Available online at www.sciencedirect.com

ScienceDirect

Procedia - Social and Behavioral Sciences 150 (2014) 230 – 240

Procedia
Social and Behavioral Sciences

10th International Strategic Management Conference

Developing Strategies for the Future of Healthcare in Turkey by Benchmarking and SWOT Analysis

Imran Aslan[a] , Orhan Çınar[b] , Üstün Özen[c]

[a,b,c]*The University of Atatürk, Erzurum, Turkey*

Abstract

Turkey has been undergoing structural changes since 2005 in healthcare and these changes force Turkey to reorganize its developing healthcare system. Based on the observations done in Turkey, Japan, Malaysia and Singapore, interviews and surveys in some hospitals and articles published in healthcare, this study is prepared. SWOT Analysis of Turkish healthcare is drawn. From SWOT Analysis, the TOWS matrix to deploy strategies is developed in order to be successful at global environment in future. Turkey has great potential of internationalism of healthcare with its geographical location, historical places, beaches and geysers. Malaysia and Singapore have got great benefits by internationalizing their healthcare by private sector. Turkey needs both assistant and specialized doctors to meet the needs of increasing population. Nursing homes can be opened to decrease the load hospitalization on public hospitals mainly concentrated on old and chronic illness with U-Health. Moreover, it is expected that medicines and devices used in healthcare are to be produced in Turkey to prevent money outflows to other countries and decrease budget deficits. A more transparent and objective performance system focusing on quality and satisfaction of both staff and patients are to be developed in order to maturate the healthcare with increasing share of healthcare in GDP in Turkey.

Keywords: Healthcare, SWOT, TOWS, Turkey

1. Introduction

Increasing demand of healthcare and limited resources cause to reorganize and improve healthcare operations in Turkey. The needs of skilled professionals, limited budget and increasing demand of hospitals result in searching new alternatives in order to use the existing sources effectively and decreasing costs due to inefficient operations. The management of hospitals needs to adopt themselves to globalization efforts and having improved skills to meet the expectations of potential market. The quality level of services is to be improved at the same time. The expectations of patience and staff are analyzed with increasing needs. It is estimated that millions of dollars are spent on improper medicines usages. Safety regulations of patients are not well applied in Turkey. People focus on using medicines to be treated and they do not take enough precautions. Using tobacco products results in many illnesses and the cost related to usage is very high in Turkey. Studies done in that field are analyzed to focus on increasing efficiency in healthcare.

[1] İmran Aslan. Tel.: +905315151428
E-mail address:imranaslan@gmail.com

doi:10.1016/j.sbspro.2014.09.043

Preventive healthcare slowly getting importance in Turkey is mainly applied at preventing infectious diseases like measles vaccine, polio vaccine, and tetanus.

Benchmarking with Japanese, Canadian, Singapore, USA and Malaysia can help to see how well Turkey in the World. Longevity, healthy life, low mortality and coverage of insurances are crucial factors to be evaluated. In some countries, health is expensive but when compared with their economical power, it is not that much expensive. In Turkey like Malaysia, healthcare is cheap. However, many people cannot afford to insurance themselves. Earnings and social supports are high in developed countries. The same service in Canada can be provided with less than half price in Turkey. Hence, the developments and technological structure of country have strong effect on healthcare system. Developed countries can spend more from their GDP to health whereas this rate is low in Turkey due to internal structure and politics. The maturated healthcare in Japan is not just supported with healthcare politics but also with strong complementary treatments and preventive precautions. Complementary healthcare is almost not applied outside of some herbal shops in Turkey.

2. Literature Review

Healthcare in Turkey is mainly centralized by a Health Ministry in Ankara. In the last years, there are large queues in hospitals and some patients have preferred private hospitals, but private healthcare is expensive for some patients. Total healthcare expenditures 6% of the total budget are very low in Turkey as seen below. The budget of healthcare in USA is 16% of GDP. Private sector is the main provider of healthcare services in USA and Mexico. Mexico has the lowest budget of healthcare in figure below according to World Health Organization (WHO) data.

	Toplam sağlık harcaması - Total health expenditures								
	Kamu - Public			**Özel** - Private			**GSYH** - % of GDP		
	2006	2007	2008	2006	2007	2008	2006	2007	2008
ABD - USA	45.2	45.4	46.5	54.8	54.6	53.5	15.8	16.0	16.0
Almanya - Germany	76.8	76.9	76.8	23.2	23.1	23.2	10.5	10.4	10.5
Çek Cumhuriyeti - Czech Republic	86.7	85.2	82.5	13.3	14.8	17.5	7.0	6.8	7.1
Fransa - France	79.1	79.0	77.8	20.9	21.0	22.2	11.0	11.0	11.2
İngiltere - United Kingdom	82.0	81.7	82.6	18.0	18.3	17.4	8.5	8.4	8.7
İtalya - Italy	76.8	76.5	77.2	23.2	23.5	22.8	9.0	8.7	9.1
İspanya - Spain	71.2	71.8	72.5	28.8	28.2	27.5	8.4	8.5	9.0
Japonya - Japan	81.3	81.3	...	18.7	18.7	...	8.1	...	...
Kanada - Canada	69.8	70.0	70.2	30.2	30.0	29.8	10.0	10.1	10.4
Meksika - Mexico	44.2	45.2	46.9	55.8	54.8	53.1	5.8	5.9	5.9
Portekiz - Portugal	71.5	70.6	...	28.5	29.4	...	9.9	...	...
Yunanistan - Greece	62.0	60.3	...	38.0	39.7	...	9.5	9.6	...
Türkiye - Turkey	68.3	67.8	73.0	31.7	32.2	27.0	5.8	6.0	6.1

