Healthcare expenditures in Japan and France

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The sustainability of healthcare systems with the aging of the population is a big concern in many developed countries. Aging of the population will be especially serious in Japan, with the total population decreasing from the present 127 million to 95 million and the aging rate (proportion of people 65 years old or over of the total population) increasing from the present 22 percent to 40 percent in 2050. It is a persistent concern in Japan and France regarding how to make the healthcare system more effective and efficient.

In this paper, we make a comparison of healthcare expenditures and related indices in Japan and France, and try to draw some implications useful for future healthcare reforms in both countries in terms of .innovation, incentive issues and so on.

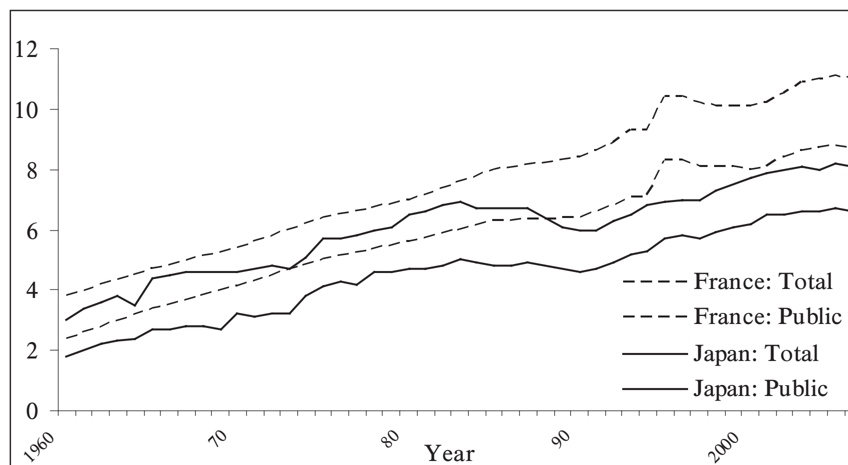
1. Overview of the healthcare systems in Japan and France

Most healthcare services in Japan are provided through the public health insurance system. The total population, except those who receive public assistance, is covered by the public health insurance such as employer-based Health Insurance and municipal National Health Insurance, and there are hundreds of sickness funds (or insurers) linked to a person's employer, occupation, or geographic location. Insured persons cannot choose a sickness fund. The elderly are treated differently from the non-elderly under the Health Service Program for the Elderly (**Note 1**) and Health Insurance for the Elderly aged 75+ since April 2008 (**Note 2**). The private sector is important in delivering healthcare services and maintaining public health. However, the role of the private sector is relatively minor in terms of healthcare financing.

All funds cover a broad range of healthcare services including hospital and physician care, dental care, pharmaceuticals, and even some transportation. The sickness funds also pay some cash benefits, such as sickness allowance and maternity allowance, but society-managed funds of large employers generally pay greater cash benefits than National Health Insurance. Large employers also provide some preventive care, which is not common in Japanese health insurance in general. Gatekeeping is not in place in Japan, and a patient can choose their GP physicians and hospitals.

Both inpatient and outpatient services are provided in Japanese hospitals. While hospitals can enjoy economy of scope on the one hand, on the other hand there is a severe competition in outpatient services between hospitals and GP physicians (Fukawa, 2005). In order to correct excessive competition, it has been considered that hospitals be classified by function and patient flow streamlined in Japan. The Japanese reimbursement system is basically fee-for-service with partial price bundling mainly for chronic diseases of the elderly, and the same nationwide fee schedule is applied to physicians and hospitals. A nationwide feasibility study

Fig. 1 Health Expenditure as percent of GDP in Japan and France



Source: OECD Health Data 2009

Table 1 Long trends of population and healthcare expenditures in Japan and France

