      |        |       |        |  |  |
| Pakistan   | 1,355        | 6,992                        | 12,891            | 969  | 5,697  | 1,820 | 29,723 |  |  |
| Punjab   | 523          | 3,979                        | 3,528             | 429  | 2,853  | 159   | 11,471 |  |  |
| Sindh  | 690          | 1,924                        | 8,221             | 248  | 2,797  | 1,660 | 15,540 |  |  |
| KP   | 127          | 1,010                        | 1,142             | 240  | 47     | 0     | 2,567  |  |  |
| Balochistan  | 15           | 79                           | 0                 | 53   | 0      | 0     | 146    |  |  |
|  |              |                              | %                 |      |        |       |        |  |  |
| Pakistan   | 4.6          | 23.5                         | 43.4              | 3.3  | 19.2   | 6.1   | 100    |  |  |
| Punjab   | 4.6          | 34.7                         | 30.8              | 3.7  | 24.9   | 1.4   | 100    |  |  |
| Sindh  | 4.4          | 12.4                         | 52.9              | 1.6  | 18.0   | 10.7  | 100    |  |  |
| KP   | 5.0          | 39.4                         | 44.5              | 9.4  | 1.8    | 0.0   | 100    |  |  |
| Balochistan  | 10.0         | 53.9                         | 0.0               | 36.1 | 0.0    | 0.0   | 100    |  |  |

# 5 Out-of-Pocket Health Expenditure Survey

#### 5.1 Introduction

In compilation of NHA the private households' out-of-pocket (OOP) health expenditure are the most crucial component to measure because of two reasons. First, it is empirically the largest source of health care financing in the developing countries. Second, it is challenging to measure as most households do not have any record on the respective expenditure and any survey's results depend on the recall quality of the households and on the way to ask.

In Pakistan the predominant survey on expenditures of private households is the Household Integrated Economic Survey (HIES). This survey includes questions on health expenditures, however, in a row with a lot of other expenditures and uniformly having the last year as the reference and recall period. In its first round (2005-06), NHA made use of this information. For the second round it was considered to ask for health expenditures with a separate questionnaire, confined to a sub-sample of the HIES and confined to two quarters, only, in order to curb the additional cost. The three advantages of this approach are as follows:

- The recall period could be curtailed to one month, considering that this is the maximum period the households can comprehensively remember their expenditures on health services.
- Additional questions could be included.
- The personal characteristics of the respective members of the household (age, sex, status and the like) could be connected by linking the OOP survey data with the HIES data, thus minimizing the additional response burden for the households.

The idea was to raise the recall period by twelve in order to arrive at expenditures for the whole year. The decision to conduct this survey was taken in 2009 when it was not possible any more to ask households for 2007-08. Therefore, the reference period was 2009-10. The HIES-questionnaire remained unchanged and still included the question of annual expenditure on health. The comparison of both results (HIES as well as its sub-sample with a dedicated questionnaire for OOP) was considered to enable the assessment of the (assumed) underreporting of OOP through HIES. The ratio of underreporting of 2009-10 should then be the yardstick for enhancing the HIES-figures on OOP for 2007-08 and for 2005-06.

The OOP survey 2009-10 was the first ever dedicated OOP survey on health expenditures in Pakistan. The sample size and households covered were the same for both HIES and OOP. HIES part of survey had two general questions about health related expenditures. One is medicines purchased<sup>10</sup> and second is doctor's fee<sup>11</sup> while in OOP part detailed health related expenditures questions were included. In HIES the recall period was one year while in OOP recall period was only one month.

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<sup>&</sup>lt;sup>10</sup>HIES Code 5601 includes medicines & vitamins, medical apparatus and other equipment/supplies etc.

<sup>&</sup>lt;sup>11</sup>HIES Code 5602 includes medical fees paid to doctors, specialists, Hakeem (traditional healer) or midwives outside hospital, including medicine etc. Hospitalization charges, including fee etc. for doctors or Hakeem etc. and laboratory tests, x-Ray charges, dental care, teeth cleaning, extraction, charges, eye glasses and all others, not elsewhere classified.

#### 5.2 Questionnaire and method

The Questionnaire (see Annexure 15) was designed considering all important variables essential for detailed OOP health expenditures picture. All the questions were embedded on one page attached with HIES questionnaire. The following given variables were included in the OOP questionnaire:

- Type of Health care accessed
- Type of Health care provider
- Type of Illness
- Reason of contact for health expenditure unrelated to illness
- Total health expenditure had been disaggregated in the following given categories:
  - Ø Parchi and Admission Fees
  - Ø Medicines/Vaccine
  - Ø Supplies/Medical durables
  - Ø Food
  - Ø Diagnostic tests
  - Ø Doctor and Staff
  - Ø Tips
  - Ø Cost of Surgery if done
  - Ø Transportation costs
  - Ø Accompanying Person Cost
  - Ø Other

The reference period for the HIES survey is 2009-10. However; the survey was conducted in  $3^{rd}$  and  $4^{th}$  quarterof fiscal year 2009/10 and started in January 2010. The reference period for OOP survey was last one month from the date of enumeration.

The universe of HIES Survey consists of all urban and rural areas of all four provinces as defined by the respective Provincial Governments. Military restricted areas are excluded from the scope of the survey. A sample of 8282 households, pertaining to 279 urban and 308 rural areas, was drawn. A sample of 8200 households was considered to provide reliable estimates of the key variables at the national level. There are 3590 households reported, having no illness in recall period.

Two stage stratified random sampling scheme was adopted. All enumeration blocks selected have been treated as Primary Sampling Units (PSU's). Households as defined within the PSUs are considered as Secondary Sampling Units (SSUs).

PBS has a frame for all urban areas of Pakistan which are further divided into 200-250 households' blocks known as enumeration blocks having unique identification number. A sample for the urban areas was drawn from the latest available 2003 urban frame. From each selected enumeration block in urban areas, 12 households were enumerated.

For the rural areas, PBS has a frame consisting of villages/ mouzas/ dehs. In this frame, each village /mouza / deh is identifiable by its name, unique Had-Bast number and cadastral map. From each selected rural area 16 households were enumerated.

Retrieval of filled-in questionnaires was completed by the end of October, 2010. Data was edited/ coded by developing a standard check list. First the data was checked for each variable on hard copy of the questionnaire and then it was entered into MS-ACCESS database package. Differ-

ent plausibility and consistency checks were applied in the software to maintain the quality of data. Tabulation plan was prepared and data was analyzed in SPSS.

Weights were developed by considering income quintiles. Area-wise weights were computed which generalize the results at national level. Per capita annual health expenditures by OOP survey were 1645 Rupees. Population of Pakistan<sup>12</sup> in 2009-10 was 165.94 million<sup>13</sup>. Population for the provinces/areas was also obtained from the same source to estimate the OOP expenditures at regional level.

#### 5.3 Main findings of the survey for 2009-10

The total OOP health expenditures estimated at national level by OOP survey are 273 billion Rupees in 2009-10. Due to the short recall period of just one month a lot of households reported that during this period they had no illness and no such expenses at all. The percentages of such households were 46% in Pakistan, 44% in Punjab, 61% in Sindh, 19% in KP and 79% in Balochistan. In the rural areas of Pakistan the ratio of households without any illness (42%) was a bit lower than in the urban areas (54%).

| Table 32: Out of pocket health expenditures in 2009-10 by region |            |         |                                    |  |  |  |  |  |
|--|------------|---------|------------------------------------|--|--|--|--|--|
| Province/Area  | Million Rs | % Share | For comparison:<br>% of population |  |  |  |  |  |
| Pakistan   | 273,028    | 100.0   | 100                                |  |  |  |  |  |
| Punjab   | 152,934    | 56.0    | 56.0                               |  |  |  |  |  |
| Sindh  | 66,324     | 24.3    | 24.3                               |  |  |  |  |  |
| KP   | 37,481     | 13.7    | 13.7                               |  |  |  |  |  |
| Balochistan  | 14,232     | 5.2     | 5.2                                |  |  |  |  |  |
| Islamabad  | 2,057      | 0.8     | 08                                 |  |  |  |  |  |

Punjab has the highest share (56%) of the total OOP health spending, followed by Sindh (24%). KP has 14% share while Balochistan has just 5% share of the total OOP health spending. Column 4 in Table 32 gives the population share of the provinces for comparison purpose. It shows that the OOP health expenditures of the provinces roughly correlate with their population size.

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<sup>&</sup>lt;sup>12</sup>Population of Pakistan includes Punjab, Sindh, KPK, Balochistan and Islamabad.

<sup>&</sup>lt;sup>13</sup>National Institute of Population Studies (NIPS), Sub Group-2 on Population Projections (For the Years 2007-2030), Tenth five year people's plan 2010-15 Population Welfare.

| Table 33: Type of health care accessed 2009-10 by province in % |                                      |     |     |     |  |  |  |  |
|---|--------------------------------------|-----|-----|-----|--|--|--|--|
| Province  | Outpatient Inpatient Self-Medication |     |     |     |  |  |  |  |
| Pakistan  | 90                                   | 3   | 8   | 100 |  |  |  |  |
| Punjab  | 94                                   | 3   | 3   | 100 |  |  |  |  |
| Sindh   | 97                                   | 3   | 0.8 | 100 |  |  |  |  |
| KP  | 70                                   | 3   | 26  | 100 |  |  |  |  |
| Balochistan   | 88                                   | 0.4 | 11  | 100 |  |  |  |  |

Analysis of the OOP survey data finds that in Pakistan, 90% of the population availed outpatient services while only 3% received inpatient care for their illness and 8% did self-medication which include all those people who are taking medicines without consultation/prescription, or all those people who are taking medicines for long lasting diseases like diabetes and high blood pressure that was already prescribed by doctors. Further analysis of data on the type of health care accessed by provinces finds that share of self-medication is highest in KP (26%) followed by Balochistan (11%). The percentage share of outpatient is highest in Sindh (97%) followed by Punjab (94%), Balochistan (88%) and the lowest share is of KP (70%). For the Inpatient services, the share of all provinces are equal (3%) except Balochistan which is even on the lower side (0.4%).

| Table 34: Type of health care accessed2009-10 by sex in % |      |        |       |  |  |  |  |
|---|------|--------|-------|--|--|--|--|
| Type of Care  | Male | Female | Total |  |  |  |  |
| Outpatient  | 29   | 71     | 100   |  |  |  |  |
| Inpatient   | 41   | 59     | 100   |  |  |  |  |
| Self-Medication   | 44   | 56     | 100   |  |  |  |  |

Table 34 shows that female percentage of all type of health care access is higher than male. Lack of quality reproductive health services may be one of the major reasons of higher percentage of female illness. According to MDG report<sup>14</sup> only one-third of the rural women in developing regions receive the recommended care during pregnancy.

The Millennium Development Goals Report 2010, United Nation Department of Economic and Social Affairs (DESA) June 2010.

| Table 35: OOP expenditures of private households 2009-10 by category and by provinces in % |          |        |       |       |             |  |  |  |
|--|----------|--------|-------|-------|-------------|--|--|--|
| OOP Expenditure categories   | Pakistan | Punjab | Sindh | KP    | Balochistan |  |  |  |
| Transportation costs   | 5.72     | 5.89   | 5.71  | 5.26  | 7.53        |  |  |  |
| Parchi and admission fees  | 1.92     | 1.59   | 4.55  | 1.16  | 1.16        |  |  |  |
| Medicines/Vaccine  | 56.54    | 59.65  | 46.37 | 55.25 | 59.20       |  |  |  |
| Supplies/Medical Durables  | 4.34     | 3.00   | 2.84  | 8.40  | 3.86        |  |  |  |
| Food   | 3.85     | 3.06   | 7.08  | 3.72  | 4.72        |  |  |  |
| Diagnostic tests   | 8.00     | 7.85   | 8.33  | 8.13  | 8.86        |  |  |  |
| Doctors fee  | 13.45    | 14.62  | 17.59 | 8.25  | 13.79       |  |  |  |
| Tips   | 0.09     | 0.13   | 0.01  | 0.06  | 0.00        |  |  |  |
| Cost of surgery  | 2.55     | 1.71   | 2.27  | 4.75  | 0.04        |  |  |  |
| Accompanying person cost   | 1.30     | 0.96   | 1.09  | 2.27  | 0.26        |  |  |  |
| Other  | 2.23     | 1.53   | 4.16  | 2.76  | 0.58        |  |  |  |
| Total Expenditures   | 100      | 100    | 100   | 100   | 100         |  |  |  |

Table 35 shows that in Punjab, KP and Balochistan more than 50% of the OOP expenditures were incurred on "Medicine/Vaccine" while it was 46% in Sindh. Second highest spending for all the provinces is on Doctor's fee and then the transportation cost. The reason behind the 50% spending on medicine is that, in private clinics, doctors take the charges including medicine and the value reported in the medicine cost. The high share of transportation charges highlights that health care facilities often are distant to the population. The lowest share is of tips because mostly tips are given in the hospitals at the time of new born in Pakistan. The category 'cost of surgery' is showing very low share in expenditures merely because only 3% of the population access different health care faculties for treatment as inpatient during one month recall period. Expenditures on accompanying person incur mostly in the cases of inpatient. The KP province has the highest percentage share of expenditures incurred on accompanying person.

| Table 36: OOP expenditures 2009-10 by expenditure categories in % |         |        |       |  |  |  |  |
|---|---------|--------|-------|--|--|--|--|
| OOP Expenditure categories  | Private | Public | Total |  |  |  |  |
| Transportation costs  | 4.9     | 11.5   | 5.7   |  |  |  |  |
| Parchi and admission fees   | 2.0     | 1.1    | 1.9   |  |  |  |  |
| Medicines/Vaccine   | 56.1    | 60.0   | 56.5  |  |  |  |  |
| Supplies/Medical Durables   | 4.6     | 2.8    | 4.3   |  |  |  |  |
| Food  | 3.9     | 3.6    | 3.8   |  |  |  |  |
| Diagnostic tests  | 8.1     | 7.0    | 8.0   |  |  |  |  |
| Doctors fee   | 15.3    | 0.3    | 13.5  |  |  |  |  |
| Tips  | 0.10    | 0.04   | 0.09  |  |  |  |  |
| Cost of surgery   | 1.97    | 6.6    | 2.5   |  |  |  |  |
| Accompanying person cost  | 1.2     | 1.7    | 1.3   |  |  |  |  |
| Other   | 1.8     | 5.5    | 2.2   |  |  |  |  |
| Total Expenditures  | 100     | 100    | 100   |  |  |  |  |

Table 36 indicates that percentage share of "Medicine/Vaccine" in private and public sector are 56% and 60% respectively. Private and Public OOP expenditures incurred on "Doctor's fee" is 15% and 0.3% respectively. While the percentage share of OOP expenditures as "Transportation Cost" is 5% and 12% in private and public sector respectively. The high share of transportation cost (12%) shows that public health care facilities are not in the close access to the population.

| Table 37: Type of health care provider assessed by the households 2009-10 |                          |                             |   |                         |   |  |         |       |  |
|---|--------------------------|-----------------------------|---|-------------------------|---|--|---------|-------|--|
| Province  | Private<br>Hospi-<br>tal | Private<br>Doctor<br>clinic | Homeo-<br>path/<br>Hakeem/<br>herbalist<br>etc. | Phar-<br>macy/<br>shops | Govt<br>Hosp/THQ/D<br>HQ/Tertiary/T<br>eaching<br>Hospitals | Dispen-<br>sary/Maternal<br>and child<br>health center/<br>BHU/RHC | Others* | Total |  |
|   |                          |                             |   | n % of popւ             | ulation   |  |         |       |  |
| Punjab  | 14                       | 61                          | 6   | 3                       | 10  | 3  | 3       | 100   |  |
| Sindh   | 30                       | 60                          | 0.8   | 0.8                     | 5   | 2  | 1       | 100   |  |
| KP  | 8                        | 34                          | 6   | 26                      | 16  | 7  | 2       | 100   |  |
| Balochistan   | 7                        | 39                          | 1   | 11                      | 27  | 14   | 1       | 100   |  |
| Pakistan  | 15                       | 54                          | 5   | 8                       | 11  | 4  | 2       | 100   |  |
|   |                          |                             | In  | % of exper              | nditures  |  |         |       |  |
| Punjab  | 37.73                    | 46.16                       | 3.30  | 0.59                    | 9.39  | 0.74   | 2.00    | 100   |  |
| Sindh   | 45.53                    | 49.84                       | 1.25  | 0.07                    | 0.36  | 2.15   | 0.80    | 100   |  |
| KP  | 28.30                    | 42.22                       | 1.65  | 3.57                    | 16.57   | 1.49   | 1.91    | 100   |  |
| Balochistan   | 9.33                     | 62.10                       | 1.97  | 6.51                    | 18.18   | 1.52   | 0.40    | 100   |  |
| Pakistan  | 36.30                    | 45.84                       | 2.56  | 1.31                    | 10.18   | 0.87   | 1.79    | 100   |  |

<sup>\*</sup> Others include other (private), other (Public) and Don't know

Note: Access to Military and Autonomous Bodies' Hospitals was 0.20 percent of population and 1.41 % of expenditures

The highest percentage in access to health care providers (54%) shows that for general inspection people prefer to go to private clinics and doctors' due to easy access and seeking quality health services. Percentage of population visited private hospital in Punjab (14%) is less than Sindh (30%), in Punjab the condition of access to government hospital/ THQ and DHQ hospital are better than in Sindh. In KP and Balochistan the percentage of access to government hospitals is more than private hospitals because people prefer to access to government hospitals due to financial constraints or to get health services at minimal cost in government hospitals.