Figure 1. OECD Health Data 2010 (WHO1, 2010)

26 beds per 10.000 people are available in Turkey and the World average is 30 beds per 10.000 people. In European Region, 61 beds are available per 10.000 people. It is clear that Turkey needs more investment in that field. The average day of stays is 18.2 days in Japan and 14.2 days in Korea. Staying long time can be beneficial for patients' treatments. 4.1 days are the average of stay in Turkey. The main reason of that is lacks of beds countrywide. In many hospitals, some patients are dismissed to open places for new patients. Many patients are not well treated and sent home to continue their treatments. Moreover, it is expensive to stay in private hospitals and the cost of staying each day has to be paid. The OECD average of stays is 7.1 days and in some other developing countries like Poland, the average is higher than Turkey's average. (SHGM, 2012) This is an alarming situation to send patients in few days. In big cities, the situation is even more alarming and it is sometimes difficult to find place even for urgent patients as seen from media news and observations. Nursing homes explained in that study can be an alternative solution to create places for some patients.

The satisfaction level was 40% and 321 $ per person was spent in healthcare in Turkey in 2003. 2,446 $ per person was spent in Denmark and the satisfaction level in healthcare was 92% in 2003. It is generally clear that as more money is spent per person, the satisfaction level increases. 667 $ per person larger than just from Rumania and Bulgaria's spending in healthcare was spent per person in Turkey in 2010 and average satisfaction level increased to 76% in 2010. However, at spending per person, it is still far behind developed countries. 3,331 $ per person is spent in Germany. However, the satisfaction level is just 66%. The main difference is that the healthcare is cheap in Turkey when compared with some developed countries. Moreover, the main provider for payments is government, which makes the healthcare easier and cheaper in Turkey. The satisfaction level can be increased since the situation of

healthcare was really bad 10 years ago in Turkey, but this huge increase in satisfaction is not expected. Some countries like Greece spend more money but the satisfaction level is just 22%.

A successful healthcare policy is expected to increase the life expectancy. The expected life years have increased from 65 years in 1990 to 75 years in 2009 in Turkey. There is 9 years increase for male and 10 years increase for females from 1990 to 2009 in Turkey. Moreover there is a 3 years (from 17 to 20 years) increase in the life expectancy of over 60 years old people in Turkey from 1990 to 2009 year. The expected life years have decreased from 61 to 49 in African country Zimbabwe. However, the life years have increased from 75 years to 79 years in United States of America during these years. There was 8 years decrease in South Africa while the life years have increased from 78 to 81 in Sweden and 77 to 82 years in Spain. People in San Marino live 83 years whereas people in Zambia live 49 years. The long living is a kind of development parameter for a country. People in San Marino and Europe can live almost two times more than some African countries. Turkey is successful at increasing life years but it is still behind of developed countries like Spain and Singapore. (WHO4,2012)

Developing policies of breast cancer is different for premenopausal and postmenopausal women. It is found that screening of breast cancer is more favorable due to attaching behavior of illness. Mortality due to breast cancer can be prevented by detecting at early stages. Even, the probability of dying from breast cancer in a women's lifetime is increasing with age, it is less aggressive at older ages. According to the age and lifetime risk, the number of mammograms can be determined with start and stop age. Expected number of mammograms and life time of mortality risk decrease as the patients become older. Breast screening can start annually before 40 ages and post 60 ages biannually. In some practices, it is suggested that breast cancer screening should be done per 3 years between 50 and 70 ages. This policies are developed optimally based on economic status, insurance coverage, timing preference, risk tolerance, life-year utility etc. (Maillart et al., 2008) Defining an illness at early stages decreases the costs of recovery. Preventive healthcare can decrease the costs and cancers. It was found in Canada that breast cancer is less for women between age 40 and 50 than without mammograms women. (Zhang et al.,2009)

Nursing homes in Norwegian are common to provide structured rehabilitation programmes to old people. Being discharged earlier from hospitals with increasing aging increases the importance of nursing homes. (Krüger, 2013) Main reasons for healthcare tourism are lack of technology at own country, desire to vacation with treatment, expensive healthcare at own country, taking better quality healthcare services, and the desire that others do not know operation like cosmetic surgery, infertility treatment and so on. In some developed countries, social security systems and private insurances make agreements with other countries to decrease increasing health expenses due to aging. In general, healthcare tourism consists of medical tourism, thermal tourism (Spa + Spa wellness) and organized aged care movement. In medical tourism, Asian continent like Singapore is the most attractive region. Until 2017, 23 million potential patients from the United States by spending 79.5 billion dollars in overseas destination for health tourism are estimated. In Beppu City-Japan, 12-13 million people have visited for thermal tourism purposes per year. In that country, the support of modern medicine and the social security institutions with other treatment options through integrated thermal tourism are becoming increasingly important. (Özer& Sonğur, 2012) U-Care System named as client-specific or tailored to personal care needs provides medication intake, compliance and health monitoring by remote monitoring technology by reminders at homes.(Klooster,2013)