	Japan								France					
	Population		TFR	Life expec-tancy	National Health Exp.		OECD Health Exp.(%GDP)		Population		TFR	Life expec-tancy	OECD Health Exp.(%GDP)	
	Million	65+(%)			Trillion Yen	% of GDP	Total	Public	Million	65+(%)			Total	Public
1960	93.4	5.7	2.00	67.2	0.41	2.5	3.0	1.8	45.7	11.6	2.74	70.3	3.8	2.4
1970	103.7	7.1	2.13	72.0	2.50	3.3	4.6	3.2	50.8	12.9	2.48	72.2	5.4	4.1
1980	117.1	9.1	1.75	76.1	12.0	4.9	6.5	4.7	53.9	13.9	1.95	74.3	7.0	5.6
1990	123.6	12.1	1.54	78.9	20.6	4.6	6.0	4.6	56.7	14.1	1.78	76.9	8.4	6.4
2000	126.9	17.4	1.36	81.2	30.1	6.0	7.7	6.2	59.0	16.1	1.87	79.1	10.1	8.0
2008	127.7	22.1	1.34 [a]	82.6 [a]	34.1 [a]	6.6	8.1 [b]	6.6	61.7 [a]	16.4	1.98 [b]	80.9	11.0 [a]	8.7
2030	115.2	31.8	1.24	81.9										
2050	95.2	39.6	1.26	83.4										

a 2007, b 2006
Source: OECD Health Data 2009.

of a kind of prospective payment system (called DPC, **Note 3**) has been conducted since 1998 for inpatient services.

Japanese health expenditures, both total and public, have been constantly lower than that of France, and the difference has been enlarged since the mid 1980s (Fig.1).

The French health care system relies on a combination of public and private supply, even in the hospital sector. Patients benefit from easy access to care (freedom of choice, direct access to specialists) and abundant supply, particularly of self-employed doctors (Sandier, Paris and Polton, 2004). Complementary private health insurance to cover the cost of statutory co-payments is widespread. The 1996 Juppe reform gave an important role to the parliament; since then, an annual Social Security Funding Act defines a national expenditure ceiling for health insurance (ONDAM) in the following year and parliament approves a government report on the future direction of national health policy (Sandier, Paris and Polton, 2004). Since 1997, employees' contributions based on wages have been replaced by a contribution based on all the incomes, which has the character of a tax. In 2000, through the introduction of the Universal Health Coverage (CMU and CMUC) Act, statutory health insurance coverage has been extended to all French residents. In France, different reimbursement systems are applied to physicians and hospitals. RMOs (treatment guidelines) concerning prescriptions represent an indirect mechanism for controlling pharmaceutical expenditures.

Indicators such as life expectancy and life expectancy without disability show that the health of the French population is good. However, France suffers from a high rate of premature male mortality due to risk behaviors as well as smoking and accidents, and social and geographical inequalities in health remains substantial (Sandier, Paris and Polton, 2004). In comparison with France, Japanese life expectancy at birth is longer by almost two years and Japanese heath expenditure as a percent of GDP is lower by three percentage points (Table 1). It is therefore interesting to focus on possible reasons why French health expenditure is higher than the Japanese.

2. Healthcare expenditures in Japan and France

(1) Healthcare resources and utilization

Table 2 shows health care resources in Japan and France. The numbers of physicians per 1,000 people is much higher in France than in Japan, although the density of nurses is higher in Japan and the difference in the density of dentists and pharmacists is relatively small. The number of beds per 1,000 is very high in Japan, and as a natural consequence of the over-supply of beds together with under-developed division of hospitals for acute and chronic diseases, the average length of stay in hospitals is very long in Japan.

(2) Healthcare Expenditures

In 2008, total expenditure on health care in France was estimated at 215.0 billion Euros, and health care consumption accounted for 79.3 percent of that or 11.0 percent of GDP (Duriez, 2009). The rest are expenditures on prevention and activities related to research, teaching, and health administration.

Health expenditures by providers reveal that hospital services amount to 3.8 percent of GDP both in Japan and France, but the other categories are much higher in France (Table 3). It is worth while mentioning that both inpatient and outpatient services are provided in Japanese hospitals. In any case, French health expenditures are higher than Japanese due to higher hospital and/or ambulatory services, higher pharmaceuticals, and higher services in nursing and residential care facilities.

