المملكة الاردنية الهاشمية

Hashemite Kingdom of Jordan

المجلس الصحي العالي – الأمانة العامة

High Health Council

General Secretariat

الحسابات الصحية الوطنية في الاردن 2013

التقرير الفني السادس

Jordan National Health Accounts 2013

Technical Report No. 6

April 2016

His Majesty King Abdullah II Ibn Al –Hussein

His Royal Highness Crown Prince Al-Hussein Bin Abdullah II

تقديم

يسعدوني أن أقدم لكم التقرير الفني السادس للحسابات الصحية الوطنية للسنة المالية 2013 و الذي تم إنجازه في الامانة العامة للمجلس الصحي العالي بفضل الجهود الكبيرة و المخلصة التي بذلها الفريق الوطني للحسابات الصحية الوطنية .

تعتبر الحسابات الصحية الوطنية اداة هامة لرسم السياسة الصحية للقطاع الصحي وهي توفر المؤشرات المتعلقة بالإنفاق الصحي في الاردن على مستوى الاقتصاد الكلي مما يساعد واضعي السياسات الصحية و متخذي القرار و المخططين الصحيين في الحصول على المعلومات المستندة إلى الدلائل والبراهين بهدف وضع السياسات الصحية الكفيلة بتحسين وتعزيز أداء النظام الصحي من خلال تطوير أنظمة التمويل الصحي وإتباع آليات من شأنها تعظيم الاستفادة من النفقات الصحية الوطنية و ضبط النفقات و ترشيدها مما ينعكس إيجاباً على تحسين الخدمات الصحية المقدمة للمواطن .

وانطلاقا من دور المجلس الصحي العالي في رسم السياسة الصحية العامة في المملكة و تحسين أداء النظام الصحي الاردني ، فقد تم العمل على مأسسة الحسابات الصحية الوطنية وإصدار التقارير الفنية السنوية في الأمانة العامة للمجلس و سوف تستمر الأمانة العامة للمجلس الصحي العالي من خلال الفريق الوطني للحسابات بإصدار هذا التقرير بشكل سنوي وفق المنهجية العالمية المعتمدة من قبل منظمة الصحة العالمية ، و سيواصل فريق الحسابات الصحية الوطنية جهوده لإصدار التقرير السابع و الذي سيغطي عامي 2014 و 2015 .

وفي الختام ادعو الله عز وجل أن يوفقنا في خدمة بلدنا العزيز في ظل الراية الهاشمية بقيادة جلالة الملك المفدى عبدالله الثاني أبن الحسين المعظم حفظة الله و رعاة.

و السلام عليكم و رحمة الله و بركاته ،،،،

أمين عام المجلي الصحي العالي
رئيس الفريق الوطني للحسابات الصحية
الدكتور هاني "أمين بروسك" الكردي

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Abstract

National Health Accounts (NHA) is a basic tool for health policy development and health sector management. NHA describes how much a country spends on health, and maps out in detail the sources and uses of health care expenditures. This second technical report presents the results of the NHA 2008 for the Hashemite Kingdom of Jordan, which was completed through a collaborative effort of the High Health Council General Secretariat, Ministry of Health, Ministry of Finance, Ministry of Planning and International Collaboration, Ministry of Social Development, Royal Medical Services, Jordan University Hospital, King Abdullah University Hospital, Food and Drug Administration, Joint Procurement Department, Department of Statistics, and Private Hospitals Association.

Institutionalizing and hosting of National Health Accounts was decided by the High Health Council in the early 2007 and this report represents the fifth NHA round executed by the newly established national team.

In 2013, Jordan spent approximately JD 1.881 billion (US$ 2.7 billion) on health, or JD 231.8 (US$ 327.4) per capita. Total health expenditures represented (7.89) percent of GDP. The public sector is the largest source of health funding (61.47 percent) followed by the private sector (34.78 percent) and donors (3.75 percent). The main policy issues emerging from the NHA results are the high level of total health expenditures as a percentage of GDP and its implications for the ability to provide health care services at current level of quality and quantity; the high level of pharmaceutical expenditures (26.6) percent of total health expenditures); the indiscriminate capital investment in the private sector and little regulation that has resulted in a surge of private hospitals; and the high level of spending on curative care in the public sector (75.45) percent as compared to primary care (15.69) percent.

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Acronyms

ALOS	Average Length of Stay
CHCC	Comprehensive Health Care Centers
CIP	Civil Insurance Program
DOS	Department of Statistics
GDP	Gross Domestic Product
GNP	Gross National Product
GOJ	Government of Jordan
HH	Households
HHC	High health Council
HID	Health Insurance Directorate
HIPS	Health Insurance in the Private Sector Survey
ICHA	International Classification of Health Accounts
JD	Jordanian Dinar
JHUES	Jordan Health Utilization and Expenditures Survey
JUH	Jordan University Hospital
JFDA	Jordan Food and Drug Administration
JPD	Joint Procurement Department
KAUH	King Abdullah University Hospital
MENA	Middle East and North Africa
MIP	Military Insurance Program
MOF	Ministry of Finance
MOH	Ministry of Health
MOPIC	Ministry of Planning and International Corporation
MOSD	Ministry of Social Development
NGOs	Nongovernmental Organizations
PHA	Private Hospital Association
NHA	National Health Accounts
NHS	National Health Strategy
OOP	Out Of Pocket
PHR	Partnerships for Health Reform
PHR *plus*	Partners for Health Reform plus
RMS	Royal Medical Services
SHA	System for Health Accounts
SSC	Social Security Corporation
TFR	Total Fertility Rate
TPA	Third Party Administrator
UNRWA	United Nations Relief Works Agency
USAID	United States Agency for International Development
UHs	University Hospitals
VHC	Village Health Center
WHO / EMRO	World Health Organization / Eastern Mediterranean Regional Office
WB	World Bank

Acknowledgments

The National Health Accounts (NHA) 2013 study is made possible by the advice and support of the Chairman of the High Health Council / H.E. the Minister of Health Dr. Ali Hyasat. In addition, we would like to thank, WHO in Jordan for supporting and sustaining NHA activity in Jordan.

We thank all the institutions involved directly or in supporting NHA team efforts to produce this technical report on Jordan's NHA 2013 (Sixth Round) which was hosted and prepared at the HHC and achieved by the national Jordanian health accounts team.

Executive Summary

Socio-economic Background

The Hashemite Kingdom of Jordan is an middle-income country, with a population of 8.1 million in 2013. In the same year, its gross domestic product (GDP) amounted to JD (23.9) billion or around US$ (32.3) billion and per capita GDP was JD (2939.6)or 4152 US$ (Department of Statistics, DOS). Jordan has a small economy with limited natural resources, arid land mostly unsuitable for agriculture, and chronic water shortages; it imports most of the energy it consumes.

Based on the commonly used developmental indicators, Jordan fares better than most countries in the low middle-income category. The majority of the populace has access to basic infrastructure like safe water, sanitation, and electricity and lives in permanent dwelling structures. Government commitments to improve the overall quality of life and the social standards of its people was stated clearly in Jordan's Vision 2025. Primary and secondary education for girls and boys alike has been made a priority.

As a result of declining mortality rate and high total fertility rate, the overall population growth rate dropped to 2.2 percent (DOS 2012) and it has been 3.3 percent per year between 1992 and 1998 (Macro International,1997). Rapid population growth implies an increase in demand for social programs, such as, education and health. A change in the population make-up further highlights the need for a health policy that will have to account for growing demand for health care for the elderly as well as maternal and child health care services.

Health Sector Issues

Given the anticipated population growth in Jordan over the next decade, its changing epidemiological profile, and modest economic growth rates, sustaining the level of health care expenditures presented in this document will represent a significant challenge to policymakers. The implementation of an effective cost containment strategy will be necessary to curb the rising cost of health care services in the country. Moreover, anecdotal evidence suggests that a significant amount of inefficiencies in the provision and financing of health care services exists; hence, strategies such as engaging in contracts with private sector providers, for resources such as hospital beds, should be seriously considered – particularly in light of the significant levels of excess capacity that exist within such institutions. In addition, despite the heavily subsidized services offered by the public sector, it is estimated that around 32 percent of the Jordanian population remains uninsured.

Jordan has made significant gains in the institutionalization of NHA at the HHC. There has been greater cooperation among public and private sector agencies with respect to the sharing of essential data, and the NHA information in finding a broader audience outside of the public sector. However, many obstacles remain: the data must have greater auditing controls and the methodology employed by various sectors to pool data needs to be more uniform, thereby, leading to enhanced comparability across agencies.

As indicated in Table 1, the total expenditure on health care in Jordan amounts to JD 1.881 billion (US 2.7 billion) and the per capita expenditures to JD 231.8 (US$ 327.4). The total expenditure on health is 7.89 percent of the GDP and is considered high for a middle-income country. This level of expenditure is more in line with countries of the Organization for Economic Cooperation and Development (OECD). The proportion of government budget allocated to health sector is almost 11 percent. Public sources account for 61.47 percent and private sources for 34.78 percent of health care financing. International donors account for the remaining 3.75 percent. In terms of expenditures, the public sector accounts for 65.75 percent, private sector accounts for 31.57 percent, NGO for 1.93 percent, and UNRWA clinics for 0.74 percent.

Expenditures on pharmaceuticals are very high and reached 500 million JD and accounts for 2.10 percent of GDP, and 26.6 percent of the total health expenditures. In Table (2) we observe that curative care accounts for 75.45% percent of public expenditures and primary care for only 15.69% percent.

Table 1 : Jordan National Health Accounts Main Indicators 2013

Main Indicators	2013
Total Population	8,114,000
Total Health Care Expenditures (JD)	1,880,953,104
Per Capita Health Care Expenditures (JD)	231.8
Gross Domestic Product (GDP) (JD)	23,851,600,000
Gross National Product (GNP) (JD)	23,611,200,000
Per Capita GDP (JD)	2939.6
Health Care Expenditures As Percent Of GDP	7.89%
Health Care Expenditures As Percent Of GNP	7.97%
Percent Of Government of Jordan Budget Allocated To Health	11%
Sources Of Health Care Financing (Percent Distribution) . Public . Private . Donors	 61.47% 34.78% 3.75%
Distribution Of Health Expenditure . Public . Private . UNRWA . NGOs	 65.75% 31.57% 0.74% 1.93%
Public Health Expenditure As Percent Of GDP	5.18%
Private Health Expenditure As Percent Of GDP	2.70%
Total Expenditure on Pharmaceuticals (JD)	500,330,700
Per Capita Pharmaceutical Expenditure (JD)	61.66
Pharmaceutical Expenditure As Percent of GDP	2.10%
Pharmaceutical Expenditure As Percent of Total Health Expenditure . Public . Private	26.60% 12.17% 14.43%
Distribution Of Pharmaceutical Expenditure as percentage of Total Pharmaceutical Expenditure . Public . Private	 45.77% 54.23%

Note : Numbers may not add up to 100% due to rounding

Table 2 : Distribution Of Public Expenditure By Function 2013 (JD)

Function	MOH / CIP		RMS / MIP		UHs				Total	
					JUH		KAUH			
	Amount	%	Amount	%	Amount	%	Amount	%	Amount	%
Curative	523,783,664	77.24%	175,952,875	64.19%	62,922,979	91.92%	44,269,887	90.71%	806,929,405	75.45%
Primary	113,674,650	16.76%	54,139,347	19.75%	0	0.00%	0	0.00%	167,813,997	15.69%
Administration	21,851,108	3.22%	40,604,510	14.81%	44,671	0.07%	1,004,441	2.06%	63,504,730	5.94%
Training	10,926,911	1.61%	3,000,000	1.09%	17,590	0.03%	1,904,158	3.90%	15,848,659	1.48%
Other	7,861,185	1.16%	395,000	0.14%	5,471,564	7.99%	1,624,144	3.33%	15,351,893	1.44%
Total	678,097,518	100.00%	274,091,732	100.00%	68,456,804	100.00%	48,802,630	100.00%	1,069,448,684	100.00%

1.Introduction

Jordan's health system is consisted of several highly fragmented private and public programs. Two major public programs that finance as well as deliver care are the Ministry of Health (MOH) and Royal Medical Services (RMS). Other smaller public programs include several university-based programs, such as the Jordan University, and Jordan University of Science and Technology. In addition, several non-governmental organizations (NGOs) and donor owned and operated facilities exist, largest being United Nations Relief Works Agency (UNRWA) which provides care mostly to Palestinian refugees.

At present, a limited amount of reliable data exists on utilization rates, insurance coverage, and expenditures on health care services. Health planners are unable to evaluate actual needs of the population, or to assess in any systematic way the performance of the health system. Pluralism of the health care system exacerbates the difficulty in data collection and assessment. Many individuals and their dependents are enrolled in more than one insurance program. As a result of multiple coverage, it is difficult to plan, monitor, and control expenditure, as well as ascertain the exact number of insured and uninsured. To overcome the paucity of essential planning data, the HHC, MOH and all NHA partners with World Health Organization (WHO) support he National Health Accounts (NHA) activity in Jordan and its institutionalization at the HHC General Secretariat.

NHA is designed to give a comprehensive description of resource flows in a health care system, showing where resources come from, and how they are used. Although previous health care expenditure studies have been carried out in Jordan, none has used the integrated framework of NHA to organize and compile data.

According to current NHA estimate, in 2013 Jordan spent on the health sector approximately JD 1.881 billion (US$ 2.656 billion) comparing to JD 1.665 billion (US$ 2.352 billion) in 2012, which accounted for 7.89 percent of the GDP in 2013 and 7.58 percent in 2012. Health expenditure per capita in 2012 was JD 260.6 (US$ 368) comparing to JD 231.8 (US$ 327.4) in 2013, this level of expenditure might be difficult to sustain.

The NHA 2013 results show that almost 34.78 percent of the total funds originate from private sources, where as 61.47 percent is apportioned public funds, and the remaining 3.75 percent is contributed by international donors. The private sources comprise premiums paid by people for private commercial insurance, expenditures incurred by self-insured companies that directly pay for health care services for their employees, and out-of-pocket OOP expenditure for health care and for drugs at pharmacies. The public sources comprise mainly tax revenue allocations by Ministry of Finance (MOF) to the MOH, RMS, King Abdullah University Hospital (KAH), and Jordanian University Hospital (JUH).

A breakdown of public health expenditures by function indicates that almost 75.45 percent is spent on curative services, 15.69 percent on preventive measures, 5.94 percent on administrative

activities, 1.48 percent on training, and 1.44 percent on miscellaneous activities. Even as the financing in the entire health sector is highly fragmented, within the public and private sector it is highly centralized and controlled leaving little room for flexibility and maneuverability at the facility level.