Japan Healthcare: Japan healthcare system is accepted as one of the best practice in developed countries with low waiting. (Nadeem, 2013) The Japan healthcare system is successful at longevity of life, low infant mortality, and at eradication of communicable diseases. (Uetsuka, 2012) Out-Of Pocket payments are 13.9% in Japan in 2009. Patients pay up to 30% health expenditures changing for age groups (over 75 years pay 10% of costs) and unemployed people pay 20% of costs. Different from Turkey, health management of school controls nutrition educations and school lunch. (Nadeem, 2013) Milk is provided to primary school students at Turkey but not extensive nutrition program is available. 70% Japanese people have complementary health insurance. Life expectancy is 83 years in Japan When a patient's symptoms are warrant, doctors order examinations and tests. Japan people use more drugs than OECD average. Just 18% of patients spend less than 3 minutes with doctor and two-thirds of them spend less than 10 minutes. Long wait times are seen mainly in university hospitals and there is an increase in black market with "under the table" or envelope payments for faster treatment in order to access to preferred providers in Japan according to Tanner (2008). Numbers of doctors per 100 000 population in Japan and Turkey are 230.4 and about 130 respectively in 2010. Different from Turkey, they have wide category of health workers like judo heeling practitioner, acupuncture practitioner and message and finger pressure practitioner. Kampo therapies, herbal medicines, acupuncture, moxibustion, and other methods are used to treat people widely in Japan. (WHO3, 2012) The role of pharmacies has increased by including consultancy and providing some non- prescript medicines to control costs in Japan. The Japan

Council for Quality Health Care (JCQHC) sets indicators and a controlling system for service delivery progress in hospitals. The hospitals based on voluntary basis and 30% of hospitals are accredited in Japan. (WHO3, 2012)

Canada and USA's Healthcares: Life expectancy is 80,7 years in Canada according to OECD statistics. A publicly funded health care system is applied in Canada, which is mainly free at the point of use and services are mostly provided by private sector. A health card is given to people by Provincial Ministry of Health to supply equal healthcare to all citizen and some provinces provide dental and vision cares at some level. Pharmaceutical medications are paid by governments for the elderly, indigent or employment-based on private insurance. Family doctors can choose receive a fee per visit of fixed salary. They make $202,000 earning in a year (2006, before expenses). 70% of Canadians' healthcare costs are paid by governments and about 27.6% is paid by private sector. Privately funded healthcare is controlled by governments to obey some rules. (Wiki1 , 2013) Cost sharing regimes prevents the excess usage of resources and this can be applied to Canada to increase efficiency. (Nadeem, 2013) Diabetes and obesity rates are high in Canada while Canada shows high results at many cancer screening and care indicators such as stroke mortality (43 per 100,000 people). OOP expenditure rates per person one of the highest country after the United States and Australia is Canada due to pharmaceuticals and dental care. Daily smokers (16%) are lower in Canada than OECD average while alcohol is consumed more than OECD average. Smoke rate is 15% in USA. Moreover, Canada's fruit and vegetable consumption is greater than OECD average and in many places, sugary drinks are banned in machines. Obesity rate larger than Japan is 17.7% in Canada. 17% of all deaths mainly due to lung cancer in Canada are related to smoking. (FIP, 2013) 4% Canadian do not visit the doctor due to cost while this is 22% in USA. Patented drug prices are cheaper in Canada and Canadian patients are more prescript than USA citizen. The United States spends more money on technology than Canada. Both USA and Canada do not import any drugs. Cancer rates are identical for both countries. (Wiki2, 2013) 16.3% of the population about 50 million people in USA was not insured in 2010. 45,000 to 48,000 unnecessary deaths every year in the United States happen due to not accessing healthcare services. Investments into medical research have made USA leader in innovation of devices and drugs. Direct-to-consumer advertising of prescription drugs is allowed in USA and it is believed that it increases drug costs. The private healthcare industry has strong impact on policy of healthcare in USA. (Wiki3, 2013)

Healthcare in Malaysia: Malaysia healthcare is among the world's best third country by its cheap medical-tourism, high medical expertise even better than most western countries, and with plethora of national insurers according to Global Retirement Index 2014. (Huff Post, 2013)Healthcare is centrally administered by the Ministry of Health having low regulatory power over the private sector. Local managers have low effects on policies and hiring staff with a fixed budget based on performance indicators and target to give equitable practices and to achieve national goals. Traditional medicine- herbal medicine and products are issued by Chinese and Malay practitioners like acupuncture, reflexology, naturopathy and post natal massage. Lower cost, internationally accredited modern facilities in the Association of Private Hospitals of Malaysia and English-speaking professionals are reasons to visit Malaysia for healthcare tourism. Over 341.200 patients visited Malaysia for healthcare tourism in 2007. Low usage of private beds is used for healthcare tourism supported by governments. Total health expenditure per capita has increased from 281 $ in 2000 to 641 $ in 2010. (Jaafar et al., 2013) There are high wastages of resources within the public and private sector due to dual system in country. Managing the public–private dichotomy is a challenge for Malaysia. GDP for health was 2.9% in 1997 and 4.7% in 2007. The share of private GDP has passed public sector over years. Out-of-pocket (OOP) has increased from 32% in 2001 to 40% in 2006. (MHM, 2014) Life expectancy was 74 years in 2005 and this is 76.4 years for female and 71.6 years for male in 2008. The life expectancy has increased about 10 years in 38 years after colonization of UK. Mortality rates have decreased over years per 1000 population whereas diabetes mellitus have almost doubled in that time range due to high sugar consumption behaviours. Most deaths in Malaysia are from non-communicable diseases due to lack of registry data. This rate is 60% in South-East Asian countries. (Jaafar et al., 2013) Integration of public -private health services at primary care level can be done by financial methods. Incentives and penalties can play active role to increase efficiency. 10% increase in cigarette prices decreased cigarette consumption by 3.8% in 2004. (MHM, 2014; Wik4, 2014)