Table 2 Health Care Resources and Utilization in Japan and France: 2007

	Number		Per 1000 population	
	Japan	France	Japan	France
Hospital beds				
Total	1,775,316	440,763	13.9	7.1
Acute care	1,051,193	222,194	8.2	3.6
Psychiatric care	351,188	57,653	2.7	0.9
Long-term care	362,393	67,088	2.8	1.1
Others	10,542	93,828	0.1	1.5
Practising physicians	266,431 [a]	208,249	2.09 [a]	3.37
General practitioners	•••	101,380	•••	1.64
Specialists	•••	106,869	•••	1.73
Midwives	25,775 [a]	17,998	0.20 [a]	0.29
Practising nurses	1,194,121 [a]	476,897	9.35 [a]	7.73
Professional nurses	811,972 [a]	476,897	6.35 [a]	7.73
Associate prof. nurses	382,149 [a]	0	2.99 [a]	0.00
Practising dentists	94,608 [a]	41,422	0.74 [a]	0.67
Practising pharmacists	174,218 [a]	72,509	1.36 [a]	1.18
Average length of stay (days)				
Inpatient total	34.1	13.2		
Acute care	19.0	5.3		
Per capit utilization				
Acute care beddays	2.0	1.0		
Doctors' consultations	13.6 [a]	6.3		

a 2006
Source: OECD Health Data 2009.

Table 3 Current Health Expenditure by Provider: as percent of GDP

	Japan				France			
	1995	2000	2005	2006	1995	2000	2005	2007
Current health expenditure Total	6.4	7.3	8.1	7.9	10.0	9.9	10.9	10.7
Hospital services	3.4	3.7	3.9	3.8	3.8	3.6	3.9	3.8
Public	3.1	3.3	3.4	3.3	3.6	3.3	3.6	3.5
Private	0.4	0.4	0.5	0.5	0.2	0.2	0.2	0.3
Nursing and residential care facilities	0.1	0.2	0.3	0.2	0.5	0.5	0.7	0.7
Public	0.1	0.2	0.3	0.2	0.5	0.5	0.7	0.7
Ambulatory services	2.0	2.1	2.3	2.2	2.8	2.7	2.9	2.9
Public	1.7	1.8	1.9	1.8	2.1	2.0	2.1	2.1
Private	0.3	0.4	0.4	0.4	0.8	0.7	0.8	0.8
Retail sale & medical goods	0.6	0.9	1.2	1.3	1.9	2.1	2.4	2.3
Public	0.2	0.5	0.8	0.8	1.1	1.3	1.5	1.5
Private	0.4	0.4	0.4	0.5	0.8	0.8	0.8	0.8

Source: OECD Health Data 2009

(3) Financing of healthcare expenditures

About 80 percent of health expenditures are publicly financed in Japan and France, although the share of tax revenue is quite low in France (Table 4). More than 10 percent of health expenditures are financed by complementary private insurance in France, whereas the proportion of out-of-pocket expenses reaches 15 percent in Japan. In fact, the proportion of out-of-pocket payments has increased steadily in Japan recently, because patient cost-sharing is so far the most important tool of regulation.

Public health insurance in Japan is currently financed through contributions (individuals as well as employers), government subsidies and out-of-pocket payments (patient cost-sharing + direct patient payment for services not covered by insurance). According to a national source, the proportion of patient cost-sharing in the national health expenditure has been decreased from 40 percent in 1955 to 11 or 12 percent in the 1980s and 1990s, but it has started to increase due to recent healthcare

Table 4 Health Expenditure by Financing Agent

(In percent)

	Percent of GDP		Percent of THE	
	Japan 2006	France 2007	Japan 2006	France 2007
Total	8.1	11.0	100.0	100.0
Public expenditure	6.6	8.7	81.3	79.0
Tax revenue	1.2	0.6	15.4	5.2
Social sec. contribution	5.2	8.1	64.0	73.8
Private expenditure	1.5	2.3	18.7	21.0
Out-of-pocket	1.2	0.8	15.1	6.8
Private insurance	0.2	1.5	2.6	13.4