The OOP health expenditures for access to government hospitals are lower than those for access to private hospitals because government hospitals provide the services on lower rates. Highest OOP expenditures are in the category of Private Doctor Clinics (46%) at national level. In Balochistan it was on the highest side 62% while in Punjab, Sindh and KP they are 46%, 50% and 42% respectively. The category of Homeopath/Hakeem/ herbalist have share of 2.5% in OOP health expenditures at national level.

| Table 38: OOP health expenditures2009-10 by kind of accessed sector (private and public) and by province in % |                 |               |       |  |
|---|-----------------|---------------|-------|--|
| Province  | Private Sector* | Public Sector | Total |  |
| Punjab  | 90              | 10            | 100   |  |
| Sindh   | 97              | 3             | 100   |  |
| KP  | 78              | 22            | 100   |  |
| Balochistan   | 80              | 20            | 100   |  |
| Pakistan  | 88              | 12            | 100   |  |

<sup>\*</sup> Private Sector includes Private hospitals, Private Doctor Clinic, Homeopath/ Hakeem/ herbalist etc., Pharmacy/ shops and other (private).

In Pakistan share of OOP health expenditures incurred by private sector is colossally higher than public sector. The situation in the provinces is not much different which shows the important role of private health sector across the country.

Table 39: Health expenditures 2009-10 by kind of illnesses/ incident and by province in % Kind of Illness / incident Pakistan Punjab Sindh Balochistan Accident 0.87 0.98 1.11 0.42 0.00 Physical Injury 2.32 1.67 3.46 2.08 1.16 Poisoning including snake bites 0.24 0.32 0.03 0.15 0.00 Diarrheal disorder (including dysentery) 7.69 7.32 9.80 6.65 21.58 Fever (clinical malaria) 35.25 39.08 44.94 18.19 35.55 12.40 8.99 13.49 21.15 Chest diseases 13.57 0.54 Measles, Polio (Immunizable diseases) 0.28 0.32 1.44 0.00 Hepatitis infections 1.93 1.79 3.69 1.22 0.49 Woman's issue 3.76 3.90 4.52 6.76 1.75 Eye infection/disorder 2.11 1.91 2.27 2.53 2.18 High blood pressure 4.34 5.40 1.97 2.89 5.68 Diabetes 3.77 3.89 4.59 3.00 1.19 Heart disease 3.74 4.21 4.00 1.50 1.68 0.19 0.20 Stroke 80.0 0.48 0.00 **Dental Care** 0.93 0.39 2.32 1.46 2.40 Don't know 2.13 2.29 0.59 2.74 0.86 Other, specify\* 17.81 17.08 9.77 25.70 6.91 100 100 100

The shares of fever (clinical malaria) of 35% and chest diseases of 12% are the highest among all other illnesses. Survey data finds that high blood pressure, heart diseases and diabetes are the second common diseases that occur in all provinces. Diarrheal disorder (including dysentery) is high in Balochistan. Measles, polio (Immunizable diseases) percentage is very low as it is controlled by vaccination in Pakistan, it is a grouped category if polio will be analyzed only then the percentage tends to zero. Category of women issue is 6% in Balochistan.

#### 5.4 Applying results of the survey to NHA 2007-08

In order to arrive at the estimated total OOP health expenditures for the year 2007-08 the OOP health expenditures figures for the year 2009-10 have been deflated to the year 2007-08 on the basis of Consumer Price Index (CPI) computed for a group of "29" health related commodities such as Doctor's fee, Laboratory tests and different medicines etc. categorized as "Medicare" in the CPI. The increase of prices of Medicare category from 2007-08 to 2009-10 was 18.75%.

OOP expenditures by private households in health accounts typically comprise direct spending by households, after deducting third-party payments, such as insurance or reimbursements by the employer. However, it was considered to ask the households for their gross expenditures (which they presumably remember better than the net ones) and then deduct the reimbursements as collected from third-party sources. Table 39 shows the result of this approach.

<sup>\*</sup>diseases that are not part of disaggregation for example body aches, blood cancer, Tuberculosis, Abnormality, etc. and their individual percentage is very low i.e.0.02 to 3 %

| Table 40: Delineation of net OOP expenditures of private households 2007-08 in million Rs |         |  |
|---|---------|--|
| Gross Private Households OOP health expenditures  | 220,508 |  |
| Reimbursement by core Government  | 3,430   |  |
| Reimbursement or insurance by ABs/C   | 5,118   |  |
| Reimbursement by Military   | 78      |  |
| Reimbursement by Private health insurance   | 930     |  |
| Reimbursement by Cantonment Board   | 38      |  |
| Reimbursement by Employees social security institutions                                   | 59      |  |
| Net Private Households OOP health expenditures  | 210,855 |  |

# 6 Census of Autonomous Bodies/Corporations

## 6.1 Why this census?

The accounts of the public sector core government (federal, provincial & district) are maintained at the Accountant General Pakistan Revenues (AGPR) and respective provincial Accountant Generals (AGs) offices. The final accounts of the respective governments are compiled and published about a year after the end of fiscal year in the document called appropriation accounts.

The public sector health expenditures data of the core government, compiled in various appropriation accounts, have already been extracted out from the appropriation accounts of respective provinces, districts and federal level obtained from the centralized accounting entities (AGPRs and AGs offices) and self-accounting entities. As far as Autonomous Bodies/Corporations (ABs/C) are concerned, they are not accounted for in the Government Budget Books issued by finance division/finance department except for the grants, subsidies & write-off loans (A05). This means that some of the ABs/C have a "one line budget" in the Government Budget Books. Therefore health expenditures data of the ABs/C have been collected via special survey/census. These expenditures are mainly made either through reimbursement of medical charges / bills, health insurances or through their own health care facilities. The expenditures incurred by health care facilities (Hospitals/Medical Centers/Dispensaries) run by ABs/C themselves have been collected separately.

#### 6.2 Autonomous bodies/ corporations and their kinds of expenditures

ABs/C are set up in the public sector under an act of legislation or ordinance (subject to legislative approval) to perform regulatory, operational, corporate, promotional, research and developmental functions<sup>15</sup>. These bodies carry different organizational titles such as corporations, boards, institutes, authorities, companies and so on. These can generally be classified into (i) commercial, (ii) promotional, (iii) research, (iv) training and (v) regulation.

The primary distinction between a government department and an AB lies in the fact that the latter enjoys a higher degree of autonomy in administrative and financial decision-making matters. The extent of autonomy that these ABs/C enjoy is in effect granted to them under the acts, which provided for their creation. They are governed by their respective acts including the rules and regulations framed there under. However, the rules and regulations to be framed require the approval of the government.

The administration and management of the affairs of the ABs/C are vested in their respective Boards of Directors which are appointed by the federal/provincial government. The government does not interfere into day-to-day operational activities of these ABs/C, but exercises oversight through its representatives on the Boards of Directors. The chief executive of the ABs/C is appointed by the Government and is designated either as the chairman, or managing director, or director general or executive director.

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<sup>&</sup>lt;sup>15</sup>Report of the National Commission for Government Reforms on Reforming the Government in Pakistan, 2008

Public corporations are established under special legislation of the Federal and Provincial Governments or under the Companies Act 1913/Companies Ordinance 1984. They are usually holding corporations of a number of public companies in the industrial sector. The Corporation holds all or majority equity in these companies on behalf of government and administers them. These corporations or companies cannot be classified as autonomous bodies.

According to Pakistan Public Administration Research Centre (PPARC), Establishment Division's Statistical Bulletin (2007-08) and National Commission for Government Reforms publication there are 201 ABs/C having 335,974 employees working under the administrative control of federal government. Similarly according to Services & General Administrative Department (S&GAD) and the respective departments of the four provinces, there are 72, 40, 46 & 18 ABs/C under the administrative control of Punjab, Sindh, KP & Balochistan governments respectively.

#### 6.3 Autonomous bodies/corporations and their type of health services

Data on public sector health expenditures are not collected through surveys ("primary" statistics). They are collected from administrative ("secondary") sources. Therefore it is imperative to deal with the set-up of public accounting in Pakistan and to differentiate among centralized accounting entities, self-accounting entities and exempt entities.

The accounts of the public sector (core government) are maintained in the first two entities, whereas ABs/C are treated in accounting as exempt entities. Centralized accounting entities and self-accounting entities are defined as those which are under the Auditor General of Pakistan for accounting and reporting purposes. A centralized accounting entity is any accounting entity for which the AGs or AGPRs have the primary responsibility for the accounting and reporting function of that entity. Data on health expenditures in respect of centralized accounting entities compiled in the appropriation accounts (Certified Document) have been obtained from the respective provincial AG offices and AGPR Islamabad. A self-accounting entity is any accounting entity for which the Principal Accounting Officer has the primary responsibility for the accounting and reporting function. Self-accounting entities are separately preparing their appropriation accounts compiled in Volume II of their expenditures.

Data on health expenditures of self-accounting entities have been obtained from the following self-accounting entities separately.

- National Savings Organization
- Pakistan Mint
- Food Wing of the Food and Agriculture Division
- Pakistan Public Works Department
- Ministry of Foreign Affairs
- Pakistan Post Office Department
- Geological Survey of Pakistan
- Pakistan Railways
- Forest Department
- Ministry of Defence

Exempt entities are defined as those which fall outside the responsibility of the Auditor General of Pakistan for accounting and reporting purposes. All ABs/C are treated as exempt entities. The terms centralized accounting entities and self-accounting entities exclude exempt entities <sup>16</sup>. The data on health expenditures incurred by the employees of Exempt entities (ABs/C) have been obtained by conducting this census of ABs/C as ABs/C are required to maintain/prepare their accounts and reports by themselves.

It has been observed in the census that ABs/C are providing health services to their employees through at least one of the following mechanism:

- Health care through their own health care facilities
- Provision of medical allowance to their employees
- Health care through the reimbursement of medical charges bills
- Health care through health insurance to their employees.

Census data finds that some large Abs/C under the federal government provides health services to their employees and in some cases to the general public. For example, Pakistan International Airlines (PIA) has a medical wing, which mainly consists of curative facilities but some of the preventive services such as immunization etc. are also provided. The medical wing runs medical centers at Karachi, Lahore, Multan, Peshawar, Rawalpindi / Islamabad providing comprehensive medical coverage to around 130,000 employees and their dependents. Similarly Water and Power Development Authority (WAPDA) is a large organization having a medical division having more than 1,200 employees providing predominantly curative services to the organization. Currently WAPDA is running 11 hospitals and 30 dispensaries (12 fortified and 18 basic dispensaries) across Pakistan. A number of other ABs/C such as telecommunication organization is also providing health services to their employees and their dependents<sup>17</sup>.

#### 6.4 Data sources

As ABs/C working under the administrative control of federal/provincial governments of Pakistan are maintaining all their accounts/records by themselves, the only feasible way out to get their health expenditures data was to contact them officially and individually. The list of respondents was obtained from the following sources:

- Annual Statistical Bulletin of the Employees of ABs/C under the control of Federal Government (2007-08), published by PPARC, Management Services Wing, Establishment Division, Islamabad.
- The list of ABs/C under the control of Provincial Governments of Pakistan was obtained from the respective controlling department/Services & General Administration department of the four provinces.

<sup>&</sup>lt;sup>16</sup>Accounting Code for Self Accounting Entities. Available at: <a href="http://www.pifra.gov.pk/docs/nam/06-Accounting-Code-for-SAEs.pdf">http://www.pifra.gov.pk/docs/nam/06-Accounting-Code-for-SAEs.pdf</a>. Accessed on 30 April, 2011

<sup>&</sup>lt;sup>17</sup>Health System Profile - Pakistan. Regional Health System Observatory-EMRO, World Health Organization, 2007.

The postal addresses of ABs/C both at federal and provincial levels were obtained from the websites and controlling divisions/departments. Official letters along with the specially designed data specification form were dispatched to all ABs/C in order to get data on health expenditures of their employees. Table 41 and 42 show the number of the federal bodies and their employees by Divisions of the Government of Pakistan and the number of the provincial bodies and their employees by provinces, respectively.

Table 41: Federal autonomous bodies/ corporations and their employees 2007-08 by Division

| S.No  | Division                                      | Number | Employees |
|-------|---|--------|-----------|
| 1     | Cabinet                                       | 15     | 18,199    |
| 2     | Commerce                                      | 7      | 4,700     |
| 3     | Communications                                | 1      | 1,215     |
| 4     | Culture                                       | 4      | 423       |
| 5     | Defence                                       | 2      | 24,376    |
| 6     | Defence Production                            | 1      | 1,751     |
| 7     | Education                                     | 40     | 8,364     |
| 8     | Environment                                   | 2      | 153       |
| 9     | Establishment                                 | 8      | 1,264     |
| 10    | Finance                                       | 10     | 23,778    |
| 11    | Food, Agriculture & Livestock                 | 5      | 4,878     |
| 12    | Foreign Affairs                               | 2      | 97        |
| 13    | Health  | 10     | 1,854     |
| 14    | Housing & Works                               | 3      | 547       |
| 15    | Industries Production and Special Initiatives | 14     | 19,934    |
| 16    | Information & Broadcasting                    | 5      | 7,903     |
| 17    | Information Technology and Telecommunications | 6      | 5,895     |
| 18    | Interior                                      | 2      | 11,630    |
| 19    | Kashmir Affairs & Northern Areas              | 1      | 685       |
| 20    | Labour & Manpower                             | 3      | 1,162     |
| 21    | Law, Justice & Human Rights                   | 1      | 61        |
| 22    | Minorities Affairs                            | 1      | 754       |
| 23    | Overseas Pakistanis                           | 1      | 366       |
| 24    | Petroleum & Natural Resources                 | 10     | 29,126    |
| 25    | Planning and Development                      | 1      | 154       |
| 26    | Population Welfare                            | 1      | 52        |
| 27    | Privatization & Investment                    | 1      | 32        |
| 28    | Port & Shipping                               | 5      | 7,355     |
| 29    | Religious Affairs, Zakat & Ushar              | 5      | 207       |
| 30    | Science & Technology                          | 17     | 7,135     |
| 31    | Sports  | 1      | 370       |
| 32    | States & Frontier Regions                     | 1      | 196       |
| 33    | Social Welfare & Special Education            | 2      | 963       |
| 34    | Tourism                                       | 3      | 379       |
| 35    | Textile Industry                              | 2      | 391       |
| 36    | Water & Power                                 | 4      | 145,663   |
| 37    | Railways Division                             | 4      | 3,962     |
| Total |   | 201    | 335,974   |

Source: Pakistan Public Administration & Research Centre, Establishment Division, Govt. of Pakistan

| Table 42: Provincial autonomous bodies/ corporations and their employees 2007-08 by province |        |           |  |
|--|--------|-----------|--|
| Province   | Number | Employees |  |
| Punjab   | 72     | 61,832    |  |
| Sindh  | 40     | 49,755    |  |
| KP   | 46     | 23,363    |  |
| Balochistan  | 18     | 7,020     |  |
| Total  | 176    | 141,970   |  |

Source: Respective Provincial Departments/Service & General Administration Departments

### 6.5 Main findings for federal autonomous bodies / corporations

Census of ABs/C pertaining to federal or provincial governments of Pakistan was conducted for the reference period 2007-08. The purpose of the census was to collect data on remuneration of health expenditures of the employees of the ABs/C working under the control of federal government of Pakistan. Out of 201 federal ABs/C, 174 have provided data through mail which is almost 87% of the total federal ABs/C and covered approximately 91% employees of the federal ABs/C. It is observed that most of the ABs/C are providing health services to their employees through the reimbursement of medical bills. Table 43 gives an overview of the number of ABs/C and their health care service mechanism.

| Table 43: Federal autonomous bodies/ corporations 2007-08 by mechanism of health care provision |        |       |  |
|---|--------|-------|--|
| Mechanism   | Number | %     |  |
| Reimbursement only  | 118    | 58.7  |  |
| Medical Allowance/No Reimbursement  | 19     | 9.5   |  |
| Health Insurance only   | 2      | 1.0   |  |
| Reimbursement & Health Insurance  | 8      | 4.0   |  |
| Own Health Care Facilities only   | 3      | 1.5   |  |
| Reimbursement & Own Health Care Facilities  | 24     | 11.9  |  |
| Non-Response  | 27     | 13.4  |  |
| Total   | 201    | 100.0 |  |

118 out of the 174 reporting federal ABs/C are providing health services to their employees through the reimbursement of medical bills. The health expenditures incurred by their employees during 2005-2008 were 1303 million Rupees in 2005-06, 1287 million Rupees in 2006-07 and 1640 million Rupees in2007-08. The expenditure reported for 2005-06 allows to check the respective estimate in the first round of NHA (2005-06) which was 0.96 billion Rupees, only. Thus, health expenditures reported in the first report of NHA were underestimated.