The expenditure on drugs at JD 500 million is higher than most countries in Jordan's income group. It accounted for approximately 26.60 percent of the total expenditure on health care services, and 2.10 percent of the GDP in 2013 compared to 2.03 percent of the GDP in 2012.

2. NHA Methodology:

The phase of data collection for this 2013 NHA round was started on December 2014. The National Health Accounts team was established and hosted by HHC in Jordan. As was done with the earlier 2012 NHA round, the team members spent roughly sixteen months defining , agreeing upon data definitions, rules of classification, and uniform data auditing requirements. Relying heavily upon the past experience of the previous NHA rounds.

The 2013 data collection efforts were enhanced significantly, due to the following changes:

- Expansion of the NHA Team: membership was expanded to include representatives from HHC, MOH, MOF, MOPIC, MOSD, RMS, JUH, JPD,KAUH, DOS, JFDA, GBD, and PHA.
- Establishment of a Centralized Data Collection Unit: an active NHA Unit had been established in the HHC. Having such a location allowed for easier exchange of information, and provided team members a centralized place for data auditing work;
- Official HHC Executive-level Participation: to encourage the participation of all relevant agencies from which data were to be obtained, the HHC general secretariat issued a request to more than 50 public and private sector agencies, requesting their participation in the 2012 data gathering efforts. As an official GOJ request, the letter legitimized the NHA data collection efforts; hence, team members were faced with some obstacles during the data gathering period.

The NHA team was able to gather significant data from public, donor, and NGO entities, in addition to universities. In contrast, data collection from the private sector posed a challenge. Team members were able to obtain utilization information, and some incomplete expenditure data from various sources; however, detailed expenditure information from private hospitals in particular was often lacking. For each estimate placed in the NHA matrices, every effort was made to validate each number, especially through triangulation when possible. The data collection and processing, report writing, and the interpretation of findings for policy purposes lasted around eleven months.

Moreover, by 2000, International Classification for Health Accounts (ICHA) had been developed by the Organization for Economic Cooperation and Development. The ICHA provides a comprehensive structure for classifying NHA information. This ICHA has made data compilation between agencies, within country, and among countries more comparable.

Two major contributions of the ICHA were the definitions utilized for organizing and categorizing recurrent and capital expenditures. Organizing expenditures into these categories, and reaching agreement from various agencies on what constituted each of them, represented a significant point

The ICHA classifies each as follows:

- **Recurrent expenditures:** Recurrent expenditures consist of items such as salaries (including other benefits), drugs, supplies, treatment, training cost, and equipment maintenance;

- **Capital expenditures:** Capital expenditures are those on medical and non-medical equipment, as well as construction. They include expenditures that record the value of non-financial assets that have been purchased, disposed of, or have changed in value during the period under study, such as land holdings and structure.

Data Collection Strategy

The Jordanian health care sector is an amalgam of public and private sector providers and financing agents. The predominate source of public sector financing emanates from the general revenues of the (MOF, earmarked for the MOH, RMS, KAUH, and JUH. The MOH and RMS serve as both financers and providers of health care services in the Kingdom. The predominate form of private sector financing of health care services emanates from private households. Therefore, the data required for completion of this report were obtained from a complex array of public and private sector agencies, including households. Below is a summary of data sources, both secondary and primary; all data sources mentioned were reviewed and audited according to NHA team member rules and definitions:

- Ministry of Finance (MOF): Information on MOF funds earmarked for various public agencies was obtained from the MOH Annual Statistical Reports, Central Bank of Jordan (annual and monthly reports) and MOF budget department reports.
- Ministry of Health (MOH): Information on MOH expenditures was obtained from the MOH annual reports, the MOH Budget Department (monthly statement of accounts, and annual statement of accounts).
- Ministry of Social Development (MOSD): Information on the MOSD health care expenditures was obtained from the MOH Health Insurance Directorate accounts, as well as the MOSD Budget Department (monthly and annual statement of accounts).
- Royal Medical Services (RMS): Information on RMS expenditures was obtained from the RMS Finance and Accounting Department and MOF budget department reports.

3. Overview of NHA Results

This chapter discusses estimates made by the 2012 and the 2013 NHA studies. As Table (3) shows, Jordan's total Health care expenditure were approximately JD 1.665 billion in 2012, this amounted to 7.58 percent of GDP. Health care expenditures per capita was JD 260.6 .Total Health care expenditure was approximately JD 1.881 billion in 2013, this amounted to 7.89 percent of GDP. Health care expenditures per capita has dropped to JD 231.8 due to the increased number of refugees in Jordan.

Table (3): Summary NHA Indicators, Jordan, 2012 and 2013

Main Indicators	2012	2013
Total Population	6,388,000	**8,114,000**
Total Health Care Expenditures (JD)	1,665,014,650	1,880,953,104
Per Capita Health Care Expenditures (JD)	260.6	**231.8**
Gross Domestic Product (GDP) (JD)	21,965,500,000	23,851,600,000
Gross National Product (GNP) (JD)	21,749,300,000	23,611,200,000
Per Capita GDP (JD)	3438.6	**2939.6**
Health Care Expenditures As Percent Of GDP	7.58%	7.89%
Health Care Expenditures As Percent Of GNP	7.66%	7.97%
Percent Of Government of Jordan Budget Allocated To Health	10.5 %	11%
Sources Of Health Care Financing (Percent Distribution) . Public . Private . Donors	 61.93% 35.13% 2.94%	 61.47% 34.78% 3.75%
Distribution Of Health Expenditure . Public . Private . UNRWA . NGOs	 66.17% 31.88% 0.75% 1.20%	 65.75% 31.57% 0.74% 1.93%
Public Health Expenditure As Percent Of GDP	5.02%	5.18%
Private Health Expenditure As Percent Of GDP	2.56%	2.70%
Total Expenditure on Pharmaceuticals (JD)	445,408,952	500,330,700
Per Capita Pharmaceutical Expenditure (JD)	69.73	**61.66**
Pharmaceutical Expenditure As Percent of GDP	2.03%	2.10%
Pharmaceutical Expenditure As Percent of Total Health Expenditure . Public . Private	26.75% 12.17% 14.58%	26.60% 12.17% 14.43%
Distribution Of Pharmaceutical Expenditure as percentage of Total Pharmaceutical Expenditure . Public . Private	 45.49% 54.51%	 45.77% 54.23%

Note : Numbers may not add up to 100% due to rounding

Approximately 34.78 percent 2013 of the total funds circulating within the system originated from private sources. The public sector's share amounted to 61.47 percent and 3.75 percent originated from donors.

Private sources of financing consist of the following:

- Premiums paid by households for public and private health insurance;
- Health care expenditures incurred by self-insured firms, on behalf of their employees;
- Private companies' expenditures for commercial health insurance;
- Households' out-of-pocket expenditure for health care services and pharmaceuticals.

Public sources consisted of general tax revenues allocated by Ministry of Finance to:

- The Ministry of Health;
- The Royal Medical Services;
- The Jordanian University Hospital;
- The King Abdullah Hospital;
- Other public sector entities such as the Royal Court.

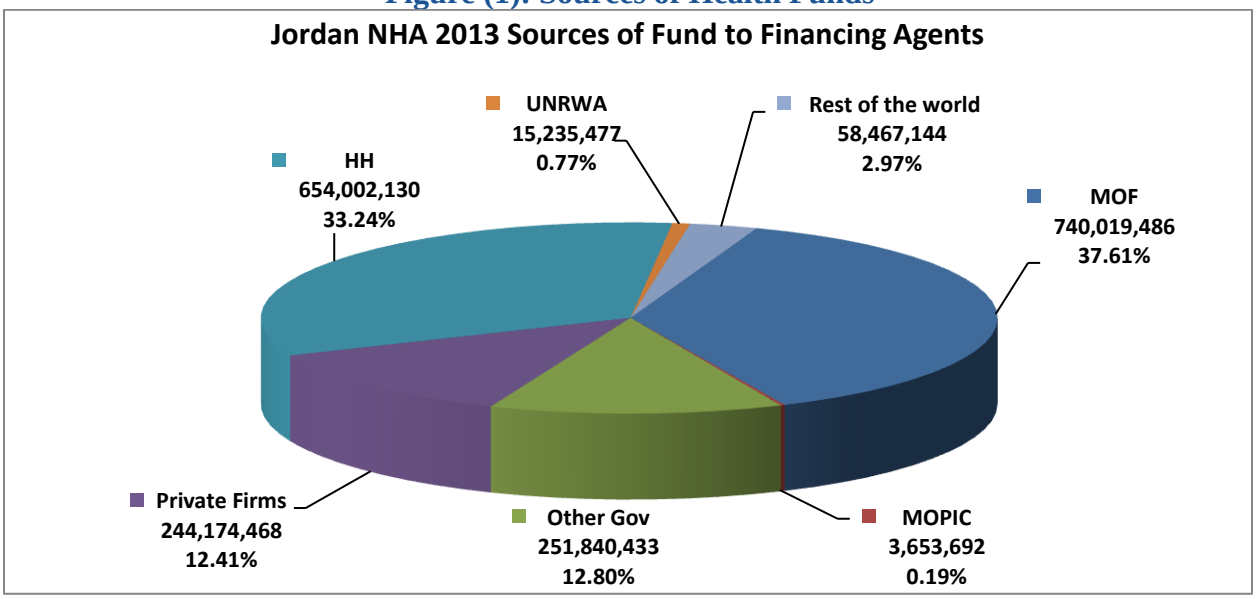
A breakdown of public health expenditures by function for 2013 revealed that significant amounts of public sector expenditures, roughly JD 806.9 million (75.45 percent), are earmarked for the provision of curative care services. Only JD 167.8 million (15.69 percent) of these expenditures were for the provision of primary care services. Other expenditure items were JD 63.5 million (5.94 percent) for administration , JD 15.8 million (1.48 percent) for training personnel, and JD 15.3 million (1.44 percent) for miscellaneous expenditure items.

Jordanian Health Care Dinar: Where it comes from and where it goes

NHA tracks the flow of health funds in a two-step process. First, funds are assumed to flow from financing sources (FS) to financing agents (FA); and secondly, from FA to providers (P). Figure (1) identifies the main sources of health care funds in 2012.

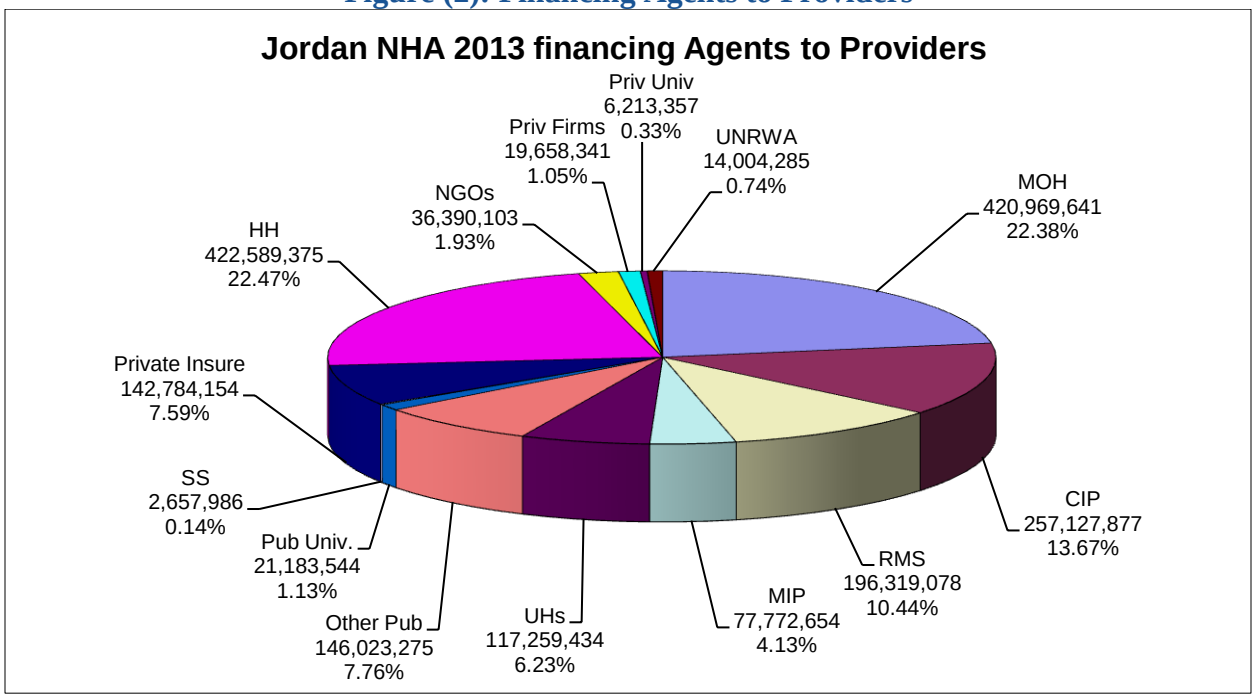
As indicated in Figure (1) the two major sources of health care funds in 2013 the MOF (37.61 percent) and households (33.24 percent) compared to (38.17 percent and 33.34 percent)in 2012 respectively

Figure (1): Sources of Health Funds



As shown in Figure (2) in 2013, public facilities (MOH including CIP, RMS including MIP, UHs, other public entities, and public universities) received 65.75% percent of health care funds, while private facilities received 31.57 percent. UNRWA received 0.74 percent, and 1.93 percent were earmarked for NGO facilities. Among public facilities, MOH including CIP funded the largest share, 36.05 percent, followed by the RMS including MIP with 14.57 percent, and the JUH and KAUH with 6.23 percent.

Figure (2): Financing Agents to Providers



Pharmaceutical Expenditures

In 2013, pharmaceutical expenditures amounted to JD 500,330,700 which represents 26.60 percent of total health care expenditure and roughly 2.10 percent of GDP compared to 2.03 in 2012 (Table 4). This level is considerably high for a middle income country.

Table (4): Expenditures on Pharmaceuticals

Indicator	2012	2013
• Total Expenditure on Pharmaceuticals (JD)	445,408,952	500,330,700
• Per Capita Pharmaceutical Expenditure (JD)	69.73	61.66
• Pharmaceutical Expenditure As Percent of GDP	2.03%	2.10%
• Pharmaceutical Expenditure As Percent of Total Health Expenditure	26.75%	26.60%
– Public	12.17%	12.17%
– Private	14.58%	14.43%
• Distribution Of Pharmaceutical Expenditure as percentage of Total Pharmaceutical Expenditure		
– Public	45.49%	45.77%
– Private	54.51%	54.23%

The high level of expenditures on pharmaceuticals is primarily the result of private sector behavior. This includes, but is not limited to the following:

Provider prescribing behavior: the prescribing behavior of physicians and pharmacists is the primary reason for the high level of drug consumption in Jordan. This is due partly to the lack of sufficient pharmaceutical regulatory policies. In addition, providers in Jordan have vastly different medical training backgrounds, and thus different prescribing behaviors. Hence, changing the prescribing behaviors of providers is a necessary condition for achieving overall cost containment objectives.