Source: OECD Health Data 2009.

reforms (**Note 4**). Now, the proportion of patient's cost-sharing to the total health expenditure is about 14 percent in 2007. The source of funds for the national health expenditure is as follows: public funds 36.7 percent, contributions 49.2 percent, and patient's cost-sharing 14.1 percent. Increases in the patient's cost-sharing have been the main tool of controlling health expenditures in recent years in Japan. As out-of pocket payment is high in Japan in terms of both proportion of health expenditure and percentage of GDP from international perspectives, there are such concerns that the present level of patient's cost-sharing (30 percent) could have induced under-utilization of healthcare services among low-income households.

(4) Per capita healthcare expenditure by age group

After the implementation of the long-term care insurance in April 2000, the number of so-called socially induced hospitalization cases especially among elderly patients has been reduced, although not totally eliminated. Fig. 2 shows per capita health expenditure by age group in Japan and France. Japanese health expenditure as percentage of GDP is lower than that of France. Therefore, Fig. 2 can only imply that spending patterns by age group are quite different for the elderly in both countries. Long-term care insurance in Japan clearly has a positive effect for reducing the health expenditures of the elderly. However, Japanese elderly consume relatively higher healthcare expenditures compared to their French counterparts.

The average per capita health expenditure for those who are 65 or over is 3.0 times more than that for 0-64 age group in 2007 in Japan. As a result, 52 percent of the national health expenditures are consumed by those who are aged 65 or over (21.5 percent of the population) and about 30 percent by those who are aged 75 or over (10 percent of the population). Given the rapid ageing of the population, the question of how to finance the cost of health expenditures for the elderly has been a leading issue in recent years.

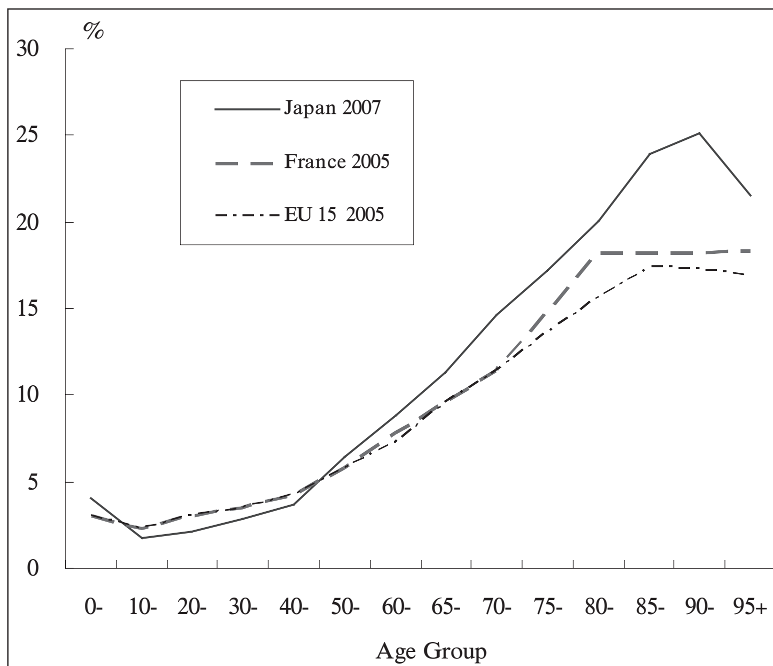
3. Cost containment efforts in Japan and France

(1) Healthcare reforms in Japan

Since the universal coverage of the nation through the public health system in 1961, the benefit level improved considerably in the 1960s and 1970s. However, cost containment has been a big issue in the Japanese healthcare reforms since the 1980s, and reforms in the 1990s featured the pursuit of quality (such as informed consent and patient's choice) as well as cost-containment. It has been more focused on the sustainability of the system and patient-oriented healthcare in the 2000s. Therefore, the control of health expenditures of the elderly has been targeted, as well as the reduction of lifestyle-related diseases especially those caused by obesity. In accordance with higher patient expectations, the measurement and assurance of quality of healthcare services has become an important policy area.