Internationalism of Healthcare in Turkey: After 80s, Turkey has started to improve healthcare tourism. 92% of patients prefer private hospitals. Eyes care, dental orthopaedics, cardiology, oncology, plastic surgery and neurosurgery are main operations of 80% patients. Patients are mainly from Germany, the Netherlands, Austria, Iraq, Syria, Turkish Republics, Middle East, and Belgium. Governments give incentives for promotion and trade fairs. The number of tourists who participated in the spa tourism in Turkey in 1981 was 63.999 people and in 1998, this number raised to 375,606 people. (Özer &Sonğur, 2012) The success story of Internationalism of Singapore can be a good example for Turkey. Moreover, Malaysia healthcare tourism efforts can be another example to expand in other countries. Private hospitals have adopted quality standards in Turkey to get patients from other countries and done

some promotions. Turkey has a great thermal tourism potential with many geysers at different cities. Arabic countries close to Turkey have high potential to come to Turkey for healthcare. People from these oil rich countries have high income level and they prefer Asian countries like Singapore. Technological developments and enough staff can help to internationalize healthcare by providing better technological healthcare than other countries like Iraq and Saudi Arabia. Moreover, agreements with insurers and social security systems from other countries to cover costs in Turkey can result in more international customers. Also, packages with vacations can decrease costs and increase customers. Furthermore, specialized hospitals on peculiar surgeries like kidney transplantation and infertility treatment can be opened in Turkey.

3. Methodology

In this study, investigations done for the PhD thesis, researches done in healthcare and current situation of Turkish healthcare are used to deploy strategies. SWOT Analysis is drawn from current literature and observations done during the visit of Japan, Singapore and Malaysia for 5 weeks. Based on SWOT and benchmarking with other countries, favorable strategies are drawn by TOWS method. The aim is to improve the healthcare in Turkey and this can be done by improving efficiency. Strategies are reasoned based on the current situation, resources and developments in developed countries explained above. New opportunities can be used to enlarge the potential of healthcare in Turkey such as internationalizing healthcare which can bring more profit to the country and increase the healthcare in Turkey.

SWOT (Strengths-Weaknesses-Opportunities-Threats) can be applied to create TOWS (Threats-Opportunities-Weaknesses-Strengths) matrix in order to deploy strategies. Using strengths and opportunities to prevent threats by minimizing weaknesses is the main purpose of SWOT Analysis.(Aslan1 et al., 2012) Turkey has done great improvements in healthcare in last 12 years. Internal and external environments are analyzed to find strategies in order to catch the developed countries standards in healthcare in next ten years. For that aim, healthcare in Turkey, literature and external healthcares like Canadian, Japanese and Malaysian healthcares are analyzed and benchmarked. Internationalization of Turkish healthcare is tried to be developed from Singaporean case study. Malaysia is a multi-ethnic country with Malay, Chinese and Indian communities. In this way, Malaysia is so similar to Turkey with many different ethnics like Turks, Kurds, and Arabian etc. General healthcare insurance by governments, new performance system, e-prescription, new healthcare devices, technological improvements, new managements structure etc. are parts of reorganization in Turkey. Types of strategies explained below are developed.

- SO-“Strategies that use strengths to maximize opportunities.”
- WO-“Strategies that minimize weaknesses by taking advantage of opportunities.”
- ST-“Strategies that use strengths to minimize threats.”
- WT-“Strategies that minimize weaknesses and avoid threats” (Aslan1 et al. , 2012)

4. Developing Strategies by TOWS Matrix and SWOT Analysis

Turkey has an improving healthcare and there are great improvements in last ten years. But, the country is still at back of developed nations and some OECD averages. Staff level per million people is low and quality from patients and staff perfective is ignored. The qualities of treatments have been well quantified but just numbers. Healthcare staffs get some payments based on their activities. There is a need of changing insurance system. A new rating system is to be developed based on successes of treatments, quality and efficiency. New strategies are to be developed to catch other developed nations’ healthcare. Japan is successful at its complementary and technological intense healthcare. USA and Canada have maturated healthcare by producing their own medicines, devices and patents. Obesity is a problem in developed nations and it becomes a problem slowly in Turkey. Old healthy population can be still used in Japan as a workforce. Idle retired population in Turkey can work to improve the economy.