Consumer behavior: the health seeking behavior of consumers (patients), particularly with respect to the practice self-medication, is a major reason for inefficient consumption of pharmaceuticals. Pharmacists tend to dispense the most expensive drugs to consumers who do not have prescriptions. Hence, the behavior and expectations of consumers must be changed significantly in order to achieve overall reductions in pharmaceutical expenditures in Jordan;

Pharmaceutical promotion efforts: the relative influence of pharmaceutical companies in promoting their products is extensive and uncontrolled in Jordan. Most Continuous Medical Education within the private sector is sponsored and/or organized by the pharmaceutical industry.

Cross-Country Comparative Analysis

In terms of GDP and per capita GDP, Jordan is classified as a middle-income country. its GDP is in the middle range of the Middle East/North Africa countries that participate in the regional NHA network. In 2013, Jordan's health care expenditures amounted to 7.89 percent of GDP. This percentage is much higher than those of other MENA counties that are at similar stages of economic development. While it is difficult to make international comparisons of health care expenditures due to variations in national accounting practices as well as in the structure of delivering and financing health care services, this finding for Jordan has been somewhat startling to policymakers. Jordan, with its limited resources, is consuming health care services at levels found typically among developed countries, and when this is considered in terms of population growth rates and the aging population it becomes apparent that such high level of expenditures are not sustainable.

4. Jordan NHA Findings: National Level

Structure of National Health Accounts Results

The Jordan NHA team derived expenditure results using the aforementioned two-step method of interlinked NHA matrices to depict the flow of funds throughout the system.

First, we estimated the flow of health care funds from Financing Sources (public and private sector organizations, including households) to Financing Agents (public and private sector organizations, including households). Tables 5 and 6 present this flow in Jordan, in 2013. The primary source of health care funds is Ministry of Finance. Their contributions amounted to JD (740) million in 2013. The second largest source is the households, in the amounts of JD (654) million in the same year.

Second, we estimated the transfer of health care funds from Financing Agents to Providers. Financing Agents purchase health care services from providers on behalf of their beneficiaries. As Tables 7 and 8 show, the main providers are the Ministry of Health, Royal Medical Services, Jordan University Hospitals (JUH, KAUH), private sector providers, nongovernmental organizations, and the United National Relief Works Agency. A separate line item, Treatment Abroad, measures the amount of expenditures earmarked to overseas providers. The amount of funds paid by households on private facilities was JD (422.5) million. The amount transferred from financing agent to providers are those that MOH pays to operate its hospitals JD (289) million.

Table (5): Financing Sources to Financing Agents 2013, (JD)

	Financing Agents	PRIMARY SOURCES OF FUND (JD)							
		MOF FS.1.1.1	MOPIC FS.1.1.2	Other Gov. Entities FS.1.4	Private Firms FS.2.1	HH FS.2.2	UNRWA FS.3.1	ROW FS.3.2	TOTAL
1	MOH (within budget) HF.1.1.1	399,391,103	3,653,692	622,286	19,409			17,283,151	420,969,641
2	CIP HF.1.1.1.2	127,445,000		19,000,000	266,500	111,599,012	654,974		258,965,486
3	RMS HF.1.1.2.1	188,750,000						7,569,078	196,319,078
4	MIP HF.1.1.2.2			34,457,473	3,671,719	39,643,462			77,772,654
5	UHs HF.1.1.3			88,051,022	3,572,638	18,685,774		6,950,000	117,259,434
6	Other Government Entities HF.1.1.4	24,433,383		96,787,690	20,391,377	7,771,899		274,812	149,659,161
7	Public Universities HF.1.1.5			12,921,962		8,261,582			21,183,544
8	Social Security HF.1.2				83,048,000				83,048,000
9	Private Insurance Enterprises HF.2.2				114,227,322	28,556,831			142,784,153
10	Household HF.2.3					422,589,375			422,589,375
11	NGOs HF.2.4					10,000,000		26,390,103	36,390,103
12	Private Firms HF.2.5				18,977,503	680,838			19,658,341
13	Private Universities HF.2.5.1					6,213,357			6,213,357
14	UNRWA HF.3.1						14,580,503		14,580,503
	TOTAL	740,019,486	3,653,692	251,840,433	244,174,468	654,002,130	15,235,477	58,467,144	1,967,392,830

Table (6): Financing Sources to Financing Agents 2013, (Percentages)

	Financing Agents	PRIMARY SOURCES OF FUND (Percent)							
		MOF FS.1.1.1	MOPIC FS.1.1.2	Other Gov. Entities FS.1.4	Private Firms FS.2.1	HH FS.2.2	UNRWA FS.3.1	ROW FS.3.2	TOTAL
1	MOH (within budget) HF.1.1.1	94.87%	0.87%	0.15%	0.005%	0.00%	0.00%	4.11%	100%
2	CIP HF.1.1.1.2	49.21%	0.00%	7.34%	0.10%	43.09%	0.25%	0.00%	100%
3	RMS HF.1.1.2.1	96.14%	0.00%	0.00%	0.00%	0.00%	0.00%	3.86%	100%
4	MIP HF.1.1.2.2	0.00%	0.00%	44.31%	4.72%	50.97%	0.00%	0.00%	100%
5	UHs HF.1.1.3	0.00%	0.00%	75.09%	3.05%	15.94%	0.00%	5.93%	100%
6	Other Government Entities HF.1.1.4	16.33%	0.00%	64.67%	13.63%	5.19%	0.00%	0.18%	100%
7	Public Universities HF.1.1.5	0.00%	0.00%	61.00%	0.00%	39.00%	0.00%	0.00%	100%
8	Social Security HF.1.2	0.00%	0.00%	0.00%	100.00%	0.00%	0.00%	0.00%	100%
9	Private Insurance Enterprises HF.2.2	0.00%	0.00%	0.00%	80.00%	20.00%	0.00%	0.00%	100%
10	Household HF.2.3	0.00%	0.00%	0.00%	0.00%	100.00%	0.00%	0.00%	100%
11	NGOs HF.2.4	0.00%	0.00%	0.00%	0.00%	27.48%	0.00%	72.52%	100%
12	Private Firms HF.2.5	0.00%	0.00%	0.00%	96.54%	3.46%	0.00%	0.00%	100%
13	Private Universities HF.2.5.1	0.00%	0.00%	0.00%	0.00%	100.00%	0.00%	0.00%	100%
14	UNRWA HF.3.1	0.00%	0.00%	0.00%	0.00%	0.00%	100.00%	0.00%	100%
	TOTAL	**37.61%**	**0.19%**	**12.80%**	**12.41%**	**33.24%**	**0.77%**	**2.97%**	**100%**

Table (7): Financing Agents to Providers 2013 , (JD)

End - Users	Financing Agents														
	MOH HF.1.1.1.1	CIP	RMS HF.1.1.1.2	MIP	UHs HF.1.1.1.3	Other Pub Entities HF.1.1.1.4	Pub Univ. HF.1.1.1.5	SS HF.1.2	Private Insure HF.2.2	HH HF.2.3	NGOs HF.2.4	Private Firms HF.2.5	Private Universities HF.2.5.1	UNRWA HF.3.1	TOTAL
MOH Curative Care HP.1.1.1.1	289,116,957	42,181,450		2,570,632	0	0									333,869,039
MOH Primary Care HP.3.4.9.1	95,151,628	11,553,260		5,998,141	0	0									112,703,029
MOH Administration HP.6.1	18,662,645	3,188,463			0	0									21,851,108
MOH Training & Research HP.8.2	10,926,911	0			0	0									10,926,911
MOH HP.N.S.K	7,111,500	749,685			0	0									7,861,185
MOH Facilities	420,969,641	57,672,858	0	8,568,773	0	0									487,211,272
RMS Curative Care HP.1.1.1.2		50,071,278	125,457,400	46,674,843	0	0									222,203,521
RMS Primary Care HP.3.4.9.2			38,663,816	9,477,390	0	0									48,141,206
RMS Administration HP.6.1			28,997,862	11,606,648	0	0									40,604,510
RMS Training & Research HP.8.2			2,700,000	300,000	0	0									3,000,000
RMS HP.N.S.K			300,000	95,000		0									395,000
RMS Facilities	0	50,071,278	196,119,078	68,153,881	0	0	0								314,344,237
UHs Curative Care HP.1.1.1.3		76,335,764			107,192,866	0	8,748,804								192,277,434
UHs Primary Care Clinic HP.3.4.9.3					0	0									0
UHs Administration HP.6.1					7,095,708	0									7,095,708
UHs Training & Research HP.8.2					1,921,748	0									1,921,748
UHs HP.N.S.K					1,049,112	0									1,049,112
UHs Facilities	0	76,335,764	0	0	117,259,434	0	8,748,804								202,344,002

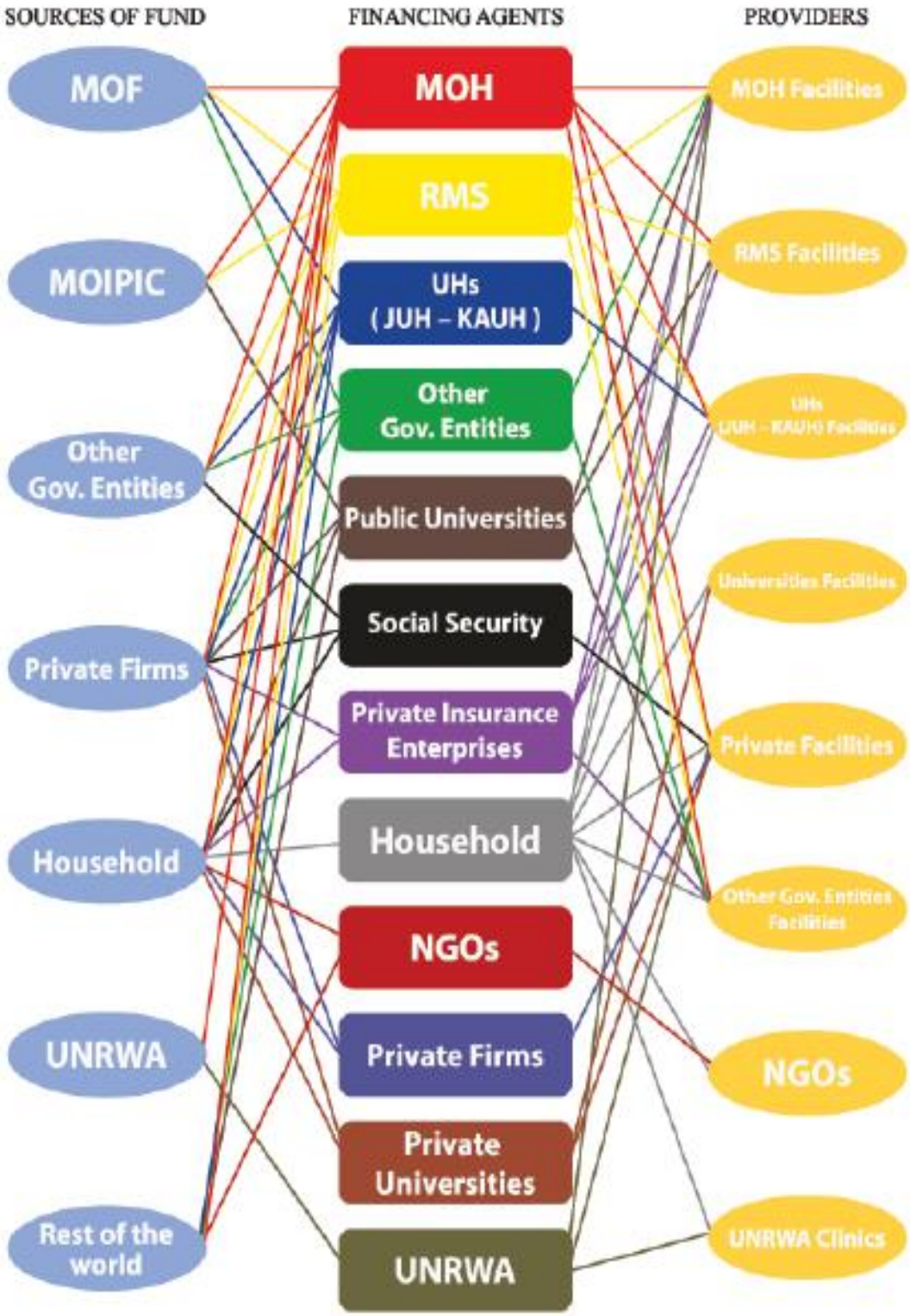
Universities Facilities					**0**	**0**	**423,671**						**1,864,007**		**6,321,173**
Private Curative Care HP.1.1.2		**15,129,943**			**0**	**1,704,889**	**9,680,880**	**1,860,591**	**33,147,511**	**152,132,175**		**7,831,160**	**1,087,337**		**220,087,165**
Other Private Facilities HP.3.1					**0**	**484,375**	**275,386**	**478,437**	**57,282,962**	**122,550,919**		**8,342,475**	**1,957,207**		**191,707,885**
Private Pharmacies HP.4.1					**0**	**1,062,015**	**953,259**	**318,958**	**31,652,081**	**147,906,281**		**3,012,860**	**1,304,806**		**184,327,962**
Private Training & Research HP.8.2					**0**	**0**						**0**			**0**
Private HP.N.S.K					**0**	**0**	**1,101,544**		**20,701,600**			**471,846**			**22,274,990**
Private Facilities	**0**	**15,129,943**	**0**	**0**	**0**	**3,251,279**	**12,011,069**	**2,657,986**	**142,784,154**	**422,589,375**	**0**	**19,658,341**	**4,349,350**	**0**	**618,398,002**
Other Gov. Entities Curative Care HP		**49,973,818**			**0**	**72,104,951**									**122,078,769**
Other Gov. Entities Primary Care HP		**6,969,762**			**0**	**46,055,320**									**53,025,082**
Other Gov. Entities Administration HP					**0**	**17,542,636**									**17,542,636**
Other Gov. Entities T & R HP.					**0**	**2,328,544**									**2,328,544**
Other Gov. Entities HP.N.S.K					**0**	**4,016,810**									**4,016,810**
Other Gov. Entities Facilities	**0**	**56,943,580**				**142,048,261**							**0**		**198,991,841**
NGOs Curative Care HP.1.1.3					**0**	**0**									**0**
NGOs Primary Care HP.3.4.9.4					**0**	**0**					**36,390,103**				**36,390,103**
NGOs facilities	**0**		**0**		**0**	**0**	**0**	**0**	**0**	**0**	**36,390,103**	**0**	**0**	**0**	**36,390,103**
UNRWA					**0**	**0**								**14,004,285**	**14,004,285**
Treatment Abroad HP.9.2		**974,454**	**200,000**	**1,050,000**	**0**	**723,735**									**2,948,189**
TOTAL	**420,969,641**	**257,127,877**	**196,319,078**	**77,772,654**	**117,259,434**	**146,023,275**	**21,183,544**	**2,657,986**	**142,784,154**	**422,589,375**	**36,390,103**	**19,658,341**	**6,213,357**	**14,004,285**	**1,880,953,104**