Most healthcare services are reimbursed on an

Fig.2 Per capita health expenditure according to age group as percent of per capita GDP



Source: European Commission (2008) for France and EU15

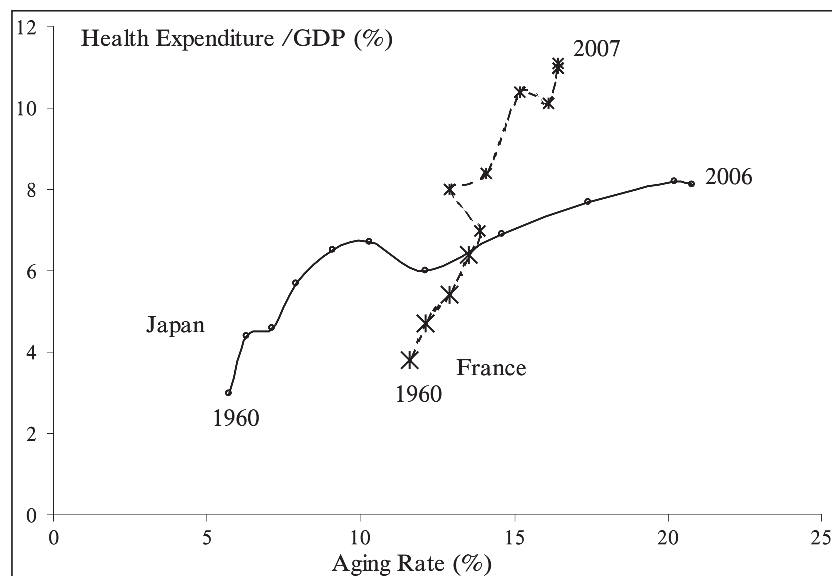
itemized fee-for-service basis in Japan, and the price of each service is specified in the Medical Fee Schedule. The same nationwide fee schedule is applied to GP physicians and hospitals. The fee schedule and the drug standard have been the primary tools used to pursue healthcare reforms in the 1980s and 1990s in Japan. It has become clear, however, that these tools are limited, and other measures are being studied to improve the quality and efficiency of health services concurrently. In order to correct false incentives in the fee-for-service system, a package payment (or partial price bundling) mainly for chronic diseases of the elderly has been introduced since the 1990s. Price bundling is applicable monthly for outpatient care and daily for inpatient care on clinical tests, pharmaceuticals, injections, and nursing charges (inpatient only). Total inpatient per diem is bundled only in special cases such as hospice care. A feasibility study of a prospective payment system has been conducted since 1998 for inpatient services.

People's preference for equality is strong in Japan especially for healthcare services. The average spell of inpatient service is longer than that in other developed countries and this is one of the reasons for increasing health expenditures. One way of improving healthcare performance is through better coordination between inpatient and outpatient care. Main reform issues in the recent Japanese healthcare system are: (1) reorganization of the healthcare service delivery system; (2) reforms of the reimbursement system of medical fees and pharmaceutical pricing system; (3) financing of healthcare for the elderly; and (4) quality assurance of healthcare services and empowerment of patients.

As shown in Fig. 3, the impact of aging of the population has been relatively mild in Japan. This strong contrast between Japan and France shown in Fig. 3 certainly poses several questions including what is the reasonable level of health expenditures. As the elderly to non-elderly ratio of per capita health expenditures is higher, reforming the healthcare system for the elderly has been always focused in Japan. The main issues here are coordination of healthcare services and long-term care services as well as elimination of inappropriate long-term hospitalization. One of the main reasons to introduce the long-term care insurance in 2000 was to reduce the number of so-called socially induced hospitalization cases especially among elderly patients. The key to achieving higher quality and greater efficiency in healthcare, as well as in long-term nursing care, is to make greater use of the dynamism of the private sector (OECD, 2006). However, it is clearly limited to depend on reducing the demand for healthcare by preventing lifestyle-related diseases.