Table 1 SWOT for Turkish Health Sector: Strengths &Weaknesses(TUBİTAK,2013;SB, 2012; WHO, 2011; TCBYDTA, 2010; Aslan2 et al., 2012)

Strengths	Weaknesses
• Using young population in healthcare as a resource to increase the staff in healthcare • Having traditional management and organizational structure- Central Management • Improvements private hospitals • Eradicating some illnesses like polio and low level HIV viruses in Turkey when compared with African and some developed western countries • Low level of alcohol, drugs and cigarette usage • Distribution of healthcares everywhere(Family doctors at healthcare offices and home treatments) • Improvements in communication and technology • A new reorganization of healthcare since 2005 and circulating capital (Döner sermaye)-a way of providing money to hospital • Showing a quick reaction against earthquake and other urgent cases • Increasing budget of healthcare in overall country budget • Reaching health services around whole country especially in remote areas • Alternative treatment methods potential by using native plants and geysers • General Healthcare Insurance covering all citizens- three main social institutions (SSK, Bag-Kur and Emekli Sandigi) • Decreasing numbers of deadly illnesses • Increasing investments in healthcare in last years • Adapting to EU healthcare • Increasing awareness	• Too much politician effect on healthcare and lack of countrywide policies • Not efficient bureaucratic structure and lack of institualization, Not having professional management to allocate resources • Unfair performance system; • Not being able to solve country wide problems • Low level of budget in country budget • Giving some privileges to parliament staff, MSB, Military hospitals and Main Bank staff • Not having a wide healthcare insurance • Frauds and using resources not efficiently • Low level income of some citizens • Obligatory replacement of doctors to some part of Turkey, not working efficiently there, going west cities in few years • Not having enough infrastructures (building, machines etc.) • Not active participation of civilian in healthcare • Buying health care resources from outside like medicines and devices • High level of accidents • Low level of feeding and hygiene • Not working young population bring more load on country • Having high workload at centre of ministry • Not having enough staff and not using staff having master and PhD degrees efficiently • Making extra tests to increase circulating capital • Low level of patents and intellectual property rights

There is an increase in the share of healthcare GDP in last 12 years and it is expected that more GDP is required for healthcare in future. Turkey can use its some young population to improve healthcare by educating them and then employing them in that field. Healthcare is centrally managed from Ankara. This can be a strength to adjust the same standards around the country, but it can be a weakness at the same time due to slow bureaucracy as stated by Aslan2 et al.(2012). There is a high political effect on employing staff especially for management but not based on performance. Staff having PhD and master degrees cannot be used efficiently in healthcare as found by Aslan2 et al.(2012). Getting full free healthcare at private hospitals is not possible in general insurance system and green cards cannot visit some hospitals such as university hospitals. Due to regional healthcare differences, some people go other cities to get treatment and this increases the workload on these cities. Preventive healthcare is not so common in Turkey and treatment and urgent oriented healthcare is more concentrated. The active participation of civil organization in planning, education and control may increase the satisfaction of patients and efficiency. The greatest weakness of Turkish healthcare is buying devices and medicine from other countries even though the GDP share of healthcare is low. Thus, this money outflow is to be stopped by innovations of devices and medicines. Internally made products are to be consumed in healthcare.

Table 2 SWOT for Turkish Health Sector: Opportunities and Threats (TUBİTAK, 2013; SB, 2012; WHO, 2011; TCBYDTA, 2010)

Opportunities	Threats
• Improvements in education of healthcare and finance by adapting to EU • Decreasing technological expenditures on medicines and devices • Improvements in insurance systems • Creating new funds and researches • Economical and political stability • Increasing awareness of healthcare among people • Increasing international cooperation in healthcare • Improvements in Health Tourism • New occupational groups can provide positive support to health • Tele tip can decrease crowds • Government's health reform agenda, the "Health Transformation Programme" (HTP), provides a coherent vision for comprehensive reform of the health system • Important developments with young population • AR-GE investments for new patents • Expanding healthcare market • Nursing homes • Internationalization of healthcare	• Political domination of healthcare management • Resistance to implementing changes • MoH and a rigid and bureaucratic public sector. • Using country health resources not wisely • Increasing price of healthcare devices • Not having qualified staff • Improving living life years and old population bring extra load • Population movements and risk of outbreaks • Short term planning of politics • Increasing poverty- not having enough foods • Globalization and global warming • Regional and global economic crisis • Increasing obesity • Fragmentation and incoherence in the organizational structure • Weak health information systems • The negative effect of governments on payments and refunds • Not reaching international standards in healthcare • The need of reducing the budget deficit • Increasing medicine resistances against bacteria and virus

There is a resistance to implement the most politically challenging aspects of health transformation program which are also conditions for the World Bank (e.g. extent of increased managerial autonomy for public hospitals). Political stability and the current government majority will allow policy maker at the executive level to carry out the major reforms including the health sector. Outbreaks of SARS, AIDS, gripe infections etc. have major effects on the usage of healthcare resources. Monitoring and analysis of major health risks by Health Information Technologies can increase the efficiency and satisfaction like e-prescription. E-prescription survey showed that more than 70% of users support the usage of it. To decrease the bedding limitation in hospitals, nursing homes can be opened in different cities of Turkey. Malaysia and Singapore earn a great amount of money from international healthcare. Turkey can also increase its international activities in different cities. Increasing expected living years can be an opportunity and threats at the same time while more living years mean extra load on healthcare. Economical opportunities can help to spend more money on healthcare. There are some public advertisements on TVs recently to increase the awareness in healthcare in Turkey. Some people use the international outbreaks for their benefits by creating human made virus for their financial gains. Moreover, unqualified increase of staff can be a treat in future. Furthermore, obesity, poverty, lack of foods, global warming, cigarette, drug and alcohol usages are threats for the health of people.