Two out of the 174 reporting ABs/C are providing health services to their employees through the facility of health insurance only. National Productivity Organization (NPO) paid 0.83 million Rupees and Government Holdings (Pvt.) Limited paid 0.11 million Rupees.

Eight out of the 174 reporting ABs/Care providing health services to their employees by comechanism (re-imbursement & health insurance). Table 44 gives an overview of the health expenditures incurred by them.

Table 44: Expenditures of federal autonomous bodies/corporations on health via combination of reimbursement & health insurance 2007-08 in million Rs

| Autonomous Body  | Reimbursement | Health Insurance |
|--|---------------|------------------|
| Pakistan National Shipping Corporation, Karachi            | 0.18          | 23.00            |
| National University of Science & Technology                | 1.90          | 2.24             |
| Khushali Bank of Pakistan (KBP)                            | 4.30          | 2.09             |
| Small and Medium Enterprises Development Authority (SMEDA) | 6.51          | 1.46             |
| Sindh Engineering (Pvt.) Limited                           | 0.75          | 0.48             |
| State Engineering Corporation of Pakistan                  | 3.33          | 0.40             |
| Centre for Applied Molecular Biology ,Lahore               | 0.04          | 0.02             |
| Pakistan Study Centre, University of the Punjab            | 0.05          | 0.01             |
| Total  | 17.08         | 29.70            |

There are three ABs/C which are providing health services to their employees and their dependents through their own health care facilities only (Hospitals, Medical Centers, and Dispensaries). Details are given in Table 45.

Table 45: Expenditures of federal autonomous bodies/corporations on health via own health care facilities only 2007-08

| Autonomous Body                             | Hospital | Medical<br>Centre | Dispensary | Expenditures in Million Rs |
|---|----------|-------------------|------------|----------------------------|
| Karachi Port Trust (KPT)                    | 1        | -                 | 1          | 106.26                     |
| Pakistan Petroleum Limited                  | 1        | -                 | 5          | 98.90                      |
| Pakistan Industrial Development Corporation | -        | 1                 | -          | 0.11                       |
| Total                                       | 3        | 1                 | 6          | 205.27                     |

24 out of the 174 reporting ABs/Care providing health services to their employees and members of their families by two mechanisms: own health care facilities as well as reimbursement of medical bills. These ABs/C are running 24 hospitals/medical centers and 163 dispensaries. Out of 24 hospitals/medical centers WAPDA owns 11 hospitals; Pakistan Steel Mills and Pakistan Mineral Development Corporation own one hospital each. Pakistan International Airlines (PIA) has 5; Oil & Gas Development Company Ltd (OGDCL) has 3 and Civil Aviation Authority has 2 medical centers for their employees. Similarly out of 163 dispensaries, OGDCL owns 68, WAPDA 30, PIA 13 and Pakistan Steel Mills 11 dispensaries.

The response in this regard is satisfactory as the actual data on expenditures on the prescribed questionnaire in respect of WAPDA, Pakistan Industrial Development Corporation, Karachi Port trust, Pakistan Petroleum Limited (PPL) and OGDCL own health care facilities have been received. The expenditures of the non-responding ABs/C hospitals, medical centers and dispensaries have been estimated on the basis of factors (health expenditures per employee incurred by the hos-

pital (Rs 5113), medical center (Rs 4598) and dispensary (Rs 1090) obtained from the actual data received from WAPDA and Pakistan Industrial Development Corporation.

The lump sum health Expenditures of all 24 ABs/with this co-mechanism in the year 2007-08 are 1295 million Rs for their own healthcare facilities and 2257 million Rs for their reimbursements. Overall the expenditure totals to 3552 million Rs.

As mentioned earlier, 118/174 federal ABs/C reported that they are providing health expenditures through reimbursement of medical charges only. Their health expenditures per capita of employee (in total 78,196) has been calculated (Rs 20,929) in order to raise the amount of health expenditures for the 27 non-responding federal ABs/C. This results in 665 million Rs assuming that they do not employ other mechanisms than reimbursement. Table 46 summarizes the above results by mechanism.

| Table 46: Expenditures of federal autonomous bodies/ corporations on health 2007-08 by mechanism |        |                                   |  |
|--|--------|-----------------------------------|--|
| Mechanism  | Number | Health Expenditures in million Rs |  |
| Reimbursement only   | 118    | 1640.44                           |  |
| Health insurance only  | 2      | 0.94                              |  |
| Reimbursement & Health insurance   | 8      | 46.78                             |  |
| Own health care facilities only  | 3      | 205.27                            |  |
| Reimbursement & Own health care facilities   | 24     | 3552.30                           |  |
| Non-response (estimated) 27 664.70   |        |                                   |  |
| Total 182 6110.44  |        |                                   |  |

The calculation of the health expenditures is a cumbersome exercise with a lot of possible pitfalls. Therefore, it is important to look for possibilities of benchmarking the result. The only source for that is Heartfile, a Pakistani think-tank and health sector NGO. In 2010 its founder and President Dr. Sania Nishtar has published a book titled "Choked Pipes" in which on page 82 federal ABs/C health expenditures are given as Rs 5,170.80million. In comparison, the result of PBS's Census of ABs/C seems to be quite comprehensive.

#### 6.6 Provincial autonomous bodies/corporations

In Census of ABs/C 2007-08, 176 bodies working under the control of provincial governments were covered. 72 of them were under the control of Punjab, 40 were located in Sindh, 46 in KP and 18 in Balochistan. The response rates were 58% for Punjab, 78% for Sindh, 63% for KP and 78% for Balochistan.

In Punjab there are 72 bodies and corporations working under the control of Punjab government, of which 43 have provided data/information which is 58% of the total Punjab ABs/C covering approximately 68% of the employees.

The actual reported data in respect of 43/72 ABs/C has been analyzed and observed that 37 out of 43 ABs/C are providing health services to their employees through the method of reimbursement of medical charges bills, 5 out of 43 are providing medical allowance to their employees and one out of 43 ABs/C is providing health services to their employees via its own health care center. Table 47 gives an overview of health expenditures incurred by the employees of 37/72

ABs/C via reimbursement in the period 2005-2008. It also includes the respective figures for the other provinces.

| Table 47: Expenditures of provincial autonomous bodies / corporations on health via reimbursement of medical charges 2005-06 until 2007-08 in million Rs |    |        |        |        |  |  |  |  |  |
|--|----|--------|--------|--------|--|--|--|--|--|
| Province AB / C (reporting) 2005-06 2006-07 2007-08  |    |        |        |        |  |  |  |  |  |
| Punjab   | 37 | 93.95  | 108.70 | 116.97 |  |  |  |  |  |
| Sindh  | 17 | 119.17 | 145.13 | 198.03 |  |  |  |  |  |
| KP   | 24 | 43.39  | 44.78  | 58.86  |  |  |  |  |  |
| Balochistan  | 6  | 2.10   | 2.23   | 3.53   |  |  |  |  |  |
| Total  | 84 | 258.61 | 300.84 | 377.39 |  |  |  |  |  |

The per employee health expenditures (Rs. 2,959) based on the reimbursement of medical charges bills has been calculated and raised for the 29 non responding ABs/C employees. Estimation procedure of the health expenditures of the non-responding ABs/C is shown in Table 48. The table includes the respective figures for the other provinces.

| Table 48: Estimation of health expenditures of the non-responding autonomous bodies / corporations via reimbursement method 2007-08 |         |                    |                                      |           |          |                  |  |  |
|---|---------|--------------------|--------------------------------------|-----------|----------|------------------|--|--|
| Province  |         | ponse<br>ursement) | Non-response Per Capita Expenditures |           |          |                  |  |  |
|   | AB / Cs | Employees          | AB / Cs                              | Employees | (in Rs.) | (In Million Rs.) |  |  |
| Punjab  | 37      | 39,526             | 29                                   | 19,893    | 2,959    | 175.83           |  |  |
| Sindh   | 17      | 33,081             | 9                                    | 7,575     | 5,986    | 243.37           |  |  |
| KP  | 24      | 19,081             | 17                                   | 3,916     | 3,081    | 70.86            |  |  |
| Balochistan   | 6       | 3,324              | 4                                    | 1,563     | 1,062    | 5.19             |  |  |
| Total   | 84      | 95,012             | 59                                   | 32947     | 13088    | 495.25           |  |  |

According to reported data one of the Punjab ABs/C (Punjab Seed Corporation) is providing health insurance to their employees in addition to reimbursement of medical bills facility and its health expenditures via health insurance is 0.582 million Rs. In Sindh two ABs/C namely Karachi Fisheries Harbor Authority and Liaquat University of Medical and Health Sciences, Jamshoro are providing healthcare services to their employees via health insurance only. The total health expenditures reported by these two ABs/C through health insurance only are Rs. 12.1 million Rs.

Besides the facility of re-imbursement of medical bills, 8 out of 43 ABs/C in Punjab are providing health services to their employees through their own health care facilities as well. For example, University of Punjab has 5 dispensaries, University of Agriculture, Faisalabad and Islamia University, Bahawalpur are running 2 dispensaries each for the health care of their employees/students etc. The response in this regard is satisfactory as the actual data on health expenditures on the prescribed questionnaire in respect of University of the Punjab, University of Agriculture, Faisalabad, WASA, Faisalabad and Multan Development Authority dispensaries was received. The expenditures of the non-responding ABs/C dispensaries have been estimated on the basis of factor (health expenditures per employee incurred by the dispensary is Rs.4, 176) obtained from the actual data on the dispensary received from University of Agriculture, Faisalabad. Expenditures of the non-responding ABs/C dispensaries have been estimated by multiplying the factor by the number of em-

ployees of the respective Punjab ABs/C. So the estimated health Expenditures of the Punjab ABs/C own healthcare facilities is Rs. 112.6 million.

Under Sindh government some bodies are also providing health services to their employees through their own health care facilities (Dispensaries). For example, University of Sindh, Jamshoro, University of Karachi, NED University of Engineering & Technology, Karachi, Mehran University of Engineering and Technology etc. are running dispensaries at campuses for the health care of students/employees. The expenditures of the dispensaries reported by Sindh ABs/C have been estimated on the basis of factor as mentioned under Punjab ABs/C. So the lump sum Expenditures of the Sindh ABs/C own healthcare facilities is worked out to Rs. 61.6 million.

Under KP government the bodies providing health services to their employees through their own health care facilities are, for example, GIK institute of Engineering and Sciences which has one hospital at the premises. University of Peshawar has one child welfare center and one dispensary; KP Agriculture University, Gomal University and Hazara University have also dispensaries at campuses for the health care of students/employees. The expenditures of the KP own healthcare facilities (one hospital, 6 dispensaries & one child welfare center) has been estimated on the basis of factors as mentioned above. Hence the lump sum Expenditures of the KP healthcare facilities is worked out to 49 million Rs. None of the ABs/C (as reported in the census) under KP government is offering health insurance to their employees.

In Baluchistan Lasbela University of Agriculture, Water & Marine Science is providing health services to their employees by running its own dispensary at premises. Expenditures of the dispensary is estimated on the basis of the factor (per employee Expenditures of the dispensary), which are 1.35 million Rs.

Table 49 gives an overview of the total health expenditures and its breakdown by mechanism incurred by the bodies and corporations of all four provinces in the fiscal year 2007-08.

| Table 49: Expenditures of provincial autonomous bodies / corporations on health by mechanism 2007-08 in million Rs |               |                              |          |        |          |  |  |  |  |
|--|---------------|------------------------------|----------|--------|----------|--|--|--|--|
| Mechanism  |               |                              |          |        |          |  |  |  |  |
| Province   | Reimbursement | Total Health<br>Expenditures |          |        |          |  |  |  |  |
|  | Mill. Rs      | Mill. Rs                     | Mill. Rs | Number | Mill. Rs |  |  |  |  |
| Punjab   | 175.83        | 112.67                       | 0.58     | 72     | 289.09   |  |  |  |  |
| Sindh  | 243.37        | 61.61                        | 12.18    | 40     | 317.16   |  |  |  |  |
| KP   | 70.86         | 49.09                        | Nil      | 46     | 119.95   |  |  |  |  |
| Balochistan  | 5.19          | 1.36                         | Nil      | 18     | 6.55     |  |  |  |  |
| Total  | 495.25        | 224.73                       | 12.76    | 176    | 732.74   |  |  |  |  |

# 7 Classifications and international guidelines

#### 7.1 Definitions and boundaries

The framework of health accounting has to be in line with international recommendations and classifications (of NHA) and with National Accounts as well. For these reasons, PBS is following the international guidelines of WHO and applies it tailor-made to Pakistan. The NHA-methods for the developing countries are derived from the System of Health Accounts (SHA). The SHA defines health care activities which are more focused on health services in health system.

"Activities of health care in a country comprises the sum of activities performed either by institutions or individuals pursuing, through the application of medical, paramedical and nursing knowledge and technology, the goals of:

- Promoting health and preventing disease;
- Curing illness and reducing premature mortality;
- Caring for persons affected by chronic illness who require nursing care;
- Caring for persons with health-related impairment, disability, and handicaps who require nursing care;
- Assisting patients to die with dignity;
- Providing and administering public health;
- Providing and administering health programs, health insurance and other funding arrangements"<sup>18</sup>.

In SHA manual, Total Health Expenditure (THE) includes health care functions under classification codes HC.1 to HC.7 plus capital formation<sup>19</sup> by health care providers (HC.R.1). The HC.1 to HC.7 & HC.R.1 include

- HC.1 Services of curative care
- HC.2 Services of rehabilitative care
- HC.3 Services of long-term nursing care
- HC.4 Ancillary services to medical care
- HC.5 Medical goods dispensed to outpatients
- HC.6 Prevention and public health services
- HC.7 Health administration and health insurance

According to the above definitional framework, medical education and health-related professional training & research is not included in the Total Health Expenditure (THE). This definitional framework is important, when it comes to cross country comparisons.

<sup>&</sup>lt;sup>18</sup> Organization For Economic Co-Operation And Development (OECD), 2000, A System of Health Accounts Version 1.0. pp. 42.

<sup>&</sup>lt;sup>19</sup>Gross capital formation in health care industries are those expenditure that add to the stock of resources of the health care system and last more than an annual accounting period

The method recommended for developing countries by WHO gives them the liberty to include categories which are seen as integral part of the health system such as health education or health related research or training and is called "National Health Expenditure". So, Total Health Expenditure (THE) is the definitional framework provided by OECD (for international comparisons) and the National Health Expenditure (NHE) is the definition adopted by any particular country.

As for NHA Pakistan, regardless of the type of the institution or the entity providing or paying for the health care activity. It is as follows:

"National health expenditure encompasses all expenditures for activities whose primary purpose is to restore, improve, and maintain health for the nation and for individuals during a defined period of time" <sup>20</sup>.

NHA Pakistan comprises of the health expenditures for the four provinces (Punjab, Sindh, KP and Balochistan) and federal health expenditures, which amounts to the national health expenditures. NHA Pakistan shows health expenditure for Pakistani citizens and residents as well as spending by external agencies, like bilateral donor and UN agencies, on inputs to health care in Pakistan. This means that NHA Pakistan:

#### Includes:

- ■Health expenditures by citizens and residents temporarily abroad
- ■Donor spending (both cash and in-kind) whose primary purpose is the production of health and health-related goods and services in Pakistan

#### Excludes:

- ■Health spending by foreign nationals on health care in Pakistan (as NHA treats this as export of health services and does not include in NHA estimation) in Pakistan
- ■Donor spending on the planning and administration of such health care assistance

It is recommended that NHA should use the accrual method in accounting for expenditures, not the cash method. This would mean that expenditures are related to the time period during which the actual activity takes place. The accrual method uses the expenditures, which are attributed to the time period during which the economic value was created whereas the cash method refers to the expenditures, which are registered when the actual cash disbursements take place. However, the data situation in Pakistan does not yet allow for application of the accrual method. The numbers presented in the first round report and in this report of NHA are both cash-based.

NHA for the FY 2007-08 presented in this reports in accordance to the advice from WHO. The scope of tables for the second round has been improved by adding table on health care providers dimension and cross table of health care providers and financing agents.