In Japan, activities of insurers have been marginal so far. In a 2006 reform, however, some explicit incentives have been finally placed on insurers to do more preventive activities. Patient's cost-sharing is not only a financing issue but also an incentive issue. Both countries are seeking the right incentive structure for all parties concerned because this is crucial for the sustainable development of the healthcare system. The ways to improve the incentive structure in the healthcare systems lie in inspection and open management.

Fig. 3 Aging rate (X axis) and health expenditure/GDP (Y axis) in Japan



Source: OECD Health Data 2009.

(2) Cost containment efforts in France

The Juppe Plan offered some standard, short-term measures which were aimed at increasing social security revenues or curbing the progression of expenditure in a number of ways (Lancry and Sandier, 1999):

-increasing contributions by pensioners, the unemployed and private doctors;

-reducing coverage rates with an increase of the hospitalization co-payment rate;

-imposing a tax on the pharmaceutical industry;

-targeting the growth rate of hospital and general medicine expenditure to equal general inflation.

The Plan aimed to introduce universal coverage by the health insurance (although this was realized only in 2000), a progressive widening of its financial sources (including a switch from payroll contributions to general tax revenue) as well as control of its expenditure. New supervisory and management bodies were set up, operating above and below existing bodies: councils supervising the finances of the *Securite sociale*, the *Agence national d'accreditation et d'evaluation en santé* (ANAES), the *Unions regionales des caisses d'Assurance-maladie*, and the regional hospital agencies (Lancry and Sandier, 1999). As a long-term measure, the Plan instituted an 'exceptional' income tax for a period of 13 years aimed at discharging the debt, and the tax of 0.5 percent of total income was introduced in 1996.

In the field of hospital care, the issues of quality and cost containment are similar to those in ambulatory care, but the role played by the funds is less important and the state's supervision is more direct (Lancry and Sandier, 1999). Regional hospital agencies are responsible for the planning of facilities and the allocation of resources to both private and public hospitals under the direct supervision of the ministries in charge for health and social security. The accreditation of hospitals and services, as well as the production of guidelines for good medical practice, are assured by the ANAES. The plan emphasizes cooperation between public and private facilities, and encourages hospitals to promote alternatives to hospitalization, as well as to develop health care networks with private doctors (Lancry and Sandier, 1999).

During the last 20 years, cost-containment measures have targeted general health insurance (*Assurance-maladie*) rather than considering health care expenditure as a whole (Lancry and Sandier, 1999). Some of these measures have achieved their objective of improving the finances of general health insurance in the short-term, but this is more the result of psychological influences on people's behavior, rather than a sign of the measures' effectiveness (Lancry and Sandier, 1999). Between 1975 and 1995, the most frequently used cost-containment-measure was increases in cost-sharing (Lancry and Sandier, 1999). The reduction of reimbursement rates, widely used for pharmaceuticals, has been still used during the 2000s despite of its unpopularity, its discretionary application and its minimal long-term effectiveness (Duriez, 2009). The resulting increase in prices to the consumer did not contribute to reducing consumption, but on the contrary, led to the development of complementary insurance (Lancry and Sandier, 1999). The subsequent introduction of global budgets has proved more effective in controlling the expenditures of the general health insurance, but has had no influence on the delivery of care or equity (Lancry and Sandier, 1999).