Table (8): Financing Agents to Providers 2013, (Percentages)

End - Users	Financing Agents													
	MOH HF.1.1.1.1	CIP	RMS HF.1.1.1.2	MIP	UHs HF.1.1.1.3	Other Pub Entities HF.1.1.1.4	Pub Univ. HF.1.1.1.5	SS HF.1.2	Private Insure HF.2.2	HH HF.2.3	NGOs HF.2.4	Private Firms HF.2.5	Private Universities HF.2.5.1	UNRWA HF.3.1
MOH Curative Care HP.1.1.1.1	68.68%	16.40%	0.00%	3.31%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
MOH Primary Care HP.3.4.9.1	22.60%	4.49%	0.00%	7.71%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
MOH Administration HP.6.1	4.43%	1.24%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
MOH Training & Research HP.8.2	2.60%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
MOH HP.N.S.K	1.69%	0.29%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
MOH Facilities	100.00%	22.43%	0.00%	11.02%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
RMS Curative Care HP.1.1.1.2	0.00%	19.47%	63.90%	60.01%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
RMS Primary Care HP.3.4.9.2	0.00%	0.00%	19.69%	12.19%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
RMS Administration HP.6.1	0.00%	0.00%	14.77%	14.92%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
RMS Training & Research HP.8.2	0.00%	0.00%	1.38%	0.39%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
RMS HP.N.S.K	0.00%	0.00%	0.15%	0.12%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
RMS Facilities	0.00%	19.47%	99.90%	87.63%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
UHs Curative Care HP.1.1.1.3	0.00%	29.69%	0.00%	0.00%	91.42%	0.00%	41.30%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
UHs Primary Care Clinic HP.3.4.9.3	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
UHs Administration HP.6.1	0.00%	0.00%	0.00%	0.00%	6.05%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
UHs Training & Research HP.8.2	0.00%	0.00%	0.00%	0.00%	1.64%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
UHs HP.N.S.K	0.00%	0.00%	0.00%	0.00%	0.89%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%

UHs Facilities	**0.00%**	**29.69%**	**0.00%**	**0.00%**	**100.00%**	**0.00%**	**41.30%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Universities Facilities	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**2.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**30.00%**	**0.00%**
Private Curative Care HP.1.1.2	**0.00%**	**5.88%**	**0.00%**	**0.00%**	**0.00%**	**1.17%**	**45.70%**	**70.00%**	**23.22%**	**36.00%**	**0.00%**	**39.84%**	**17.50%**	**0.00%**
Other Private Facilities HP.3.1	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.33%**	**1.30%**	**18.00%**	**40.12%**	**29.00%**	**0.00%**	**42.44%**	**31.50%**	**0.00%**
Private Pharmacies HP.4.1	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.73%**	**4.50%**	**12.00%**	**22.17%**	**35.00%**	**0.00%**	**15.33%**	**21.00%**	**0.00%**
Private Training & Research HP.8.2	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Private HP.N.S.K	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**5.20%**	**0.00%**	**14.50%**	**0.00%**	**0.00%**	**2.40%**	**0.00%**	**0.00%**
Private Facilities	**0.00%**	**5.88%**	**0.00%**	**0.00%**	**0.00%**	**2.23%**	**56.70%**	**100.00%**	**100.00%**	**100.00%**	**0.00%**	**100.00%**	**70.00%**	**0.00%**
Other Gov. Entities Curative Care HP	**0.00%**	**19.44%**	**0.00%**	**0.00%**	**0.00%**	**49.38%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Other Gov. Entities Primary Care HP	**0.00%**	**2.71%**	**0.00%**	**0.00%**	**0.00%**	**31.54%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Other Gov. Entities Administration HP	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**12.01%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Other Gov. Entities T & R HP.	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**1.59%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Other Gov. Entities HP.N.S.K	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**2.75%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
Other Gov. Entities Facilities	**0.00%**	**22.15%**	**0.00%**	**0.00%**	**0.00%**	**97.28%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
NGOs Curative Care HP.1.1.3	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
NGOs Primary Care HP.3.4.9.4	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**100.00%**	**0.00%**	**0.00%**	**0.00%**
NGOs facilities	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**100.00%**	**0.00%**	**0.00%**	**0.00%**
UNRWA	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**100.00%**
Treatment Abroad HP.9.2	**0.00%**	**0.38%**	**0.10%**	**1.35%**	**0.00%**	**0.50%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**	**0.00%**
TOTAL	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**	**100.00%**

Figure (3)
Jordan NHA 2013
Jordanian Health Sector's Flow of Funds



Financing Sources

In Jordan, health care is funded by the following sources: the Government of Jordan (primarily from the Ministries of Finance and Planning, and other governmental entities such as the Ministry of Social Development), households, international donors, and UNRWA. Household contributions are made primarily through premiums paid to health insurance plans and more importantly by out-of-pocket expenditures.

As indicated in Table (9 MOF was the major source of health care funds, accounting for 37.61 percent in 2013. The household was the second largest source, accounting for 33.24 percent. Private firms provided around 12.41 percent, by funding for their employees' health insurance plans through self-insurance or commercial insurers. Self-insured firms are different from commercial insurers, in that they provide direct reimbursement for employees' consumption of health care services from a health insurance fund that is managed by the company and often administered by a Third Party Administrator. Alternatively, companies can also enroll their employees in plans managed by commercial insurers. Donor contributions (Rest of the worlds), without the UNRWA contributions was around 2.97 percent. UNRWA's share amounted to 0.77 percent; other governmental entities supplied 12.80 percent of health care funds in the respective year.

Table (9): Total Amounts Allocated by Original Financing Sources, (JDs)

Entity	MOF	MOPIC	Other Government Entities	Private Firms	Households	UNRWA	Rest of The World	Total
Amount	740,019,486	3,653,692	251,840,433	244,174,468	654,002,130	15,235,477	58,467,144	1,967,392,830
Percent	37.61%	0.19%	12.80%	12.41%	33.24%	0.77%	2.97%	100%

Note : Numbers may not add up to 100% due to rounding

Financing Agents

Financing agents are institutions or entities that receive and channel the funds provided by financing sources and use those funds to pay for or purchase the activities inside the health accounts boundaries (WHO et al. 2003). They consolidate and distribute funds on behalf of their clients. The main Financing Agents in Jordan are:

- MOH: for CIP beneficiaries and other categorical groups;
- RMS: for active and retired military personnel and public security personnel, and their dependents;
- JUH: for its employees and their dependents, as well as students;
- JUST: for its employees and their dependents, as well as students;

- Other public entities, such as the Department of Statistics, the High Health Council, and the National Population Council: primarily for research, policy, and training in the area of health
- Public universities: such as Jordan University of Science and Technology for employees and their dependents, as well as students;
- Social Security Corporation (SSC): for work-related injuries;
- Insurance firms (commercial insurers): for the purchase of services on behalf of their beneficiaries;
- Households: through out-of-pocket expenditures and various user fees at points of service;
- NGOs: for categorical groups of patients, such as the Jordan Association of Family Planning and Protection;
- Private firms and universities: for employees;
- UNRWA: for Palestinian refugees.

Use of Funds

Financing Agents use the funds they receive from Financing Sources to purchase health care from the following public and private sector providers. The following list considers the major Financing Agents and Providers:

- ***MOH to MOH facilities:*** The MOH is both a purchaser and provider of health care services. While the MOH does not allocate individual operating budgets to the hospitals and clinics that it owns, it uses the financing it receives from various sources to centrally budget and manage the delivery of services from its facilities;

- ***RMS to RMS facilities:*** Much like the MOH, the RMS is both a purchaser and provider of services, for RMS beneficiaries and other groups. Also like the MOH, the RMS does so through a centralized budgetary and managerial process;

- ***Private sector purchasers to providers:*** Private sector purchasers include households, firms, universities, and commercial insurers, which purchase services on behalf of their beneficiaries from both public and private sector providers.

5. Jordan's NHA Results: Sub- systems level

5.1 Ministry of Health (MOH)

Organization and Size of the MOH

The Ministry of Health is the largest single institutional financier and provider of health care services in Jordan. In 2013, the MOH budget accounted for 6.7 percent of the general budget. The proportion of general budget funds allocated for the MOH has varied in the past five years. It has ranged from 8 to 6.7 percent since 2009. The MOH in 2013 also is largest in terms of the size of its operation as compared to RMS, JUH, JUST or the private sector. The MOH owns and operates 31 hospitals in governorates, and has the most hospital beds (4618), followed by the private sector (3989) beds and RMS with (2439) beds .

The occupancy rate of MOH hospitals is (63.9) percent in 2013. The average length of stay is 3 days for the same year.

The total number of admissions has increased by approximately 9 percent between the years 2007 - 2013 as shown in Table 10. The death rate has actually increased from 1.6 percent in 2012 to 1.8 percent in 2013.The occupancy rate has decreased slightly from 68.3 percent in 2012 to 68 percent in 2013, whereas the average length of stay has decreased from 3.3 in 2012to 3.2in 2013

Table 10: MOH Hospitals: Utilization and Efficiency Indicators 2007-2013

Item \ Year		2007	2008	2009	2010	2011	2012	2013
Admissions		314554	318032	326730	337708	332607	339628	347929
Discharged	Alive	309330	313219	322008	332276	326917	334017	341744
	Dead	4920	4857	4717	5322	5536	5454	6157
Death Rate %		1.6	1.5	1.4	1.6	1.7	1.6	1.8
Occupancy Rate %		69.0	69.0	68.6	68.2	66.8	68.3	68
Avg. Length of Stay		3.3	3.2	3.2	3.1	3.1	3.3	3.2
Surgical Operations		83231	85371	86329	91329	79567	88173	87422
Deliveries		79655	77136	75705	77909	73340	73399	74188
Out-Patient Visits		2647261	2859276	3159200	3315331	2934034	3302676	3281969

Source: MOH annual statistical book(2013)

Table 11, shows the MOH Primary Health Care Centers 2013 distributed throughout the kingdom.

Table 11: MOH Primary Health Care Centers, 2013

Health Care Centers	Comprehensive	Primary	Peripheral	Maternity& Child Care	Dental Clinics	Chest Diseases Centers
	95	**375**	**205**	**448**	**387**	**12**

Source: MOH annual statistical book 2013

Table 12 shows the distribution of health care personnel at MOH and other health sectors. It is illustrated that MOH has the largest medical personnel in order to be able to provide health services to all Jordanian citizens. The registered nurses have the largest number followed by physicians.

Table 12: Distribution of Health Care Personnel at MOH and Other sectors 2013

Sector / Category	MOH	RMS	JUH	KAUH	Private	UNRWA	Total	Rate Per. 10,000 of Population
Physicians	4476	1611	520	419	11560	111	18697	28.6
Dentists	761	288	125	-	5600	30	6804	10.4
Pharmacists	484	243	31	27	10852	2	11639	17.8
Registered Nurses	4686	3307	545	443	8710	45	17736	27.2
Associate Degree Nursing	2341	2313	93	45	0	0	4792	7.3
Assistant Nurses	2261	0	66	44	1692	184	4247	6.5
Midwives	1455	153	4	16	882	34	2484	3.8

Source: MOH Annual Statistical Report 2013

Analysis of MOH Funds

Sources of MOH Funds

In Table 13 below we see that most of the MOH/CIP funds (77.48 percent) comes from the MOF followed by the Household (16.41) percent.

Table 13: Sources of Funds for MOH / CIP 2013 (JD)

	Financing Agents	MOF	MOPIC	Other Gov. Entity	Private Firms	HH	UNRWA	Rest of world the	TOTAL
1	**MOH**	399,391,103	3,653,692	622,286	19,409	0	0	17,283,151	420,969,641
	Percent	*94.87%*	*0.87%*	*0.15%*	*0.005%*	*0.00%*	*0.00%*	*4.11%*	*100.00%*
2	**CIP**	127,445,000	0	19,000,000	266,500	111,599,012	654,974	0	258,965,486
	Percent	*49.21%*	*0.00%*	*7.34%*	*0.103%*	*43.09%*	*0.25%*	*0.00%*	*100.00%*
3	**Total**	**526,836,103**	**3,653,692**	**19,622,286**	**285,909**	**111,599,012**	**654,974**	**17,283,151**	**679,935,127**
	Percent	***77.48%***	***0.54%***	***2.89%***	***0.042%***	***16.41%***	***0.10%***	***2.54%***	***100.00%***

Note : Numbers may not add up to 100% due to rounding

Use of Funds

NHA analyses the use of funds in two ways:

a) By function – primary, curative, administrative, training, and others (miscellaneous).

b) By type of expense – recurrent, capital, and other miscellaneous expenditure. Other expenses are of all categories which include expenses such as travel

MOH/CIP spent a total of JD 678 million in 2013 . As indicated in Table (14) JD 478.6 million including CIP (71 percent) were spent on MOH facilities, JD 76.3 million (11 percent) were spent on UHs and JD 50 million (7 percent) were spent on RMS and around 56.9 million (8 percent) were spent on the Other Gov. Facilities, 15.1 million (2 percent) were spent on private facilities while the rest spent on Treatment Abroad .