### 7.2 ICHA-Classification adapted for Pakistan

The NHA classification categorizes the dimensions of health care system (namely, financing sources, financing agents, providers and functions). Each classification and category of NHA has a

<sup>&</sup>lt;sup>20</sup> World Health Organization, 2003, Guide to Producing National Health Accounts: with special applications for low-income and middle-income countries, pp. 20.

code. A letter code is used for the four main classifications used in NHA Pakistan. For example, financing sources are denoted by the code FS, financing agents by HF. For more details see Annexure 5 and 6.

NHA Pakistan estimates are based on the concepts and accounting framework outlined in the "Guide to Producing National Health Accounts - with special applications for low-income and middle-income countries". <sup>21</sup>Classifications for financing sources, financing agents and health care providers has been prepared for Pakistan(see annexures) including the linkages between them as shown in the various matrices.

Analysis of financing sources may be of particular interest where funding for the health system is diverse or changing rapidly in response to new financing strategies. Figures on financing sources are designed to reflect some of the key policy interests in the health system as well.

FS.1 covers all public funds. It is further divided into three sub-categories. FS.1.1 captures funds generated through general government. General government in Pakistan is federal government, provincial government and district / tehsil government. The ministry of finance acts as a main source of finance for civilian and military part. The provincial governments are the main source of finance for each province. The cantonment boards are placed under district government section as they are financially autonomous and act as source of finance.

Unlike government revenues, money that is collected by government and dedicated to social security funds is not counted under category FS.1.1. Therefore employers' contributions to social security schemes are categorized as other public funds category FS.1.3.

FS.2 covers all private funds. Here FS.2.1 covers employer funds. Similarly, household funds (FS.2.2) include household out of pocket payments, Zakat and health insurance.

FS.3 category is reserved for funds that come from outside the country. External resources such as bilateral and multilateral international grants as well as funds contributed by institutions and individuals outside the country are included to the extent that they are used in that current period.

The classification scheme for financing agents allows categorizing the institutions and entities that pay or purchase health care in different groups. Financing agents include institutions that pool health resource collected from different sources, as well as entities (such as household and firms) that pay directly for health care from their own resources. As with the functional classification scheme in ICHA, NHA will likely show policy relevant subcategories of financing agents under many of the two digits heading of the ICHA-HF. For example, under central government (HF 1.1.1) countries probably will add additional categories for the Ministry of Health, Ministry of Education, and other ministries and so on. Health education itself is not an agent but it is included, because it falls into the boundary of health expenditures as per international definition (and has to be used to calculate the total health expenditures). The category of reimbursements of medical charges by other ministries is added as lump sum as it does not allow for further disaggregation.

The Pakistan health care financial agents are classified into two major categories: general government and private sector. Under general government the main categories are territorial government and social security funds. In territorial government the classification code HF.1.1.1 explains

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<sup>&</sup>lt;sup>21</sup> See WHO website, <a href="http://www.who.int/nha/create/en/">http://www.who.int/nha/create/en/</a>.

the federal government part under which federal (civil), military and cantonment board are categorized while Ministry of Health, Ministry of Population Welfare and reimbursement of medical charges are considered in the federal civil part.

Code HF.1.1.2 covers the provincial government expenditures by provinces. Each province has been further categorized into different departments like health, population welfare, education and reimbursement of medical charges. HF.1.1.3 covers the district / tehsil / local government and cantonment boards sections. HF.1.1.4 covers the autonomous bodies/corporations section. Hopefully, in the third round, the classifications for compiling country health accounts would be revised as per recommended global standard document called SHA version 2.0.

The next main category under general government is social security funds, which from Pakistan's perspective includes the social security funds channeled through ESSI (coming from the employers) and Ministry of Religious Affairs, Zakat & Usher (coming from household Zakat contributions).

The private sector (HF.2) is classified as private health insurance, private household out of pocket payments and, if any, local / national NGOs involved in providing health services. Rest of the world funds are covered under HF.3. Most of them under official donor agencies category HF.3.1

### 7.3 Revision of the System of Health Accounts

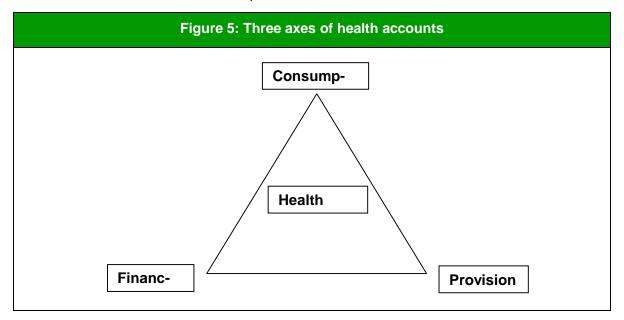
As more countries implementing NHA, the demand for improved analytic tools related to health expenditure is growing. Health accountants are encountering more expectations from policy analysts, policy makers and the general public alike for sophisticated health expenditure data. It is desirable to have data which is more reliable, timely, and comparable, both across countries and over time.

The SHA 2011 (sometimes also referred to as "SHA II" or "SHA 2") provides global standards and is expected to avoid the development of divergent methodologies for the compilation of health expenditure accounts. It shares the goal of the System of National Accounts to constitute a system of comprehensive, internally consistent and international comparable accounts, which should be compatible with other aggregate economic and social statistics as far as possible. The SHA 2011 draws on countries best practices and relevant international standards and is the result of a wideranging consultation process.

SHA 2011 has introduced a number of changes and improvements. It starts with a greater focus on health consumption expenditure, with a more detailed consideration of prevention, long-term care, and traditional medicines. It provides more comprehensive guidance on recording the financing of health expenditures through health care financing schemes and their revenues. SHA 2011 interprets financing schemes as the key components of the health financing system from the point of view of access to care, and hence connects them to providers and health care functions in the SHA's tri-axial system of consumption, provision and financing (see Figure 6).

All four components of the health system can be linked to the three axes of health accounts. Each axis is associated with specific classification, but there is no unique classification matching each axis. For example, the financing axis can equally be measured by financing schemes and financing agents. Consumption is the starting point and the goods and services consumed with a health purpose (functions) set the boundary of the health accounts. What has been consumed has been produced and provided, thus another axis is provision, and what has been consumed and pro-

vided has been financed. This means that the third axis, financing as well as the second axis on provision are measured around the consumption.



There is also a greater separation of the accounting for consumption expenditure and capital expenditure on health system to reduce the ambiguity regarding their links, resulting in a new chapter in capital formation. It also introduces some new chapters like expenditure by groups of beneficiaries according to disease, age, gender, region and socio-economic group. Building on the methodological work of the Producer Guide, there is also chapter of the factor costs of healthcare providers.

There is distinction between the developing and developed countries as far as health accounting methodology is concerned. Developed countries are using System of Health Accounts (SHA) while the developing countries are using the National Health Accounts (NHA) guideline. This distinction has been removed and the revised system of health accounts (SHA 2.0) is now the recommended Global Standard for compiling Health Accounts.

#### 7.4 Charts of accounts classification for government finance

"The Finance Division deals with the subjects pertaining to finance of the Federal Government and financial matters affecting the country as a whole, preparation of annual budget statements and supplementary / excess budget statements for the consideration of the parliament accounts and audits of the Federal Government Organization etc. as assigned under the Rules of Business, 1973".<sup>22</sup>

The Accountant General Pakistan Revenues (AGPR) is responsible for the centralized accounting and reporting of federal transactions. Additionally the AGPR is responsible for the consolidation of summarized financial information prepared by federal self-accounting entities. The AGPR receives accounts and reports from the District Account Offices (DAOs), Provincial Accounts Offices (PAOs), Federal Treasuries and State Bank of Pakistan / National Bank of Pakistan, and provides

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<sup>&</sup>lt;sup>22</sup> See MOF website, <a href="http://www.finance.gov.pk/">http://www.finance.gov.pk/</a>.

Annual Accounts (to the AGP) and Consolidated Monthly Accounts (to the Federal Finance Division). There are AGPR sub-offices in each of the Provinces which also act as the DAO in respect of Federal Government transactions relevant to the Provincial Headquarters. The Controller General of Accounts is the administrative head of the AGPR.

The Provincial Accountant General (AG) offices, located in provincial capitals, are responsible for keeping the Provincial Accounts. The Detailed Accounts data for Federally Administered Tribal Areas (FATA) is kept with the FATA Secretariat located in Peshawar.

In December 2000, the New Accounting Model, which includes the new Chart of Accounts (CoA), was prescribed by the Auditor General of Pakistan under the Project to Improve Financial Reporting and Auditing (PIFRA). The new CoA is expected to provide a uniform basis for classification of Receipts, Expenditure, Assets, Liabilities and Equity through elements such as:

- Entity: The Entity element enables reporting transactions by the organizational structure or the organizational unit, which is creating a transaction.
- Function: The Function element provides reporting of transactions by economic function and program. The Function code is mandatory for transactions relating to expenditure. The Health Function code is 7.
- Object: The object element enables the collection and classification of transactions into expenditure and receipts and also to facilitate recording of financial information about assets, liabilities, and equity. The use of the object element is mandatory for all accounting transactions.
- Fund: The fund element is a one alpha character and identifies the fund as being the consolidated fund or public account.
- *Project:* The project element enables transactions to be aggregated and reported at a project level.

The public sector data utilized for this report classifies according to PIFRA or CoA. For PIFRA Classification (by function for health and other codes relevant to health expenditures) see Annexure 10.

# 8 Health Care System in Pakistan

### 8.1 Public sector, territorial government, civilian part

Pakistan's public health delivery system functions as an integrated health complex that is administratively managed mainly at the district level. Health services delivery is primarily a provincial matter while the Federal Government plays a supportive and coordinating role. Previously, the Ministry of Health was mandated with policy making, coordination, technical assistance, training and seeking foreign assistance. However, on June 30, 2011, under the18<sup>th</sup>constitutional amendment has been devolved leading to the transfer of powers to provincial governments. The Ministry of Health had a number of vertical public health programs such as Extended Programme of Immunization, Family Planning & Primary Health Care, National Tuberculosis Control Programme, National Aids Control Programme etc. which are funded by the federal government but their implementation is carried out at the provincial and district levels. Health facilities at federal level include 7 hospitals, 39 dispensaries, 1 tuberculosis (TB) clinic, 4 Maternal and Child Health (MCH) Centers, 3 Rural Health centers (RHCs), 14 Basic Health Units (BHUs) <sup>23</sup>. Table 50 gives an overview of total public health facilities 2006-07.

| Table 50: Public health facilities in Pakistan 2006-07 |         |  |  |  |  |  |
|--|---------|--|--|--|--|--|
| Туре   | Number  |  |  |  |  |  |
| Hospitals  | 965     |  |  |  |  |  |
| Dispensaries   | 4,916   |  |  |  |  |  |
| Basic Health Units                                     | 4,872   |  |  |  |  |  |
| Rural Health Centres                                   | 595     |  |  |  |  |  |
| MCH Centres  | 1,138   |  |  |  |  |  |
| TB Centres   | 371     |  |  |  |  |  |
| First Aid Points                                       | 1,080   |  |  |  |  |  |
| Beds in hospitals & dispensaries                       | 105,005 |  |  |  |  |  |
| Population per bed                                     | 1,515   |  |  |  |  |  |
| Population to health facility ratio                    | 11,413  |  |  |  |  |  |

Source: Ministry of Heath

The health care provision which is a provincial subject is divided into primary, secondary and tertiary health care:

Primary health care is implemented through Basic Health Units (BHUs), Rural Health Centers (RHCs), Maternal and Child Health Centers (MCHCs) and Dispensaries.

Secondary health care includes first and second level referral facilities providing acute, ambulatory and inpatient care provided through Tehsil Headquarter Hospitals (THQs), and District Headquarter Hospitals (DHQs). Tehsil Headquarter Hospitals (THQs),

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<sup>&</sup>lt;sup>23</sup> Ministry of Health: <a href="http://www.health.gov.pk/">http://www.health.gov.pk/</a>. Accessed on 14 March 2009.

and District Headquarter Hospitals (DHQs) covers 100,000 to 300,000 and 1-2 million persons respectively<sup>24</sup>the primary and secondary health care constitutes the District Health System.

Tertiary health care is provided through major hospitals with specialized facilities which are under the administrative jurisdiction of provinces.

Annexure 2 describes the provincial system of health care in a scheme. Annexure 3 gives a schematic overview of the overall health care system in Pakistan with public and private sector as its two main components. The public sector can further be subdivided into federal government, provincial governments and autonomous bodies of both of them. For the federal government Ministry of Health and Ministry of Defense are the main stakeholders. The private sector is subdivided into five categories of health care providers.

### 8.2 Military health care system, cantonment boards, autonomous bodies

The provision of medical services in military setup is the responsibility of the Army Medical Corps. Their overall responsibilities include maintaining and promotion of health and prevention of diseases, provision of care and treatment to sick and wounded, rapid collection and speedy evacuation of casualties in the field from Forward Defended Localities for life and limb saving surgery at Forward Treatment Centre / Field Hospital / Base Hospital, supply and replenishment of medical equipment and stores and provision of skilled and expert treatment in the base hospitals / centers of excellence. The population covered by military health care system includes serving soldiers, families, parents, retired soldiers, civilians paid from defence estimates and civilian non-entitled.

Annexure 4 categorizes the military health care system according to the services provided (preventive or curative) and to the groups of beneficiaries (military personnel exclusively or their dependents also or even the general public at large). The perception that Fauji Foundation is the corporate face of Army is not correct and in fact it is a private charitable trust. The Government of Pakistan, Ministry of Health, Labour, Social Welfare and Family Planning, vide Notification No SR 395 (K) 72 dated 8 March 1972 registered a Scheme of Administration for Fauji Foundation under the Charitable Endowment Act 1890 thus retaining its status as a private trust. It neither receives any subsidy from the government of Pakistan nor gives any financial support to army. <sup>25</sup>

Military Lands & Cantonment Department is an attached department of Ministry of Defence. There are 43 cantonment Boards in Pakistan. Geographically, 22 Cantonment Boards are in Punjab, 8 in Sindh, 9 in KP, and 4 in Balochistan. They have hospitals / dispensaries providing health care to their employees as well as to the residents of the respective Cantonments. Each Cantonment Board has financial autonomy.

Autonomous bodies are set up in the public sector under an act of legislation or ordinance (subject to legislative approval) to perform regulatory, operational, corporate, promotional, research and developmental functions (see Chapter 6). Theymay provide health services to their employees through the following means:

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<sup>&</sup>lt;sup>24</sup>Health System Profile – Pakistan, as cited above

<sup>&</sup>lt;sup>25</sup> Fauji Foundation Pakistan. Accessed at: <a href="http://www.fauji.org.pk/Webforms/Legal.aspx">http://www.fauji.org.pk/Webforms/Legal.aspx</a> Date accessed: 17/11/2009

- Health care through their own health facilities
- Provision of medical allowance to their employees
- Reimbursement of medical bills.
- Provision of health insurance to their employees.

### 8.3 Social protection in Pakistan

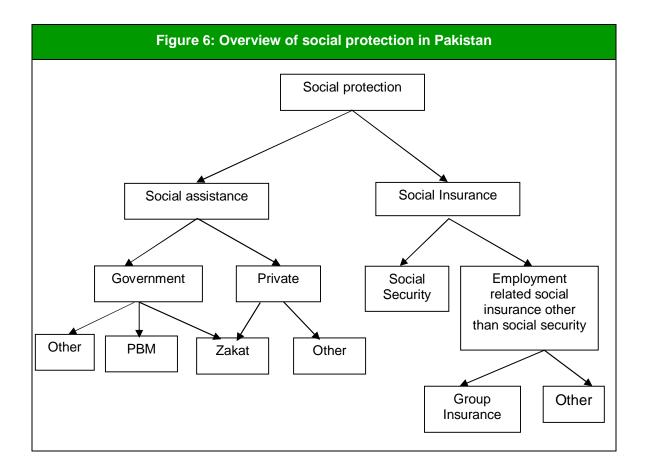
In common language as well as in many technical texts the terms "social protection", "social assistance", "social security" and "social insurance" often are mixed up. Figure 7 intends to give some clarification in that regard. Social protection is defined as "the set of policies and programs designed to reduce poverty and vulnerability by promoting efficient labor markets, diminishing people's exposure to risks, and enhancing their capacity to protect themselves against hazards and interruption/loss of income"<sup>26</sup>.

In United Nations' Classification of the Functions of Government (COFOG) social protection besides of health care covers sickness and disability, old age, survivors, unemployment and some other issues of social exclusion. <sup>27</sup>Social protection has its two components social insurance and social assistance <sup>28</sup>. Social assistance can further be classified into private and governmental social assistance (see Figure 3). In Pakistani context, Zakat is one of the important forms of social assistance. In addition to Zakat there are other forms of social assistance in Pakistan such as social assistance in kind, welfare services etc. Zakat can further be broken down into governmental and private Zakat. In this context, of course, social assistance and social insurance matter with regard to their fraction related to health expenditure, only.