Table 3. TOWS Matrix SO and ST strategies for Turkish Healthcare

TOWS Matrix	**External Opportunities (O)** 1. Improvements in insurance systems 2. Improvements in education health and finance 3. Creating new funds and researches 4. Economical and political stability 5. Reforms including the health sector. 6. Increasing awareness of healthcare among people 7. Increasing Health Tourism and complementary treatments 8. Internationalism of healthcare 9. Opening nursing houses	**External Threats (T)** 1. Resistance to implementing the most politically challenging aspects of health 2. Increasing price of healthcare devices 3. Improving living life years and old population bring extra load 4. Population movements and increasing risk of outbreaks 5. Increasing poverty (not having enough foods) 6. Globalization and global warming causing health problems 7. Regional and global economic crisis 8. Increasing obesity
Internal Strengths(S) 1. Using young population in healthcare as a resource to increase the staff in healthcare 2. Having developed technologies in some centres 3. Improvements private hospitals 4. Low level of alcohol, drugs and cigarette usage 5. Distribution of wide healthcares services 6. Improvements in communication and technology 7. A new reorganization of healthcare 8. Increasing budget of healthcare in overall country budget 9. Reaching health services around whole country at the same level 10. Alternative treatment methods 11. General Healthcare Insurance	**SO** • Increasing expected living years.(S1,S2,S3,S4,S10,O1, O3,O6,O7) • Increasing number of staff(S1,S8,O2,O3) • Increasing complementary healthcare(S10,O7,O8) • Increasing personal satisfaction(S8,S2,O2) • Increasing patients satisfaction(S2,S3,S5,S6,S9, S11,O1,O3,O5) • Decreasing cancers(S2,S4,S10,O3,O6,O 7) • Internationalism of hospitals and healthcare tourism(S10,S8,O7,O10)	**ST** • Decreasing effects of outbreaks and global warning(S2,S8,T4, T5,T6) • Decreasing obesity(T8,S10) • Decreasing cost due to aging(S1,S4,S10,T3) • Increasing healthcare services at economical crisis(S1,S2,S3,S7,S10,T7) • Decreasing resistance in aspects(S7,T1) • Providing enough foods to all population(S8,T5)

SO Strategies: Turkish healthcare is a good example with its low cost treatment. Strategies are developed to become a matured healthcare in 10 years. The life years can be increased by having more healthcare staff, better technology, using lower cigarette and alcohol, applying alternative treatments and improvements in private sector. For that, new funds and reforms in healthcare will be needed. Moreover, complementary and healthcare tourism can be

developed in Turkey. Turkey has a young population and they are expected to be educated to increase the number of doctors and nurses. New funds will be needed and some new departments are to be opened at some universities to educate doctors. Alternative treatments are successful at many illnesses and awareness in that field will force people to use these methods. Healthcare Tourism can be carried out to increase the resistance of body and for treatments. Especially, Far East countries like Japan and Singapore are successful at healthcare tourism. Increasing budget in healthcare, improvements in technology and education with increased staff level and quality can raise the satisfaction of staff. The quality of services can increase the satisfaction of patients. Turkey needs great extend of reforms in healthcare since it is controlled from one centre. Geographical differences are to be decreased in healthcare. Moreover, new hospitals and education branches are to be opened with new research centers. By screening and improved healthcare, number of cancers can be decreased. Smoking, alcohol, drugs and obesity are major cause of lung cancers. Moreover, complementary treatments are beneficial to prevent cancers like Chinese treatments. To increase the revenues from hospitals in Turkey, healthcare can be internationalized to get patients from other countries. Turkey has lost of natural resources like hot water springs to attract tourists for healthcare tourism.

ST Strategies: Influenza viruses subtype H5N2 and H3N2 outbreaks were two recent global threats around the world. Outbreaks are common around the world like SARS. Countries have to protect their people against them. Vacancies production is low in Turkey and they have to be bought from other countries. Some global outbreaks caused many deaths in Turkey. Moreover; global warming can be a great problem in future. Some funds are to be used for researches in outbreaks and warming. Alternative treatments and sport can prevent increasing obesity in the country. With increasing obesity, the load of it on healthcare increases. The average age is to be increased and there are to be more old people in future. However, there is still young population and they can be used as a workforce in the future. Old people can be retired at older ages and they can do some other works after retirement as done in Japan and Germany. Some civil organizations can bring together these old people to do beneficial works for community. Crises are common in Turkey. People need more healthcare services in these hard times. Economical and political crises should not have any effect on the price and quality of services. Physiological illnesses can be treated with alternative methods. Own technology production can decrease costs in healthcare. A new organizational chart of healthcare management can be more flexible to make changes. Old slow system governed from Ankara prevents to develop the current system. Decentralized structure can be more beneficial to provide services. Many illnesses occur due to lack of foods and hygiene. Some part of budget is to be used to provide foods to young population at schools.