Table 14 : MOH / CIP Expenditures on different Facilities 2013 (JD)

Facilities	MOH	*Percent*	CIP	*Percent*	Total	*Percent*
MOH Facilities	420,969,641	*100%*	57,672,858	*22%*	478,642,499	*71%*
RMS Facilities	0	*0%*	50,071,278	*19%*	50,071,278	*7%*
UHs Facilities	0	*0%*	76,335,764	*30%*	76,335,764	*11%*
Private Facilities	0	*0%*	15,129,943	*6%*	15,129,943	*2%*
Other Gov. Facilities	0	*0%*	56,943,580	*22%*	56,943,580	*8%*
Treatment Abroad	0	*0%*	974,454	*0%*	974,454	*0%*
Total	**420,969,641**	***100%***	**257,127,877**	***100%***	**678,097,518**	***100%***

Note : Numbers may not add up to 100% due to rounding

Table (15) shows the distribution of expenditures by function at MOH/CIP. Curative care expenditure are high at around JD 523.8 million (77.24 percent) followed by primary care at JD 113.7 million with (16.76 percent).

Table 15: Expenditures by Function at MOH / CIP 2013 (JD)

Function	MOH		CIP		Total	
	Amount	Percent	Amount	Percent	Amount	Percent
Curative Care	289,116,957	*68.68%*	234,666,707	*91.26%*	523,783,664	*77.24%*
Primary Care	95,151,628	*22.60%*	18,523,022	*7.20%*	113,674,650	*16.76%*
Administration	18,662,645	*4.43%*	3,188,463	*1.24%*	21,851,108	*3.22%*
Training	10,926,911	*2.60%*	0	*0.00%*	10,926,911	*1.61%*
Other	7,111,500	*1.69%*	749,685	*0.29%*	7,861,185	*1.16%*
Total	**420,969,641**	***100.00%***	**257,127,877**	***100.00%***	**678,097,518**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

Table (16) shows the MOH/CIP expenditures by type. Expenditures on recurrent expenditures are high at around JD ***629.2*** million (92.8 percent), and on capital expenditures are about JD 41 million (6.05 percent) of the total expenditure.

Table 16: Distribution of MOH / CIP Expenditures by Type 2013 (JD)

	MOH		CIP		Grand Total	
Type Of Expenditure	**Amount**	**Percent**	**Amount**	**Percent**	**Total**	**Amount**
Recurrent Expenditure						
Salaries	223,658,569	53.13%	31,427,107	12.22%	255,085,676	37.62%
Drugs	44,196,539	10.50%	2,732,607	1.06%	46,929,146	6.92%
Supplies	13,949,563	3.31%	2,961,446	1.15%	16,911,009	2.49%
Exp. Of Sustainability & Operation	43,591,390	10.35%	528,177	0.21%	44,119,567	6.51%
Exp. Of Food & Housekeeping	36,901,844	8.77%	0	0.00%	36,901,844	5.44%
Treatment	8,000,000	1.90%	218,704,397	85.06%	226,704,397	33.43%
Training	2,572,613	0.61%	0	0.00%	2,572,613	0.38%
Sub-Total	***372,870,518***	***88.57%***	***256,353,734***	***99.70%***	***629,224,252***	***92.79%***
Capital Investment						
Medical Equipment	15,665,983	3.72%	21,612	0.01%	15,687,595	2.31%
Non-Medical Equipment	551,317	0.13%	2,846	0.00%	554,163	0.08%
Constructions	24,770,323	5.88%	0	0.00%	24,770,323	3.65%
Sub-Total	***40,987,623***	***9.74%***	***24,458***	***0.01%***	***41,012,081***	***6.05%***
Other Expediter						
Other Exp.	7,111,500	1.69%	749,685	0.29%	7,861,185	1.16%
Sub-Total	***7,111,500***	***1.69%***	***749,685***	***0.29%***	***7,861,185***	***1.16%***
Grand Total	***420,969,641***	***100.00%***	***257,127,877***	***100.00%***	***678,097,518***	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.2 Royal Medical Services

RMS Organization and Size:

Royal Medical Services contributes in providing health care as the second largest public entity in Jordan in this field through:

Providing curative and primary health care to the armed forces through 12 main hospitals spread all over the country. These benefits are extended to the dependents of the military personnel as well as public security and civil defense personnel and their dependents. This system covers about 1.7 million individuals with health insurance.

Providing high quality care, including some complex procedures and specialty treatment to Jordanians and to other patients from Arab countries. RMS facilities, both inpatient as well as outpatient, are mainly centered in Amman and are not as widely spread out as the MOH facilities. The RMS focuses more on providing inpatient care than outpatient care.

Contribution in activating the role of Jordan in the region and world by sending medical teams and field hospitals to disaster and conflict areas such as (Afghanistan, Iraq, Sera lion, Eretria, Liberia, Congo, Gaza strip , Pakistan and Haiti).The occupancy rate in the RMS hospitals indicated in Table 17 is 83 percent which is accepted all over the world. Other utilization and efficiency indicators of RMS Hospitals are shown in table 17.

Table 17: RMS Hospitals: Utilization and Efficiency Indicators

No. of Beds	Admissions	Discharged		Death Rate	ALOS	Occupancy Rate	Outpatient Visits	Surgical Operations	Deliveries
		Alive	Dead						
2449	188306	182336	5361	2.86	3.9	83%	3753495	94502	32221

Source: RMS Annual Statistical Report 2013

The Role of RMS in Jordanian Health System:

The RMS was established in the year 1948 and since then it has largely contributed to shaping the Health Care System. The RMS has been a pioneer in the medical field by developing a wide range of specialties, creating a medico-technical pole of excellence at the King Hussein Medical Centre, defining an active training and residency programs.

The role of the RMS in the Jordanian health system can be summarized as follows

- Preserving the health of the officers and soldiers of the Jordan military forces and the different security forces, and providing the field medical services which they need under all times and circumstances.
- Treatment of the costly complicated medical cases transferred from the Ministry of Health, the Jordan University Hospital, the private sector, and neighboring Arab countries
- Providing hospital care for all the citizens and residents of some governorates (Aqaba and Tafilah Governorates).
- Carrying out the main and pilot role in the case of disasters and collective accidents, including the transportation of injured people by helicopters and ambulances
- Providing complete and comprehensive medical coverage for all the Arab and international conferences that are held in Jordan.
- Participating in the education and training of physicians and nurses and auxiliary medical professions for all health sectors of the Kingdom.
- Replenishing the medical sector in the kingdom with trained and highly skilled people of all medical and technical specializations.
- The RMS exerts with the other concerned parties strenuous efforts to prevent disease and limit its spread and effect on the individual and the society in general.

Analysis of RMS Funds

Sources of Funds

The RMS/MIP like all other public entities, receives most of its annual budget from the MOF, 188 million (68.86 percent) in 2013 (Table 18). The second RMS/MIP source is Household at JD 39.6 million (14.46 percent), the third most significant source of funds are the contributions made to the RMS budget from other government agencies at JD 34.4 million (12.57 percent) .

Table 18: Sources of Funds for RMS / MIP 2013 (JD)

		MOF	MOPIC	Other Gov. Entity	Private Firms	HH	UNRWA	Rest of world the	TOTAL
1	**RMS**	**188,750,000**	**0**	**0**	**0**	**0**	**0**	**7,569,078**	**196,319,078**
	Percent	*96.14%*	*0.00%*	*0.00%*	*0.000%*	*0.00%*	*0.00%*	*3.86%*	*100.00%*
2	**MIP**	**0**	**0**	**34,457,473**	**3,671,719**	**39,643,462**	**0**	**0**	**77,772,654**
	Percent	*0.00%*	*0.00%*	*44.31%*	*4.721%*	*50.97%*	*0.00%*	*0.00%*	*100.00%*
3	**Total**	**188,750,000**	**0**	**34,457,473**	**3,671,719**	**39,643,462**	**0**	**7,569,078**	**274,091,732**
	Percent	*68.86%*	*0.00%*	*12.57%*	*1.340%*	*14.46%*	*0.00%*	*2.76%*	*100.00%*

Note : Numbers may not add up to 100% due to rounding

Uses of Funds

In Table 19 below we see that the RMS spends approximately 64.19 percent of its budget on curative care. This is probably because RMS is predominantly oriented to inpatient care. Primary care, administrative duties, training, and other miscellaneous activities account for 19.75 percent, 14.81 percent, 1.09 percent, and 0.14 percent respectively of the total budget.

Table 19: Expenditure by Function RMS / MIP 2013 (JD)

Function	RMS		MIP		Total	
	Amount	Percent	Amount	Percent	Amount	Percent
Curative Care	125,657,400	*64.01%*	50,295,475	*64.67%*	175,952,875	*64.19%*
Primary Care	38,663,816	*19.69%*	15,475,531	*19.90%*	54,139,347	*19.75%*
Administration	28,997,862	*14.77%*	11,606,648	*14.92%*	40,604,510	*14.81%*
Training	2,700,000	*1.38%*	300,000	*0.39%*	3,000,000	*1.09%*
Other	300,000	*0.15%*	95,000	*0.12%*	395,000	*0.14%*
Total	**196,319,078**	***100.00%***	**77,772,654**	***100.00%***	**274,091,732**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

Table 20: Distribution of RMS / MIP Expenditures by Type 2013 (JD)

	RMS		CIP		Grand Total	
Type Of Expenditure	**Amount**	**Percent**	**Amount**	**Percent**	**Total**	**Amount**
Recurrent Expenditure						
Salaries	109,300,000	*55.67%*	10,000,000	*12.86%*	119,300,000	*43.53%*
Drugs	4,750,000	*2.42%*	29,548,710	*37.99%*	34,298,710	*12.51%*
Supplies	14,700,000	*7.49%*	23,394,026	*30.08%*	38,094,026	*13.90%*
Exp. Of Sustainability & Operation	12,750,000	*6.49%*	1,818,918	*2.34%*	14,568,918	*5.32%*
Exp. Of Food & Housekeeping	4,000,000	*2.04%*	1,800	*0.00%*	4,001,800	*1.46%*
Treatment	200,000	*0.10%*	12,303,000	*15.82%*	12,503,000	*4.56%*
Training	2,700,000	*1.38%*	300,000	*0.39%*	3,000,000	*1.09%*
Sub-Total	**148,400,000**	***75.59%***	**77,366,454**	***99.48%***	**225,766,454**	***82.37%***
Capital Investment						
Medical Equipment	13,369,078	*6.81%*	11,200	*0.01%*	13,380,278	*4.88%*
Non-Medical Equipment	850,000	*0.43%*	300,000	*0.39%*	1,150,000	*0.42%*
Constructions	33,400,000	*17.01%*	0	*0.00%*	33,400,000	*12.19%*
Sub-Total	**47,619,078**	***24.26%***	**311,200**	***0.40%***	**47,930,278**	***17.49%***
Other Expediter						
Other Exp.	300,000	*0.15%*	95,000	*0.12%*	395,000	*0.14%*
Sub-Total	300,000	*0.15%*	95,000	*0.12%*	395,000	*0.14%*
Grand Total	**196,319,078**	***100.00%***	**77,772,654**	***100.00%***	**274,091,732**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.3 Jordan University Hospital

Organization and Size of JUH

Jordan University is the principal university in Jordan, often referred to as the "Mother University" for the role it plays in academia. Its affiliate hospital, Jordan University Hospital, which is associated with Jordan University medical school, is one of the largest in the country. JUH was built in 1973 exclusively to serve as a referral center for the MOH. However, over the years its functions have diversified significantly. It is one of the most specialized and high – tech medical centers in the public sector, along with King Hussein Medical Center. The outpatient clinics, the inpatient facility, as well as the pharmacies it operates, are all housed under the same roof.

JUH patients are referrals from the MOH, employees of Jordan University and their dependents, employees of private and public firms with whom JUH has contractual agreements, as well as some independent private (cash – payer) patients. Currently, the proportion of private patients is very low, and JUH is in the process of changing its patient mix and engaging in activities to attract private patients. One of the main objectives is to encourage private business to contract with JUH to increase the profitability of the hospital. JUH's annual budget has experienced some deficits as the reimbursement from MOH for its referrals have been insufficient to cover the costs of providing care to these patients. UHs insurance programs cover a very small percentage(1.3) of the population. Table 21 shows that JUH has 534 bed , occupancy rate is 69 percent and ALOS is slightly high because JUH is referral and teaching hospital. JUH has only one location and outpatient clinics are in – house.

Table 21: Utilization of JUH Facilities

No. of Beds	Admissions	Discharged		Death Rate	ALOS	Occupancy Rate	Outpatient Visits	Surgical Operations	Deliveries
		Alive	Dead						
534	33927	33332	576	1.7	4	%69	407820	21348	3957

Source: MOH Annual Statistical Report 2013

Analysis of JUH Funds

Sources of Funds

As shown in Table 22, the JUH total sources were about JD 68.5 million (68 percent of which from Other Government entities such as the CIP. The households contributed by 18.3 percent, followed by the and international donors by10.1 percent ,the private firms contributed about 3.5 percent.

Table 22: Sources of Funds for JUH 2013 (JD)

	Other Gov.	Private Firms	HH	Rest of the world	TOTAL
Amount	46,534,538	2,421,622	12,550,644	6,950,000	68,456,804
Percent	*67.94%*	*3.54%*	*18.37%*	*10.15%*	*100.00%*

Note : Numbers may not add up to 100% due to rounding

Uses of Funds

Table 23: Distribution of JUH Expenditures by Type 2013 (JD)

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	31,117,953	*45.46%*
Drugs	15,786,393	*23.06%*
Supplies	5,465,050	*7.98%*
Exp. Of Sustainability & Operation	4,516,182	*6.60%*
Exp. Of Food & Housekeeping	679,057	*0.99%*
Treatment	2,300,000	*3.36%*
Training	17,590	*0.03%*
Sub-Total	**59,882,225**	***87.47%***
Capital Investment		
Medical Equipment	2,110,099	*3.08%*
Non-Medical Equipment	419,809	*0.61%*
Constructions	6,000,000	*8.76%*
Sub-Total	**8,529,908**	***12.46%***
Other Expenditure		
Other Exp.	44,671	*0.07%*
Sub-Total	**44,671**	***0.07%***
Grand Total	**68,456,804**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

Table 24: JUH Expenditure by Function 2013 (JD)

Function	Amount	Percent
Curative Care	62,922,979	*91.92%*
Primary Care	0	*0.00%*
Administration	5,471,564	*7.99%*
Training	17,590	*0.03%*
Other	44,671	*0.07%*
Total	**68,456,804**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.4 King Abdullah university hospital

Organization and Size of KAUH

KAUH is considered to be one of the distinct landmarks in Jordan and the region as a whole, as to its design and health care services intended. As a general hospital, KAUH provides various clinical and referral health care services to other health care sectors in Jordan in a framework of mutual agreements and contracts, this is in addition to being a teaching hospital where university health science students receive their education and training courses.

KAUH is being built within the Jordan University of science and Technology (JUST) campus which is located in the north of Jordan on the high way linking Jordan to Syria. This carefully chosen location allows the hospital to provide primary, secondary, and tertiary health care services to more than 1 million inhabitants of Irbid, Ajloun, Jarash and Mafraq governorates in particular and to all Jordanians in general.