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Asian Development Bank. Social Protection. Official Policy Paper. July 2003. Available at: <a href="http://www.adb.org/documents/policies/social-protection/#contents">http://www.adb.org/documents/policies/social-protection/#contents</a>. Accessed 15 January 2009

<sup>&</sup>lt;sup>27</sup> COFOG is available on website United Nations Statistics Department (UNSD)
<sup>28</sup>ADB, Social Protection Strategy Development Study, Social Protection, Final Report Vol. 1: Social Protection.



In this section, the primary focus would be on the social security and Zakat while the private health insurance (including employment related social insurance) would be dealt with in private sector, in section 8.5.

### 8.3.1 Employees social security institutions

The risk of getting sick can be covered by private health insurance or by social insurance. Social insurance is not easy to define. According to the United Nations' System of National Accounts 2009 (par. 17.84) a social insurance scheme is an insurance scheme where the following two conditions are satisfied:

- the benefits received are conditional on participation in the scheme and constitute social benefits as this term is used in the SNA; and
- o at least one of the following three conditions is met:
  - Participation in the scheme is obligatory either by law or under the terms and conditions of employment of an employee, or group of employees;
  - The scheme is a collective one operated for benefit of a designated group of workers, whether employed or non-employed, participation being restricted to members of that group;
  - An employer makes a contribution (actual or imputed) to the scheme on behalf of an employee, whether or not the employee also makes a contribution.

Those participating in social insurance schemes make social contributions to the schemes and receive social benefits. In Pakistan, a social insurance system exists in the form of social security since 1967, though it is very limited in scope and area. Social security in Pakistan provides only an umbrella of social health protection for a selected segment of the population covering no more than 5% of total population.<sup>29</sup>

These Social Security Institutions (Employees Social Security Institutions "ESSI") are present in all the four provinces and are provincial autonomous bodies attached to respective provincial Department of Labour. These institutions cover areas such as sickness, maternity, work injury, invalidity and death benefits. However, their primary focus is on provision of medical care to the employees of private industries and commercial establishments employing 5 to 10 or more employees (depending upon the province). The coverage is provided to the employees of these establishments drawing monthly wages up to 5,000 -10,000 Rs, depending upon the province <sup>30</sup> (Figure 4). The workers and their dependents are entitled to medical care from the first day of the employment. The dependents include wife, dependent parent and any unmarried children up to 21 years. Other categories of employees, such as day labourers and agricultural workers (Informal Sector) are excluded yet. For providing medical care to the secured workers, the provincial social security institutions have a network of hospitals, dispensaries, treatment centers; qualified doctors, paramedical staff, ambulances etc.

These services are provided free to the employees as their employer pays these contributions. Employers covered under the scheme contribute towards the scheme at the rate of 7% of their wages paid to insurable workers. The secured employees incur no deduction, co-payment, or any other cost in order to avail these services. They can avail these services after proper registration from the department and after qualifying a period of 3 months.

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<sup>&</sup>lt;sup>9</sup>ADB TA 4155-Pak, Social protection strategy development study, Vol:II, Health Insurance, 2004, 26.

<sup>&</sup>lt;sup>30</sup> Naushin Mahmood, Zafar Mueen. Pension and Social Security Schemes in Pakistan: Some Policy Options. PIDE Working Paper, 2008:42.

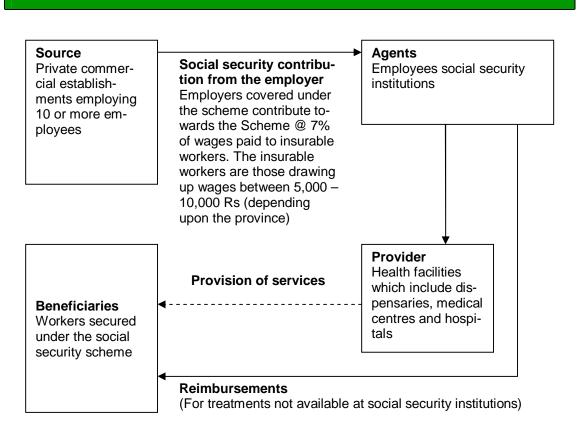


Figure 7: Social security system in Pakistan

Adapted from: Health System Profile – Pakistan. Regional Health System Observatory-EMRO, World Health Organization, 2007

#### 8.3.2 Zakat managed by government

Zakat system in Pakistan can be divided generally into two major components<sup>31</sup> namely private Zakat(which is included in the philanthropic section 1.4.8) and governmental Zakat. The governmental system was introduced through "Zakat and Usher Ordinance 1980"<sup>32</sup>. The benefits are targeted at the poorest. The main systems providing social assistance benefits are Zakat and Bait-ul-Mal.<sup>33</sup>Zakat fund is utilized for assistance to the needy, the indigent and the poor particularly orphans and widows, the handicapped and the disabled.

The system relies on mandatory Zakat deduction at the rate of 2.5% from the value of following 11 categories of assets:

- § Saving bank accounts
- § Notice deposit receipts and accounts

<sup>&</sup>lt;sup>31</sup> ADB, Social Protection Strategy Development Study, Social Protection, Final Report Vol. 1: Social Protection, 34ff.

<sup>&</sup>lt;sup>32</sup>Zakat & Usher Ordinance, 1980, (NO. VIII of 1980).

<sup>&</sup>lt;sup>33</sup> ADB, as cited above, 34ff.

- § Fixed deposit receipts and accounts (e.g. Khas Deposit Certificate)
- § Saving/ deposit certificates (e.g. Defence Saving Certificates, National Deposit Certificates)
- § Units of the National Investment Trust
- § ICP Mutual Fund Certificates
- § Government Securities (other than prize bonds)
- § Securities including shares and debentures
- § Annuities
- § Life insurance policies
- § Provident funds

#### 8.3.3 Pakistan Bait ul-Mal

Pakistan Bait-ul-Mal (PBM), an autonomous body set up through an Act in 1991 works under the umbrella of Ministry of Social Welfare and Special Education. PBM is significantly contributing toward poverty alleviation through its various services focused on the poorest of the poor and providing assistance to destitute, widow, orphan, invalid, infirm & other needy persons, as per eligibly criteria approved by Bait-ul-Mal Board. They also spend money on health in various forms:

- Through Individual Financial Assistance (IFA) the poor, widows, destitute women, orphans
  and disabled persons are supported through general assistance, education, medical treatment and rehabilitation. The financial assistance for health is dedicated for the Medical
  treatment of major ailments and disabilities of the poor patients. The financial ceiling for
  medical treatment is 300,000Rs.
- The regular portion of Bait-ul-Mal's money, dedicated for health, is the IFA for medical treatment. In addition, it has supported (not as a regular activity) in the past the establishment of the new health care facilities. For instance, it has supported the opening of a drug and diagnostic center in KP and also supported the construction of a burn and reconstructive surgery center in Lahore.
- PBM also has a project named Institutional Rehabilitation which basically provides support to registered NGOs under following three strategies
  - Strategy-I: Institutional support for the poor: Sharing of capital cost by Pakistan Bait ul Mal (PBM) at the ratio 50% and 50% share of NGO.
  - Strategy-II: Free eye care for cataract operations: Technical committee assists PBM in selecting suitable NGOs. Actual expenses of cataract operations provided on annual / quarterly basis
  - Strategy-III: Innovative Pilot Project, PBM-NGO's partnership for 3 to 5 years. Sharing of capital cost and recurring expenses 50% NGO

### 8.4 Private healthcare facilities

The private health care facilities are quite diverse and have generally grown unregulated. There are no standardized or classified health facilities in the private sector. The private sector generally exists in the form of:

- major hospitals with specialized health facilities;
- other hospitals with variable quality / level of services;
- Individually run clinics / general practitioners including dental and eye care. These clinics are either owned by a single person who is the sole proprietor of the facility or they are run on partnership basis;

- homeopaths, hakeems, tabibs and other traditional health providers;
- health care facilities from NGOs including the philanthropic organizations;
- Ambulatory health services;
- · Pharmacies and
- Opticians.

Considering that 87.6% of the population access healthcare from the private sector and 12.3% from public sector, it is vital to estimate the health expenditures in private sector. In principle, this can be done using demand-sided (patients or households) or supply-sided (health care providers) approaches or both. In first round of NHA Pakistan the demand-sided approach was applied on household data. In the second round of NHA Pakistan, the same approach has been adopted by getting data from the specialized Out of Pocket Health Care Expenditure Survey conducted by PBS. For the results see Chapter 5.

#### 8.5 Private health insurance

Health insurance is categorized under the non-life insurance and there are about 52 insurance companies in non-life insurance sector in Pakistan<sup>34</sup>. Group health insurance is offered by 6 or 7 insurance companies and individual health insurance by one insurance company<sup>35</sup>. The Securities and Exchange Commission of Pakistan (SECP) under the Insurance Ordinance 2000 took over as the formal regulator of the insurance industry. The SECP has provided the data on insurance premiums and insurance claims for health for the years 2004 to 2007.

### 8.6 Philanthropic / Non-Government Organizations

Philanthropy has been defined as "activities of voluntary giving and serving, primarily for the benefit of others beyond family"<sup>36</sup>. The philanthropy is dedicated to health care, but not exclusively. It has broadly two components

- Services: in which the non-profit organizations are primarily involved
- Giving: individual or corporate

Philanthropy is very commonly institutionalized as non-government organizations (NGOs), also often referred to as non-profit institutions (NPIs). The NGO's are an important part of the civil society and are quite distinct from the private enterprises. Known variously as the 'non-governmental', 'voluntary', 'community based', 'charitable', 'welfare societies', this set of institutions include within it a variety of entities such as schools, hospitals, dispensaries, human rights organizations etc. Many definitions of NGOs have been put forward which add to the confusion. However, despite their diversity the NGOs share certain common features<sup>37</sup>:

They have an institutional presence and structure;

<sup>&</sup>lt;sup>34</sup> Asian Development Bank. Private Sector Assessment Pakistan. December 2008

Asian Development Bank. Technical assistance to the Islamic Republic of Pakistan for developing a social health insurance project (TAR;PAK 37359)., 2005.

<sup>&</sup>lt;sup>36</sup> Pakistan Centre for Philanthropy. Available at: <a href="http://www.pcp.org.pk/">http://www.pcp.org.pk/</a>. Accessed on 20 Jan 2009

<sup>&</sup>lt;sup>37</sup>"Dimensions of the Non-Profit Sector in Pakistan" Social Policy and Development Centre, Working Paper No.1 (2002).

- They are institutionally separate from the state;
- They do not return profits to their members, managers or directors
- They control their own affairs;
- They attract some level of voluntary contribution of time or money and also membership in them is not legally required.

Pakistan Centre for Philanthropy (PCP) has been working on the regulation of the philanthropy in Pakistan with a mission to increase the volume and effectiveness of the philanthropy for social development. The PCP database includes only certified institutions. A study titled "Dimensions of the Non Profit Sector in Pakistan" was conducted by Social Policy and Development Centre in 2002 which estimated the total number of NGO/NPO in Pakistan to be 45,000 and also provided the sector wise breakdown (see Table51).

| Table 51: NGO/NPO by sectors              |        |       |  |  |  |  |  |
|---|--------|-------|--|--|--|--|--|
| Sector Number In per co                   |        |       |  |  |  |  |  |
| Total                                     | 45,000 | 100.0 |  |  |  |  |  |
| Education and research                    | 20,700 | 46.0  |  |  |  |  |  |
| Civil rights and advocacy                 | 8,100  | 18.0  |  |  |  |  |  |
| Social services                           | 3,600  | 8.0   |  |  |  |  |  |
| Development and housing                   | 3,150  | 7.0   |  |  |  |  |  |
| Health                                    | 2,700  | 6.0   |  |  |  |  |  |
| Culture and recreation                    | 2,700  | 6.0   |  |  |  |  |  |
| Religion (management of religious events) | 2,250  | 5.0   |  |  |  |  |  |
| Business and professional associations    | 1,800  | 4.0   |  |  |  |  |  |

Source: Dimensions of the Non-Profit Sector in Pakistan" Social Policy and Development Centre, Working Paper No.1 (2002

The practices of giving can broadly be divided into Individual and corporate giving. The individual giving can further be classified as zakat and non-zakat giving. As being predominantly a Muslim country, much of Pakistan's individual giving is probably in response to the teachings of Islam. The individual giving includes the obligatory (by religion) festival charity (Zakat-ul-fitr) and charitable wealth tax (Zakat-ul-mal). The zakat deducted at source by the government mentioned in the Zakat section only includes the Zakat-ul-mal. Also it is not obligatory on the citizens to give the Zakat at the Government source. They have the option of paying zakat privately on their own.

The corporate giving is also an important part of philanthropy. About 37% of the corporate sector is involved in philanthropic support to the health sector<sup>38</sup>.

It is pertinent to mention here that the health expenditures incurred by local or national NGOs involved in providing health services has been accounted for in this report while the individual philanthropies whether in cash (except for Zakat & Bait-ul-Mal) or in kind are not accounted for in this report, as there is lack of national level research/data on it.

<sup>&</sup>lt;sup>38</sup> Pakistan Centre for Philanthropy. Available at: <a href="http://www.pcp.org.pk/fact\_sheet.html">http://www.pcp.org.pk/fact\_sheet.html</a>. Accessed on 20 Jan 2009

# **Annexures**

### **Annexure 1: Data sources**

| Data Type                 | Source                         | Publication or official correspondence available  |
|---------------------------|--------------------------------|---|
| Out of pocket expenditure | PBS                            | OOP survey  |
| Federal government        | AGPR                           | Appropriation Accounts (Civil) Volume-1 2007-08   |
| Provincial government     | AG Office Punjab               | Appropriation Accounts for the Year 2007-8 Accountant General Punjab  |
| District data             | AG-Office Punjab               | Distr. Appropriation Accounts 2007-2008   |
| Provincial government     | AG Office Sindh                | Appropriation Accounts for the Year 2007-2008 Accountant General Sindh  |
| District data             | AG-Office Sindh                | Distr. Appropriation Accounts 2007-2008   |
| Provincial government     | AG Office KP                   | Appropriation Accounts for the Year 2007-2008 Accountant General ,KP  |
| District data             | AG-Office KP                   | Distr. Appropriation Accounts 2007-2008   |
| Provincial government     | AG Office Baluchistan          | Appropriation Accounts for the Year 2007-2008 Accountant General Baluchistan                                      |
| District data             | AG-Office Baluchistan          | Distr. Appropriation Accounts 2007-2008   |
| Health Insurance data     | SECP                           | SECP (Insurance Division) Official Letter,  |
| Donors                    | EAD                            | Received permission through e-mail for the use of EAD website <a href="https://www.dadpak.org">www.dadpak.org</a> |
| Social Security           | Punjab ESSI                    | Data collected personally   |
| Social Security           | Sindh ESSI                     | Data collected personally   |
| Social Security           | KP ESSI                        | Data collected personally   |
| Social Security           | Balochistan ESSI               | Data collected personally   |
| Military                  | Military Accountant General    | Data collected personally   |
| Zakat                     | Ministry of Religious Affairs  | Data collected personally   |
| ABs/C                     | Federal/ Provincial Govt.      | Respective ABs/C under Federal/ Provincial Govt.  |
| Provincial employees      | Finance department Punjab      | Data collected personally   |
| Provincial employees      | Finance department Sindh       | Figure given on official website  |
| Provincial employees      | Finance department KP          | Data collected through mail   |
| Provincial employees      | Finance department Balochistan | Data collected through mail   |

#### **Annexure 2: Literature**

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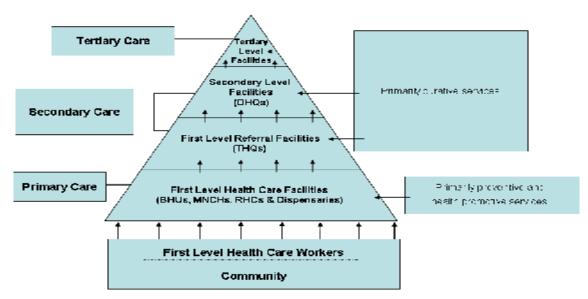
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**Annexure 3: Structure of Provincial Health Care** 

Adapted from: S Siddiqi et al. The effectiveness of patient referral in Pakistan. Health Policy and Planning; 16 (2): 193 - 198

*Primary health care* is implemented through Basic Health Units (BHUs), Rural Health Centers (RHCs), Maternal and Child Health Centers (MCHCs) and Dispensaries.

A Basic Health Unit (BHU) covers 10000 to 15000 populations and 5-10 BHUs are attached to a Rural Health Centre (RHC)<sup>39</sup>. It mainly provides health preventive and health primitive services such as maternal and child health services, immunization, diarrheal disease control, malaria control, child spacing, mental health, school health services, prevention & control of locally endemic diseases, and provision of essential drugs.

A Rural Health Center (RHC) covers 25,000 to 50,000 populations. It mainly provides preventive and health primitive services, also curative services for common illnesses.