WO Strategies: Following global improvements in healthcare, benchmarking Turkey with developed healthcare systems and decreasing weaknesses are main opportunities for future. Bureaucracy makes some services difficult to do quickly. Staffs are unhappy about long procedures and management structure politically dominated. New reforms with lean philosophy can decrease bureaucracy in healthcare and increase coordination by empowering healthcare staff more at service points. Economical developments can help to increase the share of healthcare in overall country budget. Healthcare staff is to be more efficient and can create its funds for researches and developments. New departments for educating doctors and nurses can increase the staff level. However, the quality of professional academician is to be increased. Also, there is a need of more specialized staff. Transparency and controllability of healthcare services are to be done with new reforms in healthcare. Education can help staff to use resources more efficiently. Changes in insurance system can force staff to use resources more carefully. Resources are mainly paid by governments. In current world system, civil organizations are very effective to improve the healthcare. They have huge communities and know their regions better than centre managers. They can participate in regional policies more actively. Necessary feeding at proper ages can prevent many illnesses. Food supports should be done to poor families. Hygiene education is to be done to families and children at schools. One great weakness of Turkish health sector is not producing its devices and medicines. Turkey has to make its medicines and devices. This can be done by new funds and researches. American and Canadian markets are supplied by medicines produced at the own country. Japan healthcare technology is mainly supported by Japanese researches. Accidents cause to many healthcare resources to be used and deaths. Accidents can be prevented by education and rules. Young population in Turkey is to be educated to bring positive effect but not load on country. New economical opportunities are to be opened to create work places. Nursing houses provides beneficial results at meeting bedding requirements of aging in Norwegian. These houses can be opened in Turkey to decrease overloading and overflows of beds at hospitals.

Table 4. TOWS Matrix WO and SW strategies for Turkish Healthcare

Internal Weaknesses	WO	WT
1. Too much politician effect on healthcare and lack of countrywide policies, 2. Not efficient bureaucratic structure 3. Low level of budget in country budget when compared with developed countries and not efficiently using that budget 4. Giving some privileges to parliament staff, MSB, Military hospitals and Main Bank staff 5. Not having professional management to allocate resources, and not using allocated resources of preventive healthcare but to treatment 6. Frauds and using resources not efficiently 7. Not having enough infrastructure (building, machines, beds etc..) 8. Not active participation of civilian in healthcare 9. Buying healthcare resources from outside 10. High level of accidents 11. Low level of feeding and hygiene 12. Not working young population bring more load on country 13. Lack of coordination among ministries	• Decreasing bureaucracy and political effects(W1,W2, W13,W4, O4,O5) • Increasing healthcare share in country budget(W3,O3,O4) • Professional healthcare staff(W5,O2) • Using resources more efficiently and transparent(W4,W2,W6,O1, O6,O7) • Active participation of civil organization in new structure(W8,O5) • Increasing feeding and hygiene(W11,O6,O4) • Producing healthcare resources and medicines(W7,W9,O2,O3,O 4) • Decreasing accidents(W10,O2,O6) • Using young population to support healthcare services(W12,O2,O3,O4,O5) • Opening nursing houses to decrease the bed requirements at hospitals(W7,O9)	• Decreasing resistance by changing bureaucratic structure(W1,W2,T1) • Producing healthcare devices in Turkey(W9,T2) • Using young population as way to improve healthcare services and increasing retirment age(T3,W12) • Increasing preventive healthcares by new funds against outbreaks and risk population movements(W5,W3,T4) • Creating countrywide feeding programs for young population and decreasing obesity(T5,T8,W11)

WT Strategies: If Turkey wants to be a global player in the world map, weaknesses in healthcare like central management, lack of budget and low technology usages are to be decreased. As mentioned before, transparency at hiring can be done by decreasing political effects on healthcare. Appointments are done not according to capabilities but politically. Many qualified staff change their place from public to private sector due to this unfairness. Efficiency is low at public sector due to torpedoes. Turkey cannot use technology intense treatments due to high price of devices bought from other countries. Some young people can be employed in healthcare as way of increasing staff and complementary healthcare treatments. Treatment focused healthcare management is not successful. Preventive healthcare decreases the costs and increase efficiency. As it was seen in breast cancer treatment previously, many cancer types can be slowed down at early detection. Obesity can be decreased with suitable programs and governments supports by advertisements at TV and news. Sports activities can be supported by governments.

5. Discussion and Conclusion

Promoting the decentralization of healthcare governance to increase competitions of healthcare is a challenge for future to improve efficiency by introducing extending public hospital management structures, and by improving the supply of healthcare staff and patient rights. Greater empowerments of local governments, more financial and administrative authority are expected to be done to decrease bureaucracy barriers and long waiting in Turkey. (Tatar et al., 2011) When Turkey is compared with developed countries like Japan, USA and Canada, Turkey is far behind them according to performance measures and successes factors. These countries have maturated healthcare system and they provide upper level services with high quality. Turkey has still low budget of healthcare in total expenditure and medicines and healthcare devices are mainly imported. Malaysia is a low cost healthcare as Turkey. It is successful at healthcare tourism, increasing living years and decreasing mortality. It is expected to increase the current healthcare

tourism in Turkey as done in Malaysia. Canadian healthcare is mainly supported by governments and Japan has different healthcare with strong complementary methods. The success history of Canada can be an example for Turkey to decrease smoking rates.

The quality of healthcare is definitely low and current performance measures are to be changed to be more quality oriented than quantity. If many patients are treated but not cured, the quality of treatment cannot be questioned. Three minutes "şip-şak" diagnoses are not successful at providing healthcare. But, the quantity oriented healthcare force doctors to treat as many as patients. The political differences in hospitals create many conflicts among staff. It is clear that the effect of politician should be decreased in healthcare. Nursing homes can be opened to take some patients from hospitals for staying with U-Care. The average of stay at hospitals is to be increased to catch international standards. Private or public hospitals should have a negative performance if the same patient goes back the hospital with the same illnesses again. Private and public hospitals should not be paid again by governments in that case. Until now, just patients are criticized but healthcare staff is not well criticized for quality of treatment. As ill person, I have visited the same private hospital two times and both times, I was not cured but prescript with same medicines. The social insurance payment system is to be readjusted about the payments and controls to reach developed countries.