The hospital bed capacity is (501) beds which can be increased to (800) beds in any emergent situation. Structurally, the hospital is composed of a (15) story high-rise building, in which all hospital beds are located, and a 3 story Low-rise buildings in which outpatients clinics, diagnostic and other services are located. The hospital is connected to various health science faculties via the ground floor of the low-rise building. Technically, KAUH has been equipped with fixed and mobile equipment that are the top of their line. This in addition to the fact that a critically and systematically selected highly qualified and experienced technical and administrative personnel, have been / and are being employed to run the hospital as a non - profit organization that suits the hospitals mission

Analysis of KAUH Fund

Sources of Funds for KAUH are shown in table 25.

Table 25: Sources of Funds for KAUH 2013 (JD)

	Other Gov. Entities	**Private Firms**	**HH**	**TOTAL**
Amount	**41,516,484**	**1,151,016**	**6,135,130**	**48,802,630**
Percent	*85.07%*	*2.359%*	*12.57%*	*100.00%*

Note : Numbers may not add up to 100% due to rounding

Uses of Funds

Table 26: Distribution of KAUH Expenditures by Type 2013 (JD)

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	13,806,461	*28.29%*
Drugs	9,992,386	*20.48%*
Supplies	5,152,000	*10.56%*
Exp. Of Sustainability & Operation	13,145,464	*26.94%*
Exp. Of Food & Housekeeping	816,216	*1.67%*
Treatment	1,088,639	*2.23%*
Training	1,904,158	*3.90%*
Sub-Total	**45,905,324**	***94.06%***
Capital Investment		
Medical Equipment	1,700,960	*3.49%*
Non-Medical Equipment	49,587	*0.10%*
Constructions	142,318	*0.29%*
Sub-Total	**1,892,865**	***3.88%***
Other Expediter		
Other Exp.	1,004,441	*2.06%*
Sub-Total	1,004,441	*2.06%*
Grand Total	**48,802,630**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

Table 27: KAUH Expenditure by Function 2013 (JD)

Function	Amount	Percent
Curative Care	44,269,887	*90.71%*
Primary Care	0	*0.00%*
Administration	1,624,144	*3.33%*
Training	1,904,158	*3.90%*
Other	1,004,441	*2.06%*
Total	**48,802,630**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.5 General Directorate of Civil Defense (GDCD) Emergency Ambulance Services

The Ambulance service is considered as one of the vital services which are delivered to people to save lives and properties, and aims at protecting the development achievements, which depend on human capital as an essential element.

Risks are increased as a result of development in industry and increasing population. Hence, it's essential to respond rapidly and efficiently at the first moments of trauma

Stages of Establishing the Emergency Ambulance:
As a result of increasing rates of Road Traffic Accidents RTA and mortality, a National Committee was formed in 1979 to organize ambulance and emergency services in Jordan. It consists of MOH, RMS, Private Sector, and Civil Defense. Establishing a specialized unit at the Civil Defense Department to provide ambulance services in Jordan, this is known as Emergency Ambulance Directorate.

Uses of Funds

Table 28 shows the Distribution of the Emergency Ambulance Expenditures by type. Expenditures on salaries represent around 66.9 present, followed by expenditures on training by around 9.2 present.

Table 28 : Distribution of the Emergency Ambulance Expenditures by Type 2013 (JD)

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	11,521,743	*66.87%*
Drugs	0	*0.00%*
Supplies	100,000	*0.58%*
Exp. Of Sustainability & Operation	1,217,900	*7.07%*
Exp. Of Food & Housekeeping	0	*0.00%*
Treatment	0	*0.00%*
Training	1,578,000	*9.16%*
Sub-Total	14,417,643	*83.68%*
Capital Investment		
Medical Equipment	1,975,000	*11.46%*
Non-Medical Equipment	195,697	*1.14%*
Constructions	641,500	*3.72%*
Sub-Total	2,812,197	*16.32%*
Other Expediter		
Other Exp.	0	*0.00%*
Sub-Total	0	*0.00%*
Grand Total	**17,229,840**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.6 King Hussein Cancer Center KHCC Role and Functions of KHCC

In 1997, the KHCC opened its doors. The first name for the center was "Al-Amal Center" which means "The center of hope". With the available resources, the center took its first steps with numbers of patients increasing steadily. Shortly later, His Late Majesty King Hussein Bin Talal formed the King Hussein Cancer Foundation and a board of trustees was nominated to supervise the operations of this important institution.

On the 19th of September in 2002, there was an official ceremony to change the name of the center to honor the late King Hussein, who died of cancer. Currently the center is undergoing major construction, renovation and expansion to increase the number of beds and meet the growing demand of patients from Jordan and the region. Most importantly, the KHCC research office is working hard to promote cancer research, so that the center will have its landmark on the care of cancer globally.

Analysis of Funds

Table 29 shows a breakdown of KHCC Expenditures by function

Table 29: Breakdown of K.H.C.C Expenditures by Function 2013 (JD)

Function	Amount	Percent
Curative Care	47,459,218	*64.24%*
Primary Care	17,829,357	*24.13%*
Administration	4,695,226	*6.36%*
Training	532,836	*0.72%*
Other	3,358,591	*4.55%*
Total	**73,875,229**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.7 The National Center for Diabetes, Endocrinology, and Genetics

Role and Functions of NCDEG

NCDEG is one of the centers attached to the Higher Council for Science and Technology. It is established for treatment, training qualifications, development and research on diabetes, endocrinology, and genetics.

The main Function o NCDEG are:

- Promotion of Health Education of the patient, their family members and citizens in general to identify the optimum manner of dealing patients.
- Treatment of the diseases of diabetes, endocrine glands and genetics.

The center has very close relations with Jordanians and International organizations and societies. NCDEG was designated as a WHO collaborative center in 1996 with the following terms of reference:

- To collaborate with WHO collocation, review and dissemination of information on the prevalence and incidence of diabetes and long term complications in the region.
- To develop a community – oriented program for diabetes prevention
- To collaborate with WHO in the implementation of the medium-term program in developing a model for diabetes care as an integral part of primary health care.

Analysis of Funds

Table 30 shows a breakdown of NCDEG Expenditures by function

Table 30: Breakdown of NCDEG Expenditures by Function 2013 (JD)

Function	Amount	Percent
Curative Care	0	*0.00%*
Primary Care	10,634,000	*74.89%*
Administration	3,236,000	*22.79%*
Training	0	*0.00%*
Other	330,000	*2.32%*
Total	**14,200,000**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.8 Jordan Food and Drug Administration JFDA

Organization and Size of JFDA

The Food and Drug Administration JFDA had been established according to the Law No. 31 for year 2003. The Administration is governed by a Board of Directors headed by His Excellency the Minister of health and members from both public and private sectors. The General Director is the official representative of JFDA.

JFDA is an independent public sector regulatory institution working in collaboration with other institutes in public and private sectors, and it works through agreements and memorandums of understanding with national, and regional institutes such as: Ministry of Health, Ministry of Environment, WHO, and FDA.

JFDA has an important role in rationalizing the use of drugs in the country in order to decrease the expenditure level of drugs which occupies third of total expenditures on health.

Analysis of JFDA Funds

Table 31: JFDA Expenditures By Type **2013 (JD)**

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	5,533,305	*78.49%*
Drugs	0	*0.00%*
Supplies	264,850	*3.76%*
Exp. Of Sustainability & Operation	487,936	*6.92%*
Exp. Of Food & Housekeeping	215,000	*3.05%*
Treatment	0	*0.00%*
Training	10,000	*0.14%*
Sub-Total	6,511,091	*92.37%*
Capital Investment		
Medical Equipment	0	*0.00%*
Non-Medical Equipment	354,914	*5.03%*
Constructions	37,818	*0.54%*
Sub-Total	392,732	*5.57%*
Other Expediter		
Other Exp.	145,443	*2.06%*
Sub-Total	145,443	*2.06%*
Grand Total	**7,049,266**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.9 Ministry of Social Development MOSD Health Services Provision by MOSD

There are many of the health services provided by the Ministry of Social Development through the centers and branches all over in all regions of the Kingdom. The most important health and medical services are:

- Diagnosis.
- Treatment.
- Intensive around –the – clock nursing care.
- Community rehabilitation.
- Physical therapy.
- Health insurance for persons with disabilities.
- Nutrition program.
- Provision of appropriate treatment programs within the Centers, in cooperation with MOH hospitals
- Rehabilitation of the disabled.

Table32: Expenditure of MOSD By Type 2013 (JD)

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	2,242,735	*66.65%*
Drugs	23,973	*0.71%*
Supplies	0	*0.00%*
Exp. Of Sustainability & Operation	587,783	*17.47%*
Exp. Of Food & Housekeeping	484,838	*14.41%*
Treatment	0	*0.00%*
Training	0	*0.00%*
Sub-Total	3,339,329	*99.24%*
Capital Investment		
Medical Equipment	0	*0.00%*
Non-Medical Equipment	25,708	*0.76%*
Constructions	0	*0.00%*
Sub-Total	25,708	*0.76%*
Other Expediter		
Other Exp.	0	*0.00%*
Sub-Total	0	*0.00%*
Grand Total	**3,365,037**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

National Aid Fund NAF

Provides disabled poor patients with financial aid and medical equipment and devices they need.

5.10 The High Health Council HHC

Role, Structure, and Responsibilities of HHC

The HHC is headed by the Prime Minister and includes in its membership representatives of the different health and health-related sectors, namely the Minister of Health as the Vise Chairman, Ministers of Finance, Planning, Labor, and Social Development, the Director General of RMS, the Head of the Jordan Medical Association, one of the deans of medical schools, the head of another health related associations, the President of the Association of Private Hospitals, and two additional persons with expertise in health manners. Law no. 9, year 1999 stated that the objective of the High Health Council is to draw the general policy of the health sector and to put forward the strategy to achieve it and to organize and develop the health sector as a whole so as to extend health services to all citizens according to the most advanced methods and scientific technology. To achieve that the Council has several responsibilities:

- Periodic evaluation of health policies and introducing any needed changes after implementation.
- Identification of the needs of the health sector and taking decisions regarding equitable distribution of health services in the different regions of the kingdom to achieve justice and qualitative upgrading of the services.

- Participation in drawing up the educational policy for health sciences, and medicine within the kingdom, and
- organization of the process by which students join such studies outside the kingdom.
- Encouragement of studies, and research, and support for programs' activities, and services to achieve the objectives of the general health policy.
- Coordination of work between health establishments in the public and private sectors, to achieve complementarily of their work.
- Strengthening cooperation between local health establishments, and Arabic, regional, and international health establishments and agencies.
- Continuity in expanding the umbrella of health insurance.
- Studying the health problems and taking appropriate decisions up to restructuring of the health sector.
- Studying the proposed laws, bylaws, and regulations, of the HHC and the health sector and submitting the necessary recommendations.

The government is highly committed to institutionalize NHA within the HHC - General Secretariat in order to ensure the regular producing of NHA technical reports and to link the NHA results with national health policy process. The National Health Strategy NHS 2014 - 2016 of the HHC has focuses on the financial function of the health system in order to ensure the efficient use of financial resources, to control the increasing health care expenditures and to achieve universal health coverage.

Analysis of HHC Funds

Table (33): Distribution of HHC Expenditures by Type 2013 (JD)

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	225,045	*80.52%*
Drugs	0	*0.00%*
Supplies	747	*0.27%*
Exp. Of Sustainability & Operation	30,188	*10.80%*
Exp. Of Food & Housekeeping	3,900	*1.40%*
Treatment	0	*0.00%*
Training	5,288	*1.89%*
Sub-Total	265,168	*94.88%*
Capital Investment		
Medical Equipment	0	*0.00%*
Non-Medical Equipment	2,155	*0.77%*
Constructions	0	*0.00%*
Sub-Total	2,155	*0.77%*
Other Expediter		
Other Exp.	12,165	*4.35%*
Sub-Total	12,165	*4.35%*
Grand Total	279,488	*100.00%*

Note : Numbers may not add up to 100% due to rounding

5.11 Joint procurement Department JPD

Role of JPD

JPD was established on 12th of august 2004 based on law no. (91) for the year 2002 which covers medical supplies and drugs, the main role of JPD is managing of pharmaceuticals procurement which is considered as high priority in the Jordanian health sector .

Strategic goals of JPD focused on procurement of drugs and medical supplies of high quality within the frame of joint and consolidated specifications, procurement standardization, costs and expenditures control, and duplication elimination, achieve physical wealth by applying the economics of procuring big quantities principles, information and experiences exchange between parties taking part in procurement employ transparency approach in bids offer and studies, complete bids invitation and awarding as soon as possible, reevaluate suppliers and manufacturers continuously, prepare a list of the approved drugs used in the public sector, and achieve competence and justice amongst bidders.

Analysis of funds

Table 34 : JPD Expenditures By Type 2013 (JD)

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	456,406	77.00%
Drugs	0	0.00%
Supplies	3,000	0.51%
Exp. Of Sustainability & Operation	77,302	13.04%
Exp. Of Food & Housekeeping	11,500	1.94%
Treatment	0	0.00%
Training	12,799	2.16%
Sub-Total	**561,007**	**94.65%**
Capital Investment		
Medical Equipment	0	0.00%
Non-Medical Equipment	31,696	5.35%
Constructions	0	0.00%
Sub-Total	**31,696**	**5.35%**
Other Expediter		
Other Exp.	0	*0*
Sub-Total	**0**	***0***
Grand Total	**592,703**	**100.00%**

Note : Numbers may not add up to 100% due to rounding

5.12 Non-Governmental Organizations NGOs

Volume of NGOs Health Services .

The NGO in Jordan include national and international providers which cover Jordanian and non-Jordanian with primary, curative, and public health services. The FS of NGOs amounted JD 36 million, table 35 shows the volume of health services provided by charitable societies in Jordan (under the General Union of Voluntary Societies GUVS) to around 693 thousand beneficiaries. The Ministry of Social Development is responsible for regulating the affairs of the non- governmental, voluntary sector. International and regional organizations operate under special agreements.