Maternal and Child Health Centers (MCHCs) are part of the of the integrated health system focusing on the maternal and child health.

Secondary health care includes first and second level referral facilities providing acute, ambulatory and inpatient care provided through Tehsil Headquarter Hospitals (THQs), and District Headquarter Hospitals (DHQs). The primary and secondary health care constitutes the District Health System. Tehsil Headquarter Hospitals (THQs), and District Headquarter Hospitals (DHQs) covers 100,000 to 300,000 and 1-2 million persons respectively<sup>40</sup>

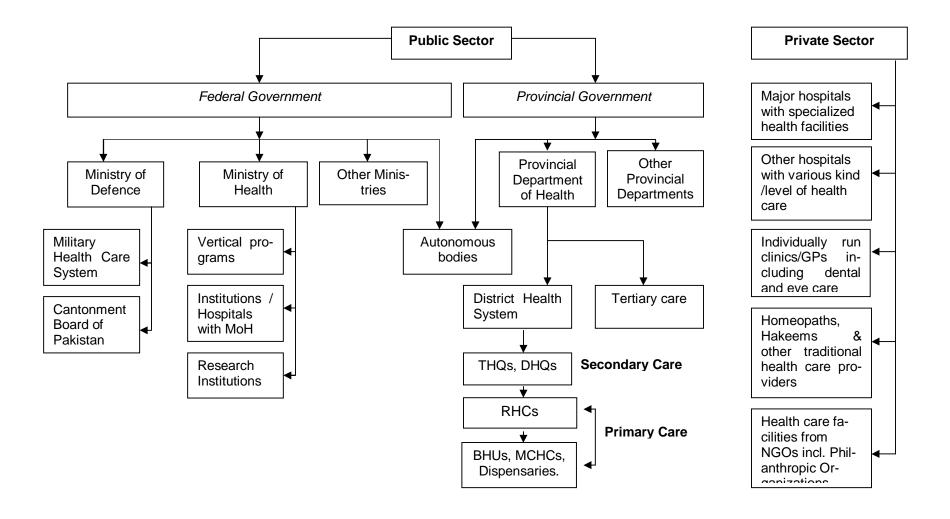
Tertiary health care is provided through major hospitals with specialized facilities which are under the administrative jurisdiction of provinces.

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<sup>&</sup>lt;sup>39</sup>Health System Profile - Pakistan. Regional Health System Observatory-EMRO, World Health Organization, 2007.

<sup>&</sup>lt;sup>40</sup>Health System Profile – Pakistan, as cited above

**Annexure 4: Schematic overview of Health Care System** 



**Annexure 5: Military Health Care System** 

#### **Tertiary Primary Care Secondary Care** Care Curative Preventive Preventive Curative services & curative services services Curative services mainly mainly services mainly mainly Combined Tertiary **Military** Care Garrison Hospital **Military** Medical Recep-Medical **Military** (CMH) **Battalion** tion **Centres Hospital** Centres Class "A", AFIRM, Class "B", AFIU, Class "C". AFBMTC, & Class "D" AFID, CMH---AFIT, AFIP, Equal to Provide Provide Secondary **AFIC** Provide services exclu-Services to health level health Military sively to the Military perservices to care facility personnel sonal and their depend-**Pakistan** in field ents Army, their depend-Provide health services to all ents and of the Armed Forces, their to the dependents and to the gengeneral eral public public

| Secondary health care in military |        |                   |                    |  |  |  |  |  |
|-----------------------------------|--------|-------------------|--------------------|--|--|--|--|--|
| Health facility                   | Number | Beds per facility | Function           | Population   |  |  |  |  |
| Class "A"<br>CMHs*                | 10     | 500 & above       |                    |  |  |  |  |  |
| Class "B"<br>CMHs*                | 9      | 300-400           | Primarily          | All of the Armed Forces, their dependents              |  |  |  |  |
| Class "C"<br>CMHs*                | 11     | 51-200            | curative           | and the general public                                 |  |  |  |  |
| Class "D"<br>CMHs*                | 14     | 50 & below        |                    |  |  |  |  |  |
| Military Hospital                 | 1      | 1000              | Primarily curative | Pakistan Army, their dependents and the general public |  |  |  |  |

Note: \*CMH = Combined Military Hospital

Source: Centcom information portal. Extranet Surgeon General. CRMS 2007 Post Conference. Link:

http://www2.centcom.mil/sites/sg/CRMS%202007%20Post%20Conference/Presentation%20Day%20

2/1%20Pakistan

%20Army%20Medical%20Corps.ppt#317,6,Organization of the Medical

Services Accessed on 14 March 2009

Primary Health Care Centres consist of ...

#### Medical Battalion

They collect, treat and evacuate casualties from Regimental Aid Post (RAP) to Advance Dressing Stations (ADS) / Forward Treatment Centre (FTC) for provision of essential lifesaving surgical and dental treatment.

#### Field Medical Units

These units include Medical Inspections Rooms / Medical Reception Centres & Garrison Medical Centres. These units are responsible for:

- Medical support to deployed elements of formations
- Preventive health measures in formations
- Medical support for all training activities
- Participation in collective training exercises
- Unit level training cycles
- National commitments including vaccination campaigns and medical relief in aid to disasters / calamities
- International commitments including Hajj and UN missions

Both the Medical Battalion & the Field Medical Units deliver the health services exclusively to the military personnel.

### Secondary Health Care Centres

The secondary health care facilities include the Combined Military Hospitals (CMHs) which are further categorized as Class "A", Class "B", Class "C" as well as Class "D" hospitals depending upon the number of beds and facilities available (Table 4). At Rawalpindi there is also a military hospital (MH).

The CMHs provide health services to all of the Armed Forces, their dependents, retired soldiers, civilians paid from defence estimates and to the non-entitled civilians. The Military Hospital provides services only to the Pakistan Army, their dependents and to the non-entitled civilians.

#### Tertiary Health Care Centres

The tertiary health care is constituted of some state of the art institutes with modern health care facilities which include

- Armed Forces Institute of Cardiology (AFIC)
- Armed Forces Institute of Pathology (AFIP)
- Armed Forces Institute of Transfusion (AFIT)
- Armed Forces Institute of Dentistry (AFID)
- Armed Forces Bone Marrow Transplant Centre (AFBMTC)
- Armed Forces Institute of Urology (AFIU)
- Armed Forces Institute of Rehabilitation Medicine (AFIRM)

The Army Medical Corps also has international commitments, as they participate in the UN medical missions and relief missions to foreign countries.

### Annexure 6: ICHA classification financing sources (FS)

#### FS.1 Public funds

FS.1.1 Territorial government funds

FS.1.1.1 Central government revenue

FS.1.1.2 Regional and municipal government revenue

FS.1.2 other public funds

FS.1.2.1 Return on assets held by a public entity

FS.1.2.2 Other

#### FS.2 Private Funds

FS.2.1 Employer funds

FS.2.2 Household funds

FS.2.3 Non-profit institutions serving individuals

FS.2.4 other private funds

FS.2.4.1 Return on assets held by a private entity

FS.2.4.2 Other

FS.3 Rest of the world funds

#### Annexure 7: ICHA classification financing agents (HF)

#### HF.1 General Government

HF.1.1 Territorial government

HF.1.1.1 Central government

HF.1.1.2 State/provincial government

HF.1.1.3 Local/municipal government

HF.1.2. Social security funds

### HF.2 Private Sector

HF.2.1 Private social insurance

HF.2.2 Other private insurance

HF.2.3 Private Households' out-of-pocket payment

HF.2.4 Non-profit institutions serving households (other than social insurance)

HF.2.5 Private Firms and corporations (other than health insurance)

HF.3 Rest of the world

# Annexure 8: ICHA classification for health care providers (HP)

| HP.1     | Hospitals   |
|----------|---|
| HP.1.1   | General hospitals   |
| HP.1.2   | Mental health and substance abuse hospitals   |
| HP.1.3   | Specialty (other than mental health and substance abuse) hospitals                                  |
| HP.1.4   | Hospitals of non-allopathic systems of medicine (such as Chinese, Ayurveda, etc.)                   |
| HP.2     | Nursing and residential care facilities   |
| HP.2.1   | Nursing care facilities   |
| HP.2.2   | Residential mental retardation, mental health and substance abuse facilities                        |
| HP.2.3   | Community care facilities for the elderly   |
| HP.2.9   | All other residential care facilities   |
| HP.3     | Providers of ambulatory health care   |
| HP.3.1   | Offices of physicians   |
| HP.3.2   | Offices of dentists   |
| HP.3.3   | Offices of other health practitioners   |
| HP.3.4   | Outpatient care centres   |
| HP.3.4.1 | Family planning centres   |
| HP.3.4.2 | Outpatient mental health and substance abuse centres  |
| HP.3.4.3 | Free-standing ambulatory surgery centres  |
| HP.3.4.4 | Dialysis care centres   |
| HP.3.4.5 | All other outpatient multi-specialty and cooperative service centres                                |
| HP.3.4.9 | All other outpatient community and other integrated care centres                                    |
| HP.3.5   | Medical and diagnostic laboratories   |
| HP.3.6   | Providers of home health services   |
| HP.3.9   | Other providers of ambulatory health care   |
| HP.3.9.1 | Ambulance services  |
| HP.3.9.2 | Blood and organ banks   |
| HP.3.9.3 | Alternative or traditional practitioners  |
| HP.3.9.9 | All other ambulatory health services  |
| HP.4     | Retail sale and other providers of medical goods  |
| HP.4.1   | Dispensing chemists   |
| HP.4.2   | Retail sale and other suppliers of optical glasses and other vision products                        |
| HP.4.3   | Retail sale and other suppliers of hearing aids   |
| HP.4.4   | Retail sale and other suppliers of medical appliances (other than optical glasses and hearing aids) |
| HP.4.9   | All other miscellaneous sale and other suppliers of pharmaceuticals and medical goods               |
| HP.5     | Provision and administration of public health programmes  |
| HP.5.1   | National Program for Family Planning and Primary Health Care  |
| HP.5.2   | Expanded Program of Immunization (EPI), Control of Diarrheal Disease                                |
| HP.5.3   | Enhance HIV / AIDS Control Program  |
| HP.5.4   | Improvement of Nutrition Through PHC Islamabad  |

| HP.5.5  | Roll Back Malaria Islamabad  |
|---------|--|
| HP.5.6  | National TB Control Program  |
| HP.5.7  | Prime Minister's Program for Prevention and Control of Hepatitis NIH Islamabad |
| HP.5.8  | National Program for Prevention and Control of Blindness NIH Islamabad         |
| HP.5.9  | National MNCH Program NIH Islamabad  |
| HP.5.10 | National Program for Prevention and Control of Avian Pandemic Influenza NIH    |
| HP.6    | General health administration and insurance                                    |
| HP.6.1  | Government administration of health  |
| HP.6.2  | Social security funds  |
| HP.6.3  | Other social insurance   |
| HP.6.4  | Other (private) insurance  |
| HP.6.9  | All other providers of health administration                                   |
| HP.7    | All other industries (rest of the economy)                                     |
| HP.7.1  | Establishments as providers of occupational health services                    |
| HP.7.2  | Private households as providers of home care                                   |
| HP.7.3  | All other industries as secondary producers of health care                     |
| HP.8    | Institutions providing health-related services                                 |
| HP.8.1  | Research institutions  |
| HP 8.2  | Education and training institutions  |
| HP.8.3  | Other institutions providing health-related services                           |
| HP.9    | Rest of the world  |
| HP.nsk  | Provider not specified by kind   |
|         |  |

### Annexure 9: ICHA classification for health care functions (HC)

- HC.1 Services of curative care
- HC.1.1 Inpatient curative care
- HC.1.2 Day cases of curative care
- HC.1.3 Outpatient curative care
- HC.1.3.1 Basic medical and diagnostic services
- HC.1.3.2 Outpatient dental care
- HC.1.3.3 All other specialized medical services
- HC.1.3.4 All other outpatient curative care
- HC.1.4 Services of curative home care
- HC.2 Services of rehabilitative care
- HC.2.1 Inpatient rehabilitative care
- HC.2.2 Day cases of rehabilitative care
- HC.2.3 Outpatient rehabilitative care
- HC.2.4 Services of rehabilitative home care
- HC.3 Services of long-term nursing care
- HC.3.1 Inpatient long-term nursing care
- HC.3.2 Day cases of long-term nursing care

- HC.3.3 Long-term nursing care: home care
- HC.4 Ancillary services to medical care
- HC.4.1 Clinical laboratory
- HC.4.2 Diagnostic imaging
- HC.4.3 Patient transport and emergency rescue
- HC.4.9 All other miscellaneous ancillary services
- HC.5 Medical goods dispensed to outpatients
- HC.5.1 Pharmaceuticals and other medical nondurables
- HC.5.1.1 Prescribed medicines
- HC.5.1.2 Over-the-counter medicines
- HC 5.1.3 Other medical nondurables
- HC.5.2 Therapeutic appliances and other medical durables
- HC.5.2.1 Glasses and other vision products
- HC.5.2.2 Orthopedic appliances and other prosthetics
- HC.5.2.3 Hearing aids
- HC.5.2.4 Medico-technical devices, including wheelchairs
- HC.5.2.9 All other miscellaneous medical goods
- HC.6 Prevention and public health services
- HC.6.1 Maternal and child health; family planning and counseling
- HC.6.2 School health services
- HC.6.3 Prevention of communicable diseases
- HC.6.4 Prevention of no communicable diseases
- HC.6.5 Occupational health care
- HC.6.9 All other miscellaneous public health services
- HC.7 Health administration and health insurance
- HC.7.1 General Government administration of health
- HC.7.1.1 General Government administration of health (except social security)
- HC.7.1.2 Administration, operation and support of social security funds
- HC.7.2 Health administration and health insurance: private
- HC.7.2.1 Health administration and health insurance: social insurance
- HC.7.2.2 Health administration and health insurance: other private
- HC.nsk HC expenditure not specified by kind
- HC.R.1-5 Health-related functions
- HC.R.1 Capital formation for health care provider institutions
- HC.R.2 Education and training of health personnel
- HC.R.3 Research and development in health
- HC.R.4 Food, hygiene and drinking-water control
- HC.R.5 Environmental health
- HC.nsR HC.R expenditure not specified by kind

## Annexure 10: Functional Classification (by PIFRA)

|    | Major<br>Function                       |                        | Minor Function                                |                   | Detailed Function                           |  | Sub-Detail Function   |   |
|----|---|------------------------|---|-------------------|---|--|---|---|
| No | Descrip-<br>tion                        | No.                    | Description                                   | No.               | Description                                 | No.                                      | Description   |   |
|    |   | 071                    | Medical Prod-<br>ucts, Appliances             | 0711              | Medical Products, Appliances and Equipment  | 071101                                   | Medical Products, Appliances and Equipment                    |   |
|    |   |                        | and Equipment                                 |                   |   | 071102                                   | Drug Control  |   |
|    |   |                        |   | 0721              | General Medical Services                    | 072101                                   | General Medical Services                                      |   |
|    |   | 072                    | Outpatients Services                          | 0722              | Specialized Medical<br>Services             | 072201                                   | Specialized Medical Services                                  |   |
|    |   |                        |   | 0723              | Dental Services                             | 072301                                   | Dental Services   |   |
|    |   |                        |   | 0724              | Paramedical Services                        | 072401                                   | Paramedical Services  |   |
|    |   |                        |   | 0731              | General Hospital Services                   | 073101                                   | General Hospital Services                                     |   |
|    |   | 072                    | Haspital Carriage                             | 0732              | Special Hospital Services                   | 073201                                   | Special Hospital Services (mental hospital)                   |   |
|    |   | 073                    | 073   | Hospital Services | 0733  | Medical and Maternity<br>Centre Services | 073301  | Mother and Child Health   |
|    |   |                        |   | 0734              | Nursing and Convales-<br>cent Home Services | 073401                                   | Nursing and Convalescent<br>Home Services                     |   |
|    |   |                        |   |                   |   | 074101                                   | Anti-malaria  |   |
| 07 | Health                                  | Public Health Services |   |                   | 741 Public Health Services                  | 074102                                   | Nutrition and other hygiene programs                          |   |
|    |   |                        |   |                   |   | 074103                                   | Anti-tuberculosis   |   |
|    |   |                        |   |                   |   | 074104                                   | Chemical Examiner and laboratories                            |   |
|    |   |                        |   | 0741              |   | 074105                                   | EPI (Expanded Program of Immunization)                        |   |
|    |   |                        | Service                                       | Services          | 0741  | T ubile Fleath Services                  | 074106  | Preparation and dissemina-<br>tion of Information on Public<br>Health matters |
|    |   |                        |   |                   |   |  | 074107  | *Population Welfare Meas-<br>ures   |
|    |   |                        |   |                   |   | 074120                                   | Others (other health facilities and preventive measures)      |   |
|    |   |                        |   |                   |   | 075101                                   | R & D of Unani Medicines                                      |   |
|    |   | 075                    | 075 R&D Health                                | 0751              | R & D Health                                | 075102                                   | Specific Health Research<br>Projects                          |   |
|    |   |                        |   |                   |   | 076101                                   | Administration  |   |
|    |   | 076                    | Health Admini-<br>stration                    | 0761              | Administration                              | 093102                                   | Professional / technical universities / colleges / institutes |   |
| 09 | Educa-<br>tion<br>Affairs &<br>Services | 093                    | Tertiary educa-<br>tion affairs &<br>services | 0931              | Tertiary education affairs & services       |  |   |   |

| No. | Object<br>Classification        | Sub classification  | Sub detailed Class.  |
|-----|---------------------------------|---|--|
| A04 | Employees<br>Retirement Benefit |   |  |
|     |                                 | A041-06 Reimbursement of Medical Charges to Pensioners  A041-11 Traveling Allowance for Retired Government Servants in connection with journey on Medical Grounds |  |
| A01 | Employee<br>Related Expenses    | A012- Allowances  |  |
|     |                                 |   | A012-1 – Regular Allowance A01217 – Medical Allowance A01252 – Non Practicing Allowance A01254 – Anaesthesia Allowance |
|     |                                 |   | A012-2 Other Allowance (excluding T.A) A012-74– Medical Charges  |