References

Aslan1, I., Çınar O..& Kumpikaite V (2012), "Creating Strategies from TOWS Matrix for Strategic Sustainable Development of Kipaş Group", Journal of Business Economics and Management 13 (1), 95-110.

Aslan2 I., Çınar O., Dursun A.& Güzel D. (2012) "Improving Stock Management in Healthcares to Increase Efficiency" International Journal of Social Science, Volume 5 Issue 7, p. 89-101, December 2012.

FIP-Federal Identity Program(2013) "Benchmarking Canada's Health System: International Comparisons", The Canadian Institute for Healt Information (CIHI),, Canada.)

Huff Post (2013) "These 5 Countries Provide The Best Health Care In The World" http://www.huffingtonpost.com/internationallivingcom/best-countries-for-health-care_b_4773837.html(12.03.2013)

Özer Ö. & Sonğur C.(2012) "Turkey's Position in the World Health Tourism and Its Economic Dimension" Mehmet Akif Ersoy Üniversitesi Sosyal
Bilimler Enstitüsü Dergisi, Yıl: 4 Sayı: 7 2012.

Nadeem E. (2013). Health Care Lessons from Japan. Lessons from Abroad: A Series on Health Care Reform. Fraser Institute. http://www.fraserinstitute.org>.

Maillart L.M., Ivy J.S, Ransom S., & Diehl K.(2008)" Assessing Dynamic Breast Cancer Screening Policies" Operations Research 56(6), pp. 14111427.

MHM-Ministry of Health of Malaysia(2014) "Country Health Plan 2011-2015" Putrajaya, Malaysia, http:www.moh.gov.my.

Krüger K.(2013) "Can a structured electronic medical record with decision-making support improve nursing home quality?", Dissertation for the degree philosophiae doctor (PhD), University of Bergen, Norway)

Klooster, J.K (2013) " User-Tailored E-Health Services." ,De Graad van Doctor-PhD, Universiteit Twente,, Twente, Holland. DOI: 10.3990/1.9789036535243

JaafarS., Noh K.M., Muttalib K.A., Othman N.H., & Healy J., (2013) "Malaysia Health System Review", Health Systems in Transition Vol. 3 No.1 2013

SHGM-Sağlık Hizmetleri Genel Müdürlüğü(2012), DSÖ World Health Statistics 2012, Not: Türkiye verisi 2011 yılına aittir.

Tatar M, Mollahaliloğlu S, Şahin B, Aydın S, Maresso A, Hernández-Quevedo C.(2011) " Turkey: Health system review.", Health Systems in Transition, 13(6):1–186.

T.C. sağlık bakanlığı(2012), sağlık istatistikleri Yıllığı 2011, sağlık araştırmaları genel müdürlüğü, ISBN : 978-975-590-425-2, Sağlık Bakanlığı, Yayın No : 885, Ankara.

TUBİTAK, http://www.tubitak.gov.tr/tubitak_content_files/vizyon2023/si/EK 21.pdfhttp://www.tubitak.gov.tr/tubitak_content_files/vizyon2023/si/EK-21.pdf)

Yoshio Uetsuka(2012) "Characteristics of Japan's Healthcare Systems and the Problems", Japan Society for Healthcare Administration, JMAJ 55(4): 330–333

Tanner, M. (2008). The Grass Is Not Always Greener: A Look at National Health Care Systems Around the World. Policy Analysis, No. 613. CATO Institute.)

TCBYDTA -Türkiye cumhuriyeti başbakanlik Yatırım Destek ve Tanıtım Ajansı(2010) " Türkiye sağlik sektörü raporu", Report, Turkey.)

WHO1 , OECD Health Data 2010, June; World Health Statistics (WHO), 2010

WHO2(2011) " Country cooperation strategy at glance", WHO country page http://www.who.int/countries/tur/en/(04.12.2013))

WHO3 (2012) "Health Service Delivery Profile in Japan", Compiled in collaboration between WHO and Ministry of Health, Labour and Welfare, Japan

WHO4(2012) “World Health Statistics 2012” WHO Library Cataloguing-in-Publication Data, ISBN 978 92 4 156444 1, France.
Wiki1 (2013) “Health care in Canada”, http://en.wikipedia.org/wiki/Health_care_in_Canada#cite_note-16(Access Date:09.12.2013)
Wiki2)2013) “Comparison of the health care systems in Canada and the United States”, http://en.wikipedia.org/wiki/Comparison_of_the_health_care_systems_in_Canada_and_the_United_States(Access Date:09.11.2013)
Wiki3 (2013) “Health care in the United States”, http://en.wikipedia.org/wiki/Health_care_in_the_United_States(Access Date: 09.12.2013))
Wiki4(2014) “Healthcare in Malaysia”, http://en.wikipedia.org/wiki/Healthcare_in_Malaysia(15.02.2014))
Zhang Y. , Berman O.,Verter V. (2009) “Incorporating congestion in preventive healthcare facility network design”, European Journal of Operational Research 198 (2009) 922–935.