Table 35: volume of health services provided by charitable societies in Jordan

charitable Societies	Hospitals	G.P Clinics	Gynecology Clinics	Pediatric Clinics	Dental Clinics	Laboratories	Beneficiary
54	**2**	**34**	**15**	**14**	**22**	**4**	**692990**

5.13 Social Security Corporation SSC

SSC Mandate

The Jordanian Social Security Law was issued as a provisional law under No. 30 of the year 1978, as a result of the economic and social development in the kingdom where it addressed the working groups uncovered with any other retirement rules or laws, such as civil or military retirement, the matter that required the existence of a socio-economic umbrella to protect those productive groups, and grant them subsequently more security, safety and stability, especially after the issuance of the Jordanian Labor Law at the beginning of the sixties of last century. As an autonomous public corporation, it enjoys financial and administrative autonomy, and it has the right to enforce acts, execute contracts, invest, accept donations, issue loans, and draft wills. Employer's participation in the social security system is mandatory and costs roughly 2 percent of employee's wages.

The Social Security Act encompasses six types of social insurance. SSC's role in the health care sector is limited to that of providing coverage to employees for work-related injuries and occupational diseases, primarily through its' worker's compensation provision. NHA estimation part of the SSC covers the following services:

1. Medical care as determined by the Social Security Administration Board and awarded on a case-by-case basis
2. Daily disability allowances, due to disease or on-the-job injury
3. Monthly wages and lump sum compensations
4. Funeral costs

Financial Sources of SSC:

The social security programs are financed through the following main sources in accordance with the rules of the law:

1. Contributions of those applicable to the rules of law whether paid by the insured employee or by the employer for his/her employees as well as the revenue of combining the previous service years in which they were not included by the rules of law.
2. Interests, fines and additional amounts in cases of delay in contributions payment, not including the employees, delay in notifying at service termination, or any other cases stipulated in law.
3. Investment revenues of social security accruals in different fields of investment

Currently applied insurances are:

- Insurance against work injuries and occupational diseases.
- Insurance against old age, disability and death.

SSC Health Expenditures:

Table 36 below illustrates expenses on Health (accidents and work injuries) by function

Table 36: SSC Expenditure on Health by Function 2013 (JD)

Function	Amount	Percent
Curative Care	1,860,590	*70.00%*
Primary Care	797,396	*30.00%*
Administration	0	*0.00%*
Training	0	*0.00%*
Other	0	*0.00%*
Total	**2,657,986**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.14 Ministry of Finance

The Ministry of Finance MOF Plays a major role in Jordan's Public health Sector through its role in providing financial allocations to ensure continuity in the work of this sector, through financial support for citizens treatment cost, in addition to the role of directing spending and ensuring the best use of available financial resources in general, and in the health sector in particular.

The main Strategic objectives of MOF:-

- Drawing up the financial policy to promote financial stability and stimulates economic growth.
- Reduce the balance and the burden of public debt.
- Improve the efficiency of control over public money.
- Improve transparency and disclosure.
- Improve the level of services provided.

As it was stated before, MOF is the main health financing source in Jordan. In 2013 MOF financial allocations to public sector reached around JD 740 million and distributed to MOH/CIP ,RMS/CIP, Other Gov. Entities and UHs table 37

Table 37 : MOF Financial Allocations to Public Sector 2013 (JD)

Public Sector Institution	Amount	Percent
MOH	399,391,103	*54%*
CIP	127,445,000	*17%*
RMS / MIP	188,750,000	*26%*
Other Government Entities	24,433,383	*3%*
Total	740,019,486	*100%*

Note : Numbers may not add up to 100% due to rounding

General Budget Department sets allocations according to updated methodologies which enable the ministries and other governmental institutions, including health related entities to implement their health policies and achieve their objectives in the most equitable manner possible among the Jordanian governorates

5.15 Department of Statistics:

The Department of Statistics (DOS), which founded in 1949, is one of the first governmental institutions that have accompanied the establishment of the kingdom of Jordan. The department by law is the only institution authorized to gather different kinds of data covering demographic, economic, social and other aspects. The department conducts surveys and censuses according to a work plan on fixed periods of time (monthly, quarterly, annually). These censuses and surveys covering various fields such as population and housing, economy, agriculture and other fields. The data produces by DOS serve all data users and decision-makers. The department of Statistics produces different reports on different time bases such as the Statistical Yearbook , Jordan In Figures and household scurvies . These publications contain different indicators and data such as the GDP indicators and other socio-economic and demographic indicators. The DOS and the HHC General Secretariat have completed a national survey on health insurance coverage and household health expenditure 2010. The result of this survey have improved the quality of NHA private sector data. The 2015 census results on health insurance coverage by insurers and other characteristics have been very helpful to plan for achieving Universal Health Coverage.

5.16 Ministry of Planning and International Cooperation.

Role of MOPIC in Health Sector

MOPIC main role is to be a link between all the international donors, ministries and government institutions, working to coordinate the development efforts for the advancement of the level of national economy and improve the standard of living, through the preparation and follow-up implementation and evaluation of development plans and strengthen the economic ties of technical and financial cooperation with various countries , international bodies and institutions, which contribute to the achievement of sustainable development within the framework of the Ministry's efforts to achieve national goals and to advance the reform and development programs in all different sectors,

MOPIC provides the support for many health sector projects either through financial contributions and support from its budget, or loans and grants. within clear and transparent mechanism of action, where MOPIC Study funding requests for various projects and their classification in terms of strategic priorities and their compatibility with national objectives and the operational programs for each sector, after that, MOPIC discuss requests with funding agencies to provide the necessary support , after coordination with Ministry of Finance on the terms of the proposed funding to select the most appropriate, funding agreement is prepared by the funding agencies and in coordination with MOPIC, as well as the beneficiaries of the project.

MOPIC is also responsible for the follow-up procedures during project implementation as well as coordination between the funding agencies and the beneficiary, to ensure that the implementation of the project is in line with the signed agreement and to handle any obstacles during the implementation period.

Stemming from the role of the MOPIC in developing economic policies and supporting the economy of Jordan, financial agreements have been signed with the Gulf Region Funds to finance several projects within the General Budget of Jordan. This direct support comes to alleviate the deficit in the general budget. The value of MOH projects funded by these aids reached JD 55.49 million, while the expenditure was JD 12 million in 2013. The total allocated budget funding the RMS projects was JD 130 million, whereas the expenditure was JD 28.29 million in 2013. The value of MoPIC budget allocated for health projects was JD 7 million whereas the expenditure was JD 5 million in 2013. It is important to mention that JD 17.73 million was also allocated for King Hussain Cancer Center for the year 2013 from the Gulf Grant. It is noteworthy to mention also that these expenses were included within the expenditure of MoPIC budget, and MOH and the RMS on both the primary healthcare and the secondary healthcare programs for the year 2013.

5.17 Insurance Sector

According to the results of the new census in Jordan 2015, the coverage rate among Jordanian citizens is 68% and among population is 55% as 2.9 million of the population are non-Jordanians (the total number of population is 9.5 million out of which 6.6 are Jordanians). The Government of Jordan is committed to move towards achieving Universal Health Coverage in Jordan. The distribution of health insurance coverage among Jordanian citizens revealed that the Ministry of Health/ Civil health insurance program covers 41.7% followed by Royal Medical Services/ Military insurance fund which covers 38% and the private insurance covers 12.4%. University hospitals coves 2.5%, UNRWA covers 2.5% and the remaining 2.5% are covered by other insurers.

Private Health Insurance

As mentioned above, 12.5 percent of the insured Jordanians are covered by health insurance plans of private (commercial) companies or by self-insured firms. Commercial insurers may function in two ways: as insurers, or as third-party administrators TPA for self-insured firms. Self-insured firms pay directly for health care services on behalf of their employees and their dependents. They also assume full financial risk for their health insurance plans. These firms typically utilize third-party administrators to administer their health plans; thereby, reducing the administrative costs that are associated with managing a health insurance program.

Insurance Legislation

The first authority to act as a regulatory body for insurance affairs in Jordan was the Jordan Association for Insurance Companies, 1956. In 1987, the Jordan Insurance Federation was established by a Royal Decree to assume the responsibility of regulating and managing the insurance sector. In 1999, the Insurance Commission was established in accordance with the Insurance Regulatory Act No. 33. Since then, both the Jordan Insurance Federation and the Insurance Regulatory Commission have assumed responsibility for managing and regulating the insurance sector.

Insurance commission is functioning now as a directorate linked to the Ministry of Economy and Trade, and it's main role is to protect the rights of the insured and to develop insurance services in the Kingdom through supervising and regulating the local insurance sector .The above mentioned directorate continues to provide the NHA team with the necessary data for NHA reports from all insurance companies registered (28 TPPs and 10 TPAs) . Data include health expenditures of private firms, insured individuals, and number of public and private universities, table 39 was developed in collaboration between HHC General Secretariat and representatives from the Ministry of Economy and Trade - Insurance Directorate , and it shows expenditures items by inpatients and outpatients.

Table 38: Health Expenditure Data From Private Firms, Insured Individuals, and From Public and Private Universities by Inpatients and Outpatients.

	Inpatients	Outpatients	Total
Pharmaceuticals	3,303,413	32,734,326	36,037,739
Doctor fees	8,003,066	16,803,828	24,806,894
Laboratories	1,734,659	5,949,420	7,684,079
X- Rays	1,032,065	4,461,971	5,494,036
Emergences	11,919,657	20,377,000	32,296,657
Other Benefits	8,743,206	10,840,483	19,583,689
Sub – Total	34,736,066	91,167,028	125,903,093
Administrative Expenditure on Inpatient and Outpatient	21,349,451		21,349,451
Grand Total	147,252,544		147,252,544

Note : Numbers may not add up to 100% due to rounding

Jordan's Universities and Health Insurance

Jordan has one of the most well-established and modern higher education sector in the MENA region. There are 21 public and private universities, located in major cities of the country. However, most universities are located in Amman. All universities offer health insurance to their students and employees. Private universities typically offer coverage through their university-owned and -operated clinics.

Other Government Entities are the largest contributor to public universities' health insurance plans; it financed the universities' health sector by 61 percent (around 13 million) in 2013. the Households are the second contributors, to the public universities insurance program supplying 39 percent (8.2 million JD) of total operating revenue in 2013 as shown in table 39 .

Table 39: Sources of Health Funds for Public Universities

	Other Government Entities	Households	Total
Amount	12,921,962	8,261,582	21,183,544
Percent	61%	39 %	100 %

Note : Numbers may not add up to 100% due to rounding

Table 40 shows that the Households are the only contributor, to the private universities insurance program supplying 100 percent (6.2 million JD) of total operating revenue in 2013.

Table 40: Sources of Health Funds for Private Universities

	Other Government Entities	Households	Total
Amount	0	6,213,357	6,213,357
Percent	0 %	100 %	100 %

Note : Numbers may not add up to 100% due to rounding

5.18 Civil Insurance Program (CIP):

Organization

The first civil insurance program (CIP) bylaw was issued in 1965 and was amended in 1966 where the major funding came from compulsory enrollment of public sector employees and optional enrollment for the rest of the population provided that the enrollee would pay for in-patient services. Another amendment was made in 1979 making it possible to provide curative services (in-patient services) by facilities other than the Ministry of Health hospitals; this bylaw was amended once again in 1980. In 1983 the health insurance bylaw number 10 was issued, and in 2004 the new bylaw number 83 was issued according to paragraph C of Article 66 of the public health law number 54 for the year 2002.

Sources of funds

The CIP has several sources of funds as indicated below (table 41):

Table 41: Sources of Funds for CIP

	MOF	Other Gov. Entity	Private Firms	HH	UNRWA	TOTAL
Amount	127,445,000	19,000,000	266,500	111,599,012	654,974	258,965,486
Percent	*49.21%*	*7.34%*	*0.103%*	*43.09%*	*0.25%*	*100.00%*

Note : Numbers may not add up to 100% due to rounding

Expenditures

The CIP has witnessed several developments through; amending the bylaw to include other categories, improving the level of provided healthcare, and contracting with the private sector to compensate for shortages of the curative services. This implies increasing the obligations and expenditure of the CIP fund.

Table 42 shows the distribution of CIP expenditures by type

Table 42 Distribution CIP Expenditures by Type

Type Of Expenditure	Amount	Percent
Recurrent Expenditure		
Salaries	31,427,107	12.22%
Drugs	2,732,607	1.06%
Supplies	2,961,446	1.15%
Exp. Of Sustainability & Operation	528,177	0.21%
Exp. Of Food & Housekeeping	0	0.00%
Treatment	218,704,397	85.06%
Training	0	0.00%
Sub-Total	***256,353,734***	***99.70%***
Capital Investment		
Medical Equipment	21,612	0.01%
Non-Medical Equipment	2,846	0.00%
Constructions	0	0.00%
Sub-Total	***24,458***	***0.01%***
Other Expediter		
Other Exp.	749,685	0.29%
Sub-Total	***749,685***	***0.29%***
Grand Total	***257,127,877***	***100.00%***

Note : Numbers may not add up to 100% due to rounding

Categories covered by civil insurance program (CIP / MOH)

1. Public sector employees and their dependents.
2. The poor holding cards according to social studies.
3. Disabled.
4. Blood donors.
5. Pregnant woman.
6. Children under 6 years of age
7. Elderly (above 60 years).
8. Other categories.
9. Some costly diseases are insured according to special standards determined by the health insurance bylaw, these include the followings:
    - Mental diseases according to the Minister decision.
    - In-patients recommended by the Ministry of Social Development.
    - Alcohol and drug addicts in addition to drug poisoning cases.
    - Snake and scorpion bites
    - AIDS patients.
    - Chronic blood diseases including (Hemophilia. ,Thalassemia. , Sickle cell anemia ,Aplastic Anemia ,Inherited immunodeficiency diseases, Gamma globulin deficiency ,Cystic fibrosis ,Cancer diseases and side effects) .

5.19 United Nations Relief Works Agency UNRWA

UNRWA provides assistance to Palestinian refugees in Jordan. Its services are comprehensive and include health, education, and social welfare assistance. UNRWA's health care programs are implemented in collaboration with the MOH. UNRWA provides mainly comprehensive preventative, family planning, and health education services to the refugee population through its network. UNRWA operates:24 health centers, and one health point, 24 clinics, 24 MCH clinics, and 28 dental clinics. UNRWA owns also 13 specialty clinics 24 laboratories, 2 mini laboratories and 4 mobile dental clinics. School health services are provided through 4 school health teams.

UNRWA health expenditures amounted to nearly JD 14 million in 2013. The distribution of these funds is illustrated in Table 43.