Annexure 11: Purchases of pharmaceuticals in million Rs

|                               | Total           | Retail sales<br>/purchases | Doctor's<br>purchases | Private hospital pharmacy |  |  |  |  |  |
|-------------------------------|-----------------|----------------------------|-----------------------|---------------------------|--|--|--|--|--|
| July 2008 to June 2009        |                 |                            |                       |                           |  |  |  |  |  |
| Total                         | 107,372         | 96,396                     | 6,772                 | 4,204                     |  |  |  |  |  |
| A - ALIMENTARY T.& METABOLISM | 22,994          | 21,069                     | 1,131                 | 794                       |  |  |  |  |  |
| B - BLOOD + B.FORMING ORGANS  | 3,305           | 2,940                      | 203                   | 162                       |  |  |  |  |  |
| C - CARDIOVASCULAR SYSTEM     | 7,594           | 7,211                      | 190                   | 193                       |  |  |  |  |  |
| D - DERMATOLOGICALS           | 3,688           | 3,397                      | 202                   | 89                        |  |  |  |  |  |
| G - G.U.SYSTEM & SEX HORMONES | 3,286           | 2,954                      | 187                   | 145                       |  |  |  |  |  |
| H - SYSTEMIC HORMONES         | 1,110           | 960                        | 91                    | 59                        |  |  |  |  |  |
| J - SYSTEMIC ANTI-INFECTIVES  | 28,554          | 24,406                     | 2,703                 | 1,444                     |  |  |  |  |  |
| K - HOSPITAL SOLUTIONS        | 579             | 517                        | 25                    | 37                        |  |  |  |  |  |
| L- ANTINEOPLAST +IMMUNOMODUL  | 2,561           | 2,052                      | 303                   | 205                       |  |  |  |  |  |
| M - MUSCULO-SKELETAL SYSTEM   | 7,595           | 6,917                      | 393                   | 286                       |  |  |  |  |  |
| N - NERVOUS SYSTEM            | 10,400          | 9,567                      | 495                   | 338                       |  |  |  |  |  |
| P - PARASITOLOGY              | 3,303           | 3,041                      | 192                   | 69                        |  |  |  |  |  |
| R - RESPIRATORY SYSTEM        | 8,157           | 7,663                      | 308                   | 185                       |  |  |  |  |  |
| S - SENSORY ORGANS            | 2,096           | 1,699                      | 286                   | 112                       |  |  |  |  |  |
| T - DIAGNOSTIC AGENTS         | 63              | 35                         | 8                     | 20                        |  |  |  |  |  |
| V - VARIOUS                   | 2,085           | 1,968                      | 53                    | 64                        |  |  |  |  |  |
|                               | July 2006 to Jւ | ıne 2007                   |                       |                           |  |  |  |  |  |
| Total                         | 81,878          | 73,508                     | 5,164                 | 3,206                     |  |  |  |  |  |
| A - ALIMENTARY T.& METABOLISM | 17,535          | 16,066                     | 862                   | 606                       |  |  |  |  |  |
| B - BLOOD + B.FORMING ORGANS  | 2,520           | 2,242                      | 155                   | 124                       |  |  |  |  |  |
| C - CARDIOVASCULAR SYSTEM     | 5,791           | 5,499                      | 145                   | 147                       |  |  |  |  |  |
| D - DERMATOLOGICALS           | 2,812           | 2,590                      | 154                   | 68                        |  |  |  |  |  |
| G - G.U.SYSTEM & SEX HORMONES | 2,506           | 2,253                      | 143                   | 110                       |  |  |  |  |  |
| H - SYSTEMIC HORMONES         | 846             | 732                        | 70                    | 45                        |  |  |  |  |  |
| J - SYSTEMIC ANTI-INFECTIVES  | 21,774          | 18,611                     | 2,061                 | 1,101                     |  |  |  |  |  |
| K - HOSPITAL SOLUTIONS        | 442             | 394                        | 19                    | 28                        |  |  |  |  |  |
| L- ANTINEOPLAST +IMMUNOMODUL  | 1,953           | 1,565                      | 231                   | 157                       |  |  |  |  |  |
| M - MUSCULO-SKELETAL SYSTEM   | 5,792           | 5,275                      | 300                   | 218                       |  |  |  |  |  |
| N - NERVOUS SYSTEM            | 7,931           | 7,295                      | 378                   | 258                       |  |  |  |  |  |
| P - PARASITOLOGY              | 2,519           | 2,319                      | 147                   | 53                        |  |  |  |  |  |
| R - RESPIRATORY SYSTEM        | 6,220           | 5,844                      | 235                   | 141                       |  |  |  |  |  |
| S - SENSORY ORGANS            | 1,599           | 1,296                      | 218                   | 85                        |  |  |  |  |  |
| T - DIAGNOSTIC AGENTS         | 48              | 27                         | 6                     | 15                        |  |  |  |  |  |
| V - VARIOUS                   | 1,590           | 1,501                      | 40                    | 49                        |  |  |  |  |  |

|                               | Total  | Retail sales<br>/purchases | Doctor's<br>purchases | Private hospital pharmacy |  |  |  |
|-------------------------------|--------|----------------------------|-----------------------|---------------------------|--|--|--|
| July 2005 to June 2006        |        |                            |                       |                           |  |  |  |
| Total                         | 72,782 | 65,342                     | 4,590                 | 2,849                     |  |  |  |
| A - ALIMENTARY T.& METABOLISM | 15,587 | 14,282                     | 766                   | 539                       |  |  |  |
| B - BLOOD + B.FORMING ORGANS  | 2,240  | 1,993                      | 138                   | 110                       |  |  |  |
| C - CARDIOVASCULAR SYSTEM     | 5,148  | 4,888                      | 129                   | 131                       |  |  |  |
| D - DERMATOLOGICALS           | 2,500  | 2,303                      | 137                   | 60                        |  |  |  |
| G - G.U.SYSTEM & SEX HORMONES | 2,228  | 2,002                      | 127                   | 98                        |  |  |  |
| H - SYSTEMIC HORMONES         | 752    | 651                        | 62                    | 40                        |  |  |  |
| J - SYSTEMIC ANTI-INFECTIVES  | 19,355 | 16,544                     | 1,832                 | 979                       |  |  |  |
| K - HOSPITAL SOLUTIONS        | 393    | 350                        | 17                    | 25                        |  |  |  |
| L- ANTINEOPLAST +IMMUNOMODUL  | 1,736  | 1,391                      | 206                   | 139                       |  |  |  |
| M - MUSCULO-SKELETAL SYSTEM   | 5,149  | 4,689                      | 266                   | 194                       |  |  |  |
| N - NERVOUS SYSTEM            | 7,050  | 6,485                      | 336                   | 229                       |  |  |  |
| P - PARASITOLOGY              | 2,239  | 2,061                      | 130                   | 47                        |  |  |  |
| R - RESPIRATORY SYSTEM        | 5,529  | 5,195                      | 209                   | 126                       |  |  |  |
| S - SENSORY ORGANS            | 1,421  | 1,152                      | 194                   | 76                        |  |  |  |
| T - DIAGNOSTIC AGENTS         | 43     | 24                         | 5                     | 14                        |  |  |  |
| V - VARIOUS                   | 1,414  | 1,334                      | 36                    | 44                        |  |  |  |

### **Annexure 12: Questionnaire of Census of Big Hospitals**



#### Government of Pakistan Statistics Division Federal Bureau of Statistics



### Census on Private Hospitals 2010-11

Including private and NGO/NPO hospitals

Excluding general government (federal, provincial and district),
military, cantonment board and social security hospitals

Note: Information required in this Form is obligatory under Genaral Statistics Act 1975. The collected information will be kept strictly confidential & used in aggregates for statistical purpose only.

| Identification  |
|---|
| Processing code   |
|   |
|   |
| 1 Date of the enumeration D D M M Y Y Y Y   |
| 2 Name of hospital:   |
| 3 Address of hospital:  |
| 50 O  |
|   |
| 4 Phone number:   |
| 5 Fax number:   |
| 6 E-Mail:   |
| 7 Name of respondent:   |
| 8 Designation of respondent in hospital:  |
| 9 Did you at any point provide inpatient services during the fiscal period 2007-2010? |
| Yes If <u>yes</u> , when did you start services? Year                                 |
| No 2 If <u>no</u> , skip the rest of the questionnaire and return it back.            |
| Hospital / Establishment ownership  |
| 10 Type of ownership NGO / NPO specify,   |
| Private ownership Individual proprietorship 2   |
| Private Limited Company   |
| Partnership4  |
| Trust   |
| Other, specify  |
| 10 10 10 10 10 10 10 10 10 10 10 10 10 1  |
| 11 During the last 12 months, how many months was this establishment operating?       |

|                       | Number of I  | Employees by type                  |                     |            |
|-----------------------|--|------------------------------------|---------------------|------------|
|                       | carrier Management                                   | Regular                            | Visiting Consulta   | ints       |
| 12 General practition |  | a                                  | b                   |            |
| 13 Specialist doctor  |  | a                                  | ь                   |            |
| 14 Paramedical sta    | off *  | а                                  | b                   |            |
| 15 Others             |  | a                                  | b                   |            |
| 16 Total              |  | a                                  | ь                   |            |
|                       | Numbe  | r of Patients 2009-1<br>Admissions | Outpatients visit   | s          |
| 17 Last month:        | Total  | a                                  | ь                   |            |
| 18                    | Male   | a                                  | b                   |            |
|                       | Female   |                                    |                     |            |
| 19                    | \$5486.00  | a                                  | b                   |            |
| 20 In 2009-10:        | Total  | a                                  | ь                   |            |
| 21                    | Male   | a                                  | b                   |            |
| 22                    | Female   | а                                  | b                   |            |
|                       | Nu   | mber of Facilities                 |                     |            |
| SECURIO MEZON         |  | Last month                         | 2007-08             | 2009-10    |
| 23 Number of Beds     | ***  | а                                  | b                   | С          |
| 24 Operating theatr   | res  | a                                  | b                   | c          |
| 25 Blood banks        |  | a                                  | ь                   | С          |
| 26 Ambulances         |  | a                                  | b                   | с          |
| 27 X-ray machines     |  | a                                  | b                   | С          |
| 28 Radiation therap   | ру   | a                                  | b                   | С          |
| 29 CT scanners        |  | a                                  | ь                   | c          |
| 30 MRI scanners       |  | a                                  | ь                   | c          |
| 31 Other Facilities   |  |                                    |                     |            |
| 31 Other Facilities   | 129 10000  | a                                  | b                   | С          |
|                       | Income/  | Receipts in full Ru<br>Last month  | pees<br>2007-       | 08 2009-10 |
| 32 Consultation and   | d medical charges                                    | a                                  | ь                   |            |
| 33 Consultation fee   | es only  | a                                  | ь                   |            |
| 34 Sale of medicine   | 10   | a                                  | ь                   |            |
| 35 Amount of admir    | ssion fees   | a                                  | ь                   |            |
| 36 Inpatient charge   | CARGOSTALINE   | a                                  | b                   |            |
|                       |  |                                    |                     | 3 ===      |
| 37 Operation charg    |  | a                                  | b                   |            |
| 38 Laboratory exan    | s (e.g. X-ray, MRI, CT-                              | a                                  | b[                  | c          |
| scan, Ultrasound      | d etc.)  | a                                  | b                   | <u> </u>   |
| 40 Sale of non-med    | picine products                                      | a                                  | b                   | c          |
|                       | ude nursing staff, operation                         |                                    | boratory staff etc. |            |
|                       | f days of bed occupancy<br>ays stayed per patient in |                                    |                     |            |
|                       | ancy days Last month                                 | 3                                  |                     |            |
|                       | 2009-10  |                                    |                     |            |

<sup>\*\*\*</sup> The Inpatient charges include room charges, bed charges, Medical officer visit charges, nursing charges etc.

| 41 Others (To specify see codes at last page | e of this questionnaire) |         |         |
|--|--------------------------|---------|---------|
| Code:  | a                        | b       | с       |
|  | a                        | b       | С       |
|  | а                        | b       | с       |
| 42 Total Income/Receipts (Q-32 to 41)        | а                        | b       | с       |
| Percentage on total Income/Receipts:         | Last month               | 2007-08 | 2009-10 |
| 43 Inpatient (%)                             | а                        | b       | С       |
| 44 Outpatient (%)                            | а                        | b       | с       |
| Inputs / Expe                                | nses incurred in full l  | Rupees  |         |
| A) General expenditures                      | Last month               | 2007-08 | 2009-10 |
| 45 Electricity                               | а                        | b       | С       |
| 48 Gas                                       | а                        | b       | с       |
| 47 Water                                     | а                        | ь       | С       |
| 48 Petrol, Diesel, Kerosene etc.             | а                        | ь       | С       |
| 49 Repair and Maintainence                   | а                        | b       | с       |
| 50 Administration                            | а                        | ь       | с       |
| 51 Others, specify:                          | а                        | b       | с       |
| 52 Total                                     | a                        | b       | с       |
| B) Medical expenditures                      | Last month               | 2007-08 | 2009-10 |
| 53 Cost of medicine purchased                | а                        | b       | с       |
| 54 All other Medical Supplies *              | a                        | b       | С       |
| 55 Garment and clothing accessories          | а                        | ь       | с       |
| 56 Others, specify:                          | а                        | b       | с       |
| 57 Total                                     | a                        | ь       | с       |
| C) Employment cost                           | Last month               | 2007-08 | 2009-10 |
| 58 Total                                     | a                        | ь       | с       |
| 59 General practitioner doctors              | а                        | b       | с       |
| 60 Specialist doctors                        | a                        | ь       | С       |
| 61 Paramedical staff                         | а                        | b       | С       |
| 62 Payments to others for work done          | а                        | b       | c       |
| 63 Others                                    | a                        | b       | c       |

<sup>\* &</sup>quot;All other Medical Supplies" include all supplies other than medicines, like chemical element (such as oxygen, iodine, etc.), Inorganic chemical products (such as hydrogen peroxide, teeth filling etc.), Non-medicaments (such as bandages, plasters, gloves, test sticks, blood bags etc), Medical Instruments (such as surgical instruments, syringes, BP- Apparatus, Ottoscope etc.), Orthopaedic Appliances (such as Artificial limbs, teeth etc.), Cardiac Appliances (such as stents, cardiac valves, etc) etc.

| D) Taxes / Fees                                     | Last month | 2007-08 | 2009-10 |
|---|------------|---------|---------|
| 64 Sales taxes paid (net, subtracting<br>Subsidies) | а          | b       |         |
| 65 Provincial/district taxes                        | а          | b       | С       |
| 66 Other taxes, please specify:                     | а          | ь       | c       |
| E) Investments                                      | Last month | 2007-08 | 2009-10 |
| 67 Capital expenditure (buildings,                  | a          | ь       | c       |
| software and equipment) *                           | 3          | 8       |         |
| 68 Research and development                         | а          | b       | С       |
| 69 Depreciation                                     | а          | ь       |         |
| F) Payment of Loans to Financial Institution        | ns         | 79      |         |
| 70  | а          | ь       | С       |
| 71 Total Expenditure (A+B+C+D+E+F)                  | а          | ь       | _ c     |

#### Codes for question 41

- 1 Government assistance/funds
- 2 Private donations (national)
- 3 International donations (current funding)
- 4 International donations (capital funding)
- 5 Receipts from management
- 6 Receipts from sales of waste material and scrap products
- 7 Receipt from transport services rendered to others
- 8 Subsidies received
- 9 Receipt from sale of used / 2nd hand goods
- 10 Other Income (Please specify)

| Name of the Regional/Field Office: | 8          |     |
|------------------------------------|------------|-----|
| Name of Enumerator:                | Signature: | 177 |
| Name of Supervisor:                | Signature: |     |