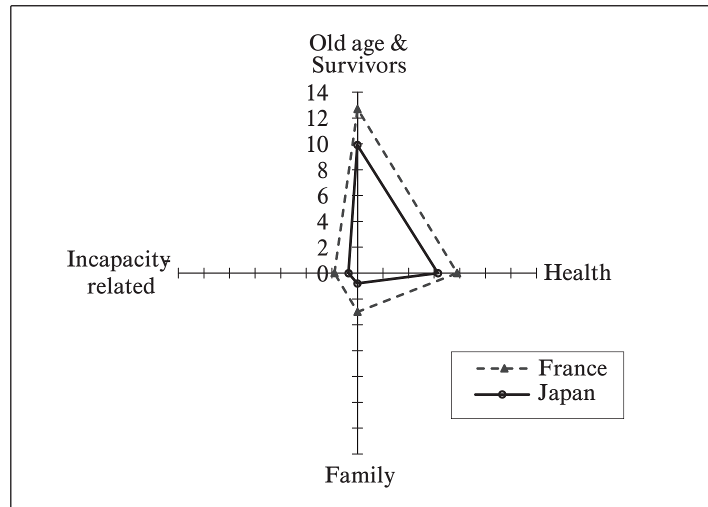
Juppe's 1996 reform has changed the institutional balance of the French health care system, shifting power from the health insurance funds to the state (government and parliament) and from the national to the regional level (Sandier, Paris and Polton, 2004). The hospital reform in 2004 has introduced a new payment system for the hospitals and a new management, the main objectives of the recent reform in 2009 are modernizing, simplifying and clarifying the healthcare supply and the relationship between actors and its governance (Duriez, 2009). The ageing of the population and its impact on healthcare needs and costs is a further area of concern in France.

4. Social expenditure in Japan and France

Japanese social expenditures through its public program were 18.6 percent of GDP in 2005, which was far below 29.0 percent in France. Fig. 4 shows some components of the social expenditure in Japan and France: Old age and survivors, Health, Family, and Incapacity-related. It is rather clear from this chart that family benefit and incapacity-related benefit are underdeveloped in Japan. Compared to France, Japanese social expenditure (public) level is low due to (a) still low level of public pension benefit, which is expected to continue increasing after 2004 reform; (b) low level of health expenditure; (c) quite low level of family and incapacity-related benefits, and (d) low level of active labor market programs as well as unemployment benefit.

Public programs are dominant as social protection in Japan and France. However, public programs are not the only source for social expenditure, and the functions of social security should be considered from a broader perspective including the roles of companies and families. Some parts of healthcare services are paid outside the public system. The role of private health insurance, which so far remains

Fig.4 Social protection (Public) as percent of GDP: 2005



Source：OECD(2008), Social Expenditure Database 1980-2005.

marginal, is expected to grow in Japan as patient's cost-sharing has been increased in general to 30 percent of healthcare costs (with an upper ceiling). Aging of the population together with a declining working-age population in Japan inevitably focuses on the cost of old age in general. The cost of public programs for the elderly (65+) concerning healthcare and long-term care will probably reach to a comparable level of public pension benefit.

5. Discussion

Japan enjoys the lowest infant mortality rate and the longest life expectancy at birth among the major developed countries. In comparison with France, Japanese health-related output indices are better with lower healthcare expenditure. However, we should be careful in drawing any conclusions, because the infant mortality rate and life expectancy at birth are no longer proper indicators for evaluating healthcare systems. Japan's healthcare delivery system and patterns of patient flow raises many questions such as quality issues and overuse of pharmaceuticals. There are indeed many problems in the Japanese healthcare system. However, the performance of the Japanese healthcare system is not so bad as to require the system to be fundamentally redesigned.

Universal healthcare coverage through a public health insurance scheme with fee-for-service payment is the basic definition of the Japanese system so far, which has contributed to the equitable distribution of health services and relieved families from old-age support (Fukawa, 2008). The administrative determination of prices and the fee-for-service remuneration encourage practitioners to increase the supply (Duriez, 2009). Several mechanisms are necessary to make the fee-for-service payment system work, including utilization reviews (to control the volume of service), and regulations (to minimize moral hazards tempting both physicians and patients). Even if the scale of utilization reviews is limited, the existence of the examination of fee claims, through third-party examination organizations as well as checks by the insurers, functions to contain health expenditure increases preventing excessive utilization and fraud (Fukawa, 2007).

As implied from Fig.2, it is safe to say