Table 43: Breakdown of UNRWA/Jordan Health Expenditures by Function

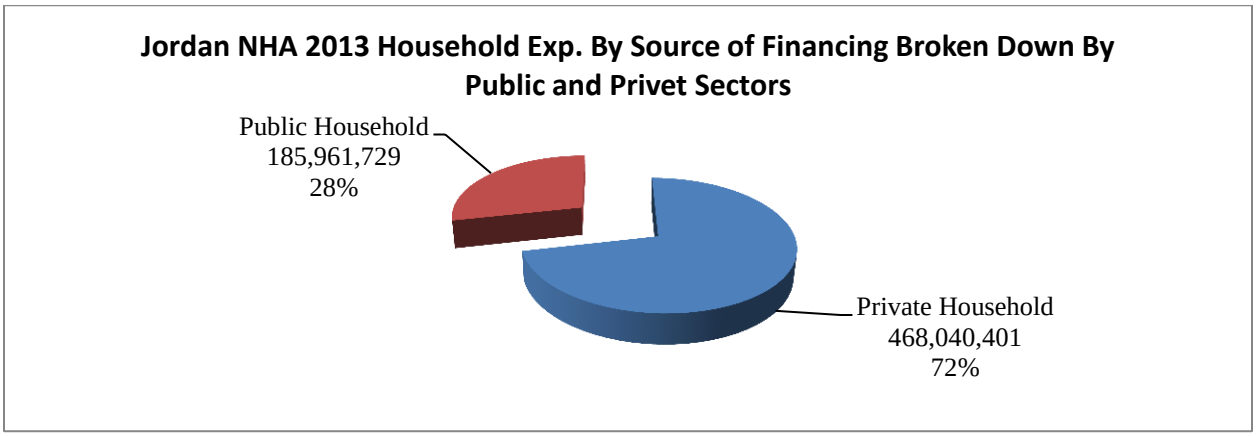
Function	Amount	Percent
Curative Care	1,069,540	*7.64%*
Primary Care	12,142,533	*86.71%*
Administration	467,903	*3.34%*
Training	6,234	*0.04%*
Other	318,074	*2.27%*
Total	**14,004,284**	***100.00%***

Note : Numbers may not add up to 100% due to rounding

5.20 Household Health Care Expenditure Estimates

Figure (4) shows the distribution of household expenditures paid to providers as OOP expenditures in public and private health facilities and as premiums for health insurance

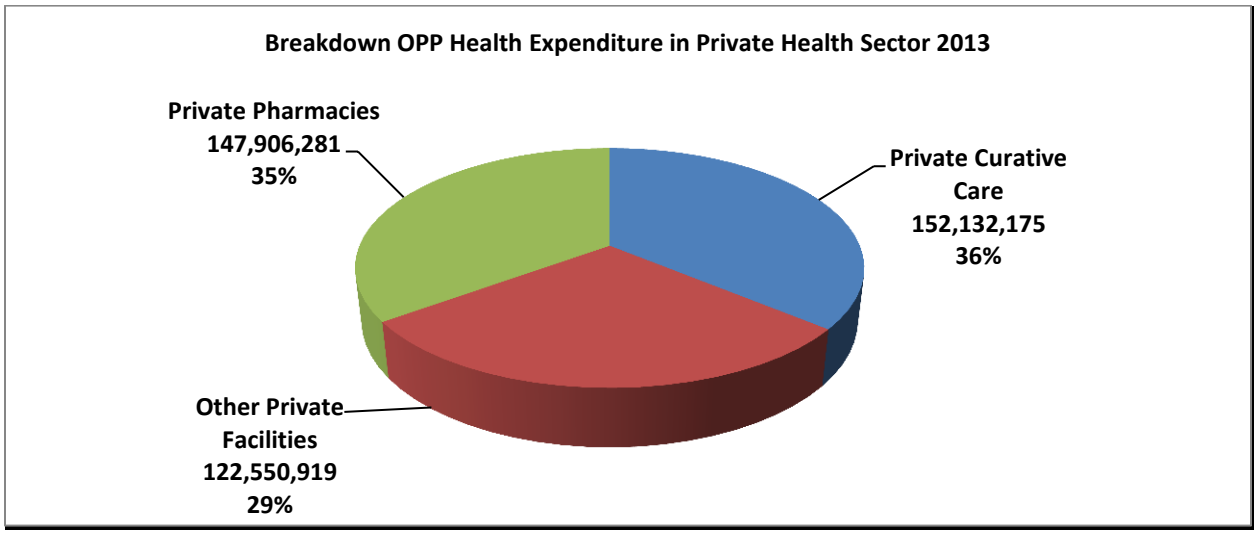
Figure 4: Distribution of Public and Private Households' Expenditures



Breakdown of OOP Health Expenditure in the Private Health Sector:

Total OOP expenditures on health services by Jordanian households in the private sector amount to around JD 422.5 million in 2013 figure (5) shows the distribution of these OOP expenditures. This represented roughly 90.2 percent of total healthcare expenditures that were paid directly by Jordanian household in the private sector. The remaining 9.8 percent was spent on premium contributions. Households' expenditures on pharmaceuticals amounted 35 percent, private hospitals 36 percent and other private facilities 29 percent

Figure 5: Breakdown OPP Health Expenditure in Private Health Sector



5.21 Hospital Sector

As presented in Table 44, the total number of hospital beds in Jordan is 12081, or 18 hospital bed per10,000 population in 2013 compared to 17 in 2005. Table 45 also provides some key indicators of inpatient services. (Additional information, on the production of other inpatient services, can be obtained from MOH Annual Statistical Reports.) It is of import to note that Jordan hosts one of the highest bed-to-population ratios in the Middle East. The public sector has nearly twice the number of the beds as the private sector. The average occupancy rate was increased from 65.1 in 2008 to 63.9 in 2013.

Table 44: Distribution of Beds in Public and Private Facilities and Occupancy Rates

Entity		No. of Hospitals	No Of Beds		Occupancy Rate %
			No.	%	
MOH		31	4618	38.2	68.0
RMS		12	2439	20.2	82.0
UHs	**JUH**	1	534	4.4	69.0
	KAUH	1	501	4.1	62.6
Private		58	3989	33.0	46.8
Country level		106	12081	100	63.9

6. Achievements of Jordan for NHA institutionalization

The Jordanian NHA team has produced this sixth NHA Technical Report as a result of a nine year effort by the HHC General Secretariat (2007-2016) . The previous NHA reports have covered 2007 – 2013 fiscal years. Institutionalizing NHA at is a remarkable achievement for NHA in Jordan as the HHC is directly involved in drawing up the national health policy and uses the NHA as an important health policy tool. The initial NHA effort in Jordan was supported by PHR*plus* project funded by USAID and it was continued by the WHO since 2007 by providing technical support to HHC General Secretariat for sustaining NHA activity in Jordan.

6.1 Development of a Standardized Data Reporting System

The information that is available , through existing government agencies , is accurate and of good quality. Moreover , there is little coordination among government sectors with respect to their accounting practices. The NHA team members expended a disproportionate amount of effort organizing various public sector agencies data ,so that their accounting definitions would be comparable. Significant work remains to be accomplished in order to ensure uniform data reporting from various institutions to HHC General Secretariat. . The NHA team has conducted

several training workshops , for concerned national institutions in order to improve the NHA data collection process. It's worth to mention here that the main private expenditures data in this report were taken from household surveys. The NHA indicators are being used in developing National Health Strategies and action plans.

6.2 Adoption and using of NHA Results for public Policy

Determining the appropriate policy designs, implementation, and methods of evaluation requires the availability of reliable data and sound methodologies for collecting and analyzing such data . The NHA results presented in this technical report are a step toward achieving this for Jordan's health care policy and planning . It is therefore imperative for policymakers to link the NHA findings in the process of national health policy debates and within the policy formulation and implementation processes.

7. Policy Implications

7.1 sustaining the current Level of Health Care Expenditure

Jordan spent 7.89 percent of its GDP on health care services in 2013 and 7.72 percent in 2011. Such high levels of health expenditures may prove to be unsustainable in the near term. Moreover, with changing demographics, population aging, and shift from infectious to chronic diseases, it becomes apparent that current expenditure levels will not be sustainable. Hence, an effective strategy of cost containment , to include greater use of utilization review mechanisms and the implementation of an effective prescription drug policy , should be of highest priority to stakeholders. Furthermore the public sector is the major supplier of health care services in the country, and its services are provided to MOH and RMS beneficiaries with little or without cost-sharing. This has implications for both cost-containment objectives, as well as the distribution of the financial burden among consumers of these services. It indicates that the government should consider developing a clear system of means-testing among beneficiaries. Such a system could shift the financial burden of their system in such a way that those with greater means are responsible for paying a greater share of their service provisions. A recent study on Fairness in financial Contribution FFC in Jordan conducted by the HHC in collaboration with DOS and WHO (Abu Saif J. et al , 2010) has shown that the premiums' source of financing is regressive across public health insurance programs. This study recommends that health insurance premiums, mechanisms should be revisited in the public sector.

7.2 Health Policy Issues

Jordan NHA estimates (1998, 2000, 2001, 2007,2008,2009,2010, 2011,2012 and 2013) showed that Jordan is spending between 26 and 36 percent of its total health care expenditures on pharmaceuticals. This figure is considered high for middle income countries, given the fact that this level of expenditure is difficult to sustain into the future. In addition, Jordan still has a high total fertility rate (3.5 according to 2012 DHS). Coupled with the facts that life expectancy has increased for both males and females, and child and infant mortality have decreased to be one of the lowest in the region, this will exert more pressure and demand for health care services on the

system. Reinforcing the concept of cost-containment. One specific area of cost- containment that was highlighted as a priority was the pharmaceuticals. Rational Drug Use will continue to be promoted and implemented, thus contributing, to the government's cost containment efforts. The HHC and all concerned parties in the Jordanian pharmaceutical sector have lunched the national strategy for rationalizing drug expenditure, 2012-2016.

7.3 Public and private Health Sector Coordination

Increasing public and private sector coordination is needed for optimal health care policy design and its implementation . This becomes more evident when one considers the low levels of occupancy that prevails at private sector hospitals. Given the amount of excess capacity in the private sector, the government could accelerate its plans to engage in greater private sector contracting for health care services on behalf its beneficiaries. Contracting can increase utilization in the private sector and reduce the need for greater capital investment. Currently the MOH is engaged in contracting with private hospitals in collaboration with PHA.

7.4 Equity

The government provides subsidized health services to all persons, irrespective of a person's income or asset holding . Low-income persons are responsible currently for the same cost-sharing arrangements as higher-income households, this mechanism is considered unfair. The results of Fairness in Financial Contribution in Jordan study (HHC in collaboration with DOS and WHO , 2010) have shown that the source of financing is regressive across health insurance programs in the public sector. It was suggested to reset the health insurance premiums mechanisms according to the household capacity to pay .The government is fully committed to move towards achieving Universal Health Coverage.

7.5 Reallocating Expenditures from Curative to Primary Health Care

Jordan, like other middle-income countries, allocates a disproportionately large share of its health care expenditures to curative care services. Policymakers have expressed concern about this , and the current study reinforces the need for concern, Hence, it is imperative that the government engage in a significant preventive health strategy that earmarks expenditures towards more primary and preventive treatment. A well-designed information , education and communication

(ICE) strategy should be implemented . For example , it is common knowledge that the lifestyles of many Jordanians contribute to the high prevalence of diabetes mellitus, and heart diseases . An anti-smoking campaign, aimed at providing information to consumers about the health risk of tobacco smoking , would be a cost-effective strategy. Other steps, such as the promotion of daily exercise and reduction in the amounts of daily sugar intake, will also lead to overall healthier lifestyles, and lower health care costs.

8. Recommendations

First : recommendations related to the NHA report

1. Establishing legal way to bind all concerned parties to provide the requested data for the report yearly .
2. Adding a section for results and figures' analysis
3. To train NHA Team members on the new NHA methodology
4. To perform in depth analysis in order to link the information of the previous years
5. To reduces the time gap in the issuance of the report

Second : recommendations related to health policies

1. To activate the HHC role as a responsible party for drawing up the health policy for all health sectors at the kingdom level.
2. To relocate the healthcare funds in order to increase the funds allocated for primary health care.
3. To activate the cost containment policies (certificate of need, treatment protocols, and standards of establishing new health facilities).
4. Complementation of the health sector and activating the electronic linkage among sector institutions.
5. To set up a mechanism for evaluating and monitoring of policies and recommendations mentioned in this report.
6. Expanding the health insurance coverage which will reflect on the out of pocket expenditure.
7. To spend more on training and research in order to increase effectiveness and efficiency of health staff.
8. To conduct a national survey on health care utilization and expenditures.
9. To expand well-advised agreements between health sectors in order to provide integrated services and to rationalize health expenditures.
10. To set up necessary legislations in order to mandate health insurance in the Kingdom.

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Annex No. 1

Unified Definitions of Expenditures by Line Item.

1. Salaries: salaries, allowances, Wages , fees, , bonuses , incentives, day payments and the costs of official duties, contributions/ reimbursements such as social security , health insurance.
2. Drugs: medicines, medical supplies including medical gazes ,vaccines and serums(in cash or kind).
3. Supplies: medical and nonmedical : medical devices and consumables such as medical glasses and headphone, clothing, fabrics , stationery , printings, furniture, materials, and raw materials (in cash or kind).
4. Sustainability and operating expenses and maintenance:

4.A recurrent public expenditure telephone, fax, water, electricity , fuel, rents, studies, insurance of cars and buildings, building permit fees, customs fees, announcements, and expenses of official travels)

4.B maintenance :(the maintenance of medical and non-medical equipment , maintenance and repairs and modernization of buildings, car spare parts and maintenance).

5. Food and beverage , and Housekeeping:
   5.A Food and beverage including contracts.
   5.B Housekeeping and security including contracts.

6. Treatment :(treatment outside the institution in private and public hospitals medical centers, and clinics, within the kingdom and outside the kingdom).

7. Training and research :(training within and outside the kingdom including salaries and wages and expenses of training institutions and travel expenses related to training).

8. medical devices and equipment (all devices and medical equipment).
9. devices and non-medical equipment (vehicles, electrical appliances and mechanical).
10. Constructions :(buildings and lands, constructions and work with feasibility studies).
11. Other expenditures: (contributions and any other expenses that are not mentioned in the previous items).

Annex No.2

Unified definitions of expenditures by function

1. Administration and supported services : includes salaries, wages, operating expenses and manufacturing expenses and capital expenditures, which belong to the Department.

2. Training and research: it includes salaries, wages, operating expenses and transferring expenses and capital expenditures, which belong to colleges, institutes and training and travel expenses related to training.

3. Preventive services (Primary care) : This includes salaries and wages , operating expenses and transferring expenses and capital expenditures related to the health centers.

4. Curative services (secondary care): This includes salaries and wages, operating expenses and transferring expenses and hospital capital expenditures .

5. Other expenditures : contributions and any other expenses that are not mentioned in the previous items