<sup>\*</sup> The capital expenditure does not include the sales tax paid, the sales tax should be mentioned separately in question 64

## **Annexure 13: Questionnaire of Survey of Health Care Providers**



#### Government of Pakistan Statistics Division Federal Bureau of Statistics



### Survey on Health Care Providers 2010-11

Including private and NGO/NPO hospitals

Excluding general government (federal, provincial and district),
military, cantonment board and social security hospitals

Note: Information required in this Form is obligatory under General Statistics Act 1975. The collected information will be kept strictly confidential & used in aggregates for statistical purpose only.

| and, Go to No 2 If no, Go to   |  |          |            |                 |         |           |           |                  |
|--|--|----------|------------|-----------------|---------|-----------|-----------|------------------|
| 2 Name of Facility:  3 Address of Facility:  4 Phone number:  5 Fax number:  6 E-Mail:  7 Name of respondent:  8 Designation of respondent in Facility in Section 1 If yes, when do and, Go to No 2 If no.  Go to  |  |          |            |                 |         |           |           |                  |
| 2 Name of Facility:  3 Address of Facility:  4 Phone number:  5 Fax number:  6 E-Mail:  7 Name of respondent:  8 Designation of respondent in Facility in Section 1 of Section 2 of Section 2 of Section 3 of Section |  |          |            |                 |         |           |           |                  |
| 2 Name of Facility:  3 Address of Facility:  4 Phone number:  5 Fax number:  6 E-Mail:  7 Name of respondent:  8 Designation of respondent in Facility in Section 1 If yes, when do and, Go to No 2 If no.  Go to  |  |          |            |                 |         |           |           |                  |
| 3 Address of Facility:  4 Phone number:  5 Fax number:  6 E-Mail:  7 Name of respondent:  8 Designation of respondent in Face  9 Did you at any point provide inpat  Yes   | 11   |          |            |                 |         |           |           |                  |
| 4 Phone number:  5 Fax number:  6 E-Mail:  7 Name of respondent:  8 Designation of respondent in Fac  9 Did you at any point provide inpat  Yes  | 11   |          |            |                 |         |           |           |                  |
| 5 Fax number: 6 E-Mail: 7 Name of respondent: 8 Designation of respondent in Fac 9 Did you at any point provide inpat Yes I If yes, when and, Go to No 2 If no. Go to  | 11   |          |            |                 |         |           |           |                  |
| 5 Fax number: 6 E-Mail: 7 Name of respondent: 8 Designation of respondent in Fac 9 Did you at any point provide inpat Yes  | 11   |          |            |                 |         |           |           |                  |
| 6 E-Mail:  7 Name of respondent:  8 Designation of respondent in Fac  9 Did you at any point provide inpat  Yes  | 11   |          |            |                 |         |           |           |                  |
| 7 Name of respondent:  8 Designation of respondent in Fac  9 Did you at any point provide inpat  Yes   | 11   |          |            |                 |         |           |           |                  |
| 8 Designation of respondent in Fac 9 Did you at any point provide inpat Yes  |  |          |            |                 |         |           |           |                  |
| 9 Did you at any point provide inpat Yes I If <u>yes</u> , when of and, Go to No 2 If <u>no</u> . Go to  | lity:  |          |            |                 |         |           |           |                  |
| Yes If <u>yes</u> , when of and, Go to No 2 If <u>no.</u>  | 35 9 <del>5</del>  |          |            |                 |         |           |           |                  |
| Go to  | ient services" duri<br>id you start servic<br>Section 1 (Q10 to  | es?      | al period  | 2009-20<br>Year |         |           |           |                  |
|  |  |          |            |                 |         |           | . Action  |                  |
| 30.10  | Section 2 (Q35 to<br>Section 3 (Q45 to   |          | 80-076-163 |                 |         |           |           | netic Caminae    |
|  |  | Section  |            | provide         | Laborat | ory tests | and Diagn | iostic del vides |
|  | The same of the sa |          |            |                 |         |           |           |                  |
|  | Hospital / E   | stablish | ment o     | wnersh          | nip     |           |           |                  |
| 10 Type of ownership NGO   | NPO  | 88.      | 10         | spec            | ify     | 339       |           | 102              |
| Private  | ownership  | In       | dividual p | roprietor       | ship    | E         | 2         |                  |
|  |  | P        | ivate Lim  | ited Com        | pany    |           | 3         |                  |
|  |  | P        | artnership |                 |         |           | 4         |                  |
|  |  | Tr       | ust        |                 |         | Ē         | 5         |                  |
|  |  | 0        | ther, spe  | cify            |         | . [       | 6         |                  |
| 11 During the fiscal period 2009-10,   | how many months  | was thir | stablishe  | ment once       | rating? | 56 SA     | 7.02      | T                |

<sup>\*</sup>In-patient care refers to care for a patient who is formally admitted (or 'hospitalized') to an institution for treatment and/or care and stays for a minimum of one night in the hospital or other institution providing in-patient care

| Number o   | f Employees by type 2009  | 9-10                 |
|--|---|----------------------|
|  | Regular   | Visiting Consultants |
| 12 General practitioner doctors  | а   | b                    |
| 13 Specialist doctors  | a   | ь                    |
| 14 Paramedical staff *   | а   | ь                    |
| 15 Others  | а   | ь                    |
| 16 Total   | а   | b                    |
| Numb   | per of Patients 2009-10 **  |                      |
|  | Last month  | 2009-10              |
| 17 Admissions Total  | a   | ь                    |
| 18 Outpatients visits Total  | а   | b                    |
|  | Number of Beds  |                      |
| Fall red ribble to the rest of the   | Last month  | 2009-10              |
| 19 Number of Beds  | a   | b                    |
| Incom  | e/Receipts in full Rupees<br>Last month   | 2009-10              |
| 20 Consultation fees only  | a   | b 5                  |
| 21 Amount of admission fees  | а   |                      |
|  |   |                      |
| 22 Inpatient Charges ***   | a   | b                    |
| 23 Operation charges   | а   | b                    |
| 24 Others, Specify   | а   | b                    |
| 25 Total Income/Receipts   | a   | b                    |
| Percentage on total Income/Receipts:   | Last month  | 2009-10              |
| 26 Inpatient (%)   | а   | ь                    |
| 27 Outpatient (%)  | а   | b                    |
| Inputs / Ex  | penses incurred in full Ru  | ipees                |
|  | Last month  | 2009-10              |
| 28 Utility Charges, Repair & Maintainence  | a   | ь                    |
| 29 Cost of medicine and All Medical Supplies <sup>†</sup>  | а   | b                    |
| 30 Employment cost/Salaries  | а   | ь                    |
| 31 Taxes/Fees(Sales taxes paid (net, subtracting   | а   | ь                    |
| Subsidies) Provincial/district taxes, Others)  | 20  | 1                    |
| 32 Capital expenditure (buildings, software  | а   |                      |
| and equipment) ++ 33 Others, specify:  | a   | Ъ                    |
| 34 Total Expenditure   | a   |                      |
|  |   |                      |
| * Paramedical staff include nursing staff, operation theatre ** In case the number of days of bed occupancy are record Give, average no. of days stayed per patient in the hospit  | ed  |                      |
| Total No. of bed occupancy days  |   | _                    |
| 2009-10  | or Madical officer visit shows  | surries sharper at-  |
| *** The Inpatient charges include room charges, bed charg<br>*All Medical Supplies* include all supplies other than medical.   |   | nursing charges etc. |
| (such as oxygen, iodine, etc.), Inorganic oberrical products<br>Non-medicaments (such as bandages, plasters, gloves, ter<br>(such as surgical instruments, syringes, BP- Apparatus, Ot<br>(such as Artificial limbs, teeth etc.), Cardiac Appliances (su | (such as hydrogen peroxide, tee<br>st sticks, blood bags etc), Medica<br>oscope etc.), Orthopaedic Applia | ances                |

HThe capital expenditure does not include the sales tax paid, the sales tax should be mentioned separately in question 31

99

### Section 2

| 35 Type of Health Care Provider             |  |  |
|---|--|--|
|   | Individually run Solo Clinic*<br>Run by Registered | d Medical Practitioner (RMP)             |
|   | Run by Specialists<br>Run by paramedic             |  |
|   | Run by others, Sp                                  |  |
|   | Outpatient Centre**                                | s  |
|   | Dental Clinic***                                   |  |
|   | Homeopath Clinic                                   | 7  |
|   | Hakeem/Herbalist Clinic <sup>†</sup>               | 5  |
|   | Traditional Birth Attendent/Dai                    | p  |
|   | Other, Specify                                     | 10                                       |
| 36 Average Number of Patients per day       |  |  |
| 37 Number of Employees                      | Last month   | 2009-10                                  |
|   | a  | Ь  |
|   | Income/Receipts in full Rupees                     |  |
|   | Last month   | 2009-10                                  |
| 38 Consultation fees                        | a  | b  |
| 39 Sale of medicines                        | a  | b  |
| 40 Laboratory examination fees              | а  | b  |
| 41 Others, Specify                          | а  | b  |
| 42 Total Income/Receipts                    | a  | b  |
| In case, the provider does not keep monthly | yearly accounts and does not have disaggre         | gated revenue data, they should be asked |
| 43 Charge/Price per Patient                 |  |  |
| 44 Number of working days in a week         |  |  |
|   | Section 3  |  |
|   | Last month   | 2009-10                                  |
| 45 Revenue from Laboratory Tests            | а  | ь  |
| 46 Revenue from Imaging services            | а  | b  |
| 47 Others, Specify                          | a  | ь  |
| 48 Total Revenue                            | а  | ь  |

<sup>&</sup>quot;These are the individually run (run by one person) Allopathic clinics. Registered Medical Practitioners are the doctors with Basic Medical Education i.e. MBBS (Bachelors in Medicine & Surgery) and are registered with Pakistan Medical & Dental Council (PMDC). Specialists doctors have in addition to the basic medical qualification, a post graduation in some Speciality like Ear Nose & Throat (ENT) Specialists, Medical Specialists, Surgical Specialists etc. Paramedical/Nursing category include the persons who have got formal nursing training but they are not doctors.

<sup>\*\*</sup> These are the establishments engaged in providing Allopathic outpatient services by a team of doctors, paramedical and support staff, usually bringing together several specialities

<sup>\*\*\*</sup> These are the clinics who provide services related to the diagnosis, prevention, and treatment of diseases of the teeth, gums, and related structures of the mouth

<sup>&</sup>lt;sup>+</sup> The Hakeems run clinics which provide remedies based on knowledge (Hikmat) which has foundations in the religion Islam. The Herbalist are the practioners who prescribe Herbal remedies for medical conditions.

| Name of the Regional/Field Office: |            |       |
|------------------------------------|------------|-------|
| Name of Enumerator:                | Signature: |       |
| Name of Supervisor:                | Signature: | - 55. |

### Annexure 14: Questionnaire of Census of Autonomous Bodies / Corporations

Government of Pakistan
Statistics Division
Federal Bureau of Statistics
(National Accounts)
National Health Accounts Section,
SLIC -5, 14th Floor, F-6/4 Blue Area Islamabad

### **Census of Autonomous/ Corporations (Health Care Expenditures)**

### Q. 1: General Information of Organization

| 1   | Name                               |        |         |                 |       |       |
|-----|------------------------------------|--------|---------|-----------------|-------|-------|
| 1.2 | Address                            |        |         |                 |       |       |
| 1.3 | Phone number                       |        |         |                 |       |       |
| 1.4 | Fax number                         |        |         |                 |       |       |
| 1.5 | E-mail address                     |        |         |                 |       |       |
|     |                                    | Gender | Regular | Adhoc/Temporary | Other | Total |
| 1.6 | Number of employees                | Male   | _       |                 |       |       |
| 1.0 | Number of employees                | Female |         |                 |       |       |
| 1.7 | Economic activity (Please mention) |        |         |                 |       |       |
|     | PSIC Code (for official use only)  |        |         |                 |       |       |

### Q. 2: How Organization provides Health Care services to its employees?

| 2.1 | Through own Health facilities? If yes, please | Number of Hospitals | Number of Dispe     | nsaries |
|-----|---|---------------------|---------------------|---------|
| 2.1 | specify                                       | Other (Discosife)   |                     |         |
|     |   | (Please Specify) L  |                     |         |
|     | Through the Re-                               | Actual Reimburs     | ement of medical ch | arges   |
| 2.2 | imbursement of Medical                        | (Amo                | ount in 000 Rs)     |         |
| 2.2 | charges bills? If yes, then                   | 2005/06             | 2006/07             | 2007/08 |
|     | please provide data on                        |                     |                     |         |
|     | the actual reimbursement                      |                     |                     |         |
|     | of Medical charges.                           |                     |                     |         |
|     | Through Health insur-                         | Hea                 | Ith Insurance       |         |
| 2.3 | ance to employees?                            | al Premiums         |                     |         |
|     | If yes, then please pro-                      | 2005/06             | 2006/07             | 2007/08 |
|     | vide data on the total                        |                     |                     |         |
|     | premiums.                                     |                     |                     |         |

## Annexure 15: Questionnaire of OOP Survey 2009-10

| Household number (12 digits): Enumerators na  |   |   |  |    |  |    |  |  |                                 |  |   | name: Name of Regional /field office:  |                     |   |      |                    |                                  |       |                                   |
|---|---|---|--|----|--|----|--|--|---------------------------------|--|---|--|---------------------|---|------|--------------------|----------------------------------|-------|-----------------------------------|
| Section Out of Pocket Health Expenditures (OOP) - Recall period is last 4 weeks of enumeration date, in Rs.   |   |   |  |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
| HE01 HE02   |   |   |  |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
| Was a Health Care Facility accessed by any household Yes No Member in the last 4 weeks?  If no, only indicate self-medication.  |   |   |  |    |  |    |  |  |                                 | If yes, how many visits were done<br>by all household members? |   |  |                     | One row per person per illness!   |      |                    |                                  |       |                                   |
| HE03  | HE04  | HE05                                    | HE                                     | 06 | HE0  | )7 | HE08   | HE09   | HE10                            | HE11   | HE12  | HE13   | HE14                | HE15  | HE16 | HE17               | HE18                             | HE19  | HE20                              |
| Personal<br>ID<br>(see<br>PSLM)   | Type of care<br>accessed<br>(see code<br>below) * | Type of<br>Provider (see<br>code below) | Kind of illness<br>(see code<br>below) |    | Reason of visits unrelated to illness (see |    | Total<br>expendi-<br>ture  | Transpor-<br>tation costs  | Parchi and<br>Admission<br>Fees | Medicines /<br>Vaccine   | Supplies /<br>Medical<br>Durables   | Food   | Diagnostic<br>tests | Doctor's fee  | Tips | Cost of<br>Surgery | Accom-<br>panying<br>Person Cost | Other | Total<br>expenditure<br>corrected |
|   |   |   |  | _  |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
|   |   |   |  |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
|   |   |   |  |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
|   |   |   | Ш                                      |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
|   |   |   |  |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
|   |   |   |  |    |  |    |  |  |                                 |  |   |  |                     |   |      |                    |                                  |       |                                   |
| 2 Inpatient       1 Private hospital       8 Gc         3 Delivery       2 Private doctor clinic       9 Dis         4 Unrelated to illness       3 LHV / nurse in private sector       10 B         5 Self medication       4 LHW       11 R         * If code 4 selected then 5 Homeopath / Hakeem / Herbalist / Saina / Dai       12 TI Skip HE06         6 Pharmacy / Shops       13 To Shops         7 Other, Specify       14 M         15 S       16 A |   |   |  |    |  |    | 9 Dispensa<br>10 BHU<br>11 RHC<br>12 THQ / D<br>13 Tertiary,<br>14 Military I<br>15 Social S | ent hospital ry/Maternal ar HQ teaching or s Hospital iecurity Hospi nous bodies/C |                                 | th Center  | Illness codes HE06:  1 Accident 2 Injury 3 Poisoning including snake bites 4 Diarrheal disorder (including dysentery) 5 Fever (clinical malaria) 6 Chest infection 7 Measles, Polio (Immunizable diseases) 8 Hepatitis infections 9 Woman's issue 10 Eye infection/disorder |  |                     | Reason codes HE07:  1 Looking for advice on health 2 Looking advice on family planning issues 3 Routine medical check-up 4 To buy medicine or contraceptives 5 Anti-natal check-up 6 Immunization / vaccination 7 Rehabilitative care 8 Don't know 9 Other, Specify |      |                    |                                  |       |                                   |
|   |   |   |  |    |  |    |  |  | ow<br>specify                   |  |   | 11 High blood pressure 12 Diabetes 13 Heart disease 14 Stroke 15 Dental Care 16 Don't know 17 Other, Specify |                     |   |      |                    |                                  |       | 1                                 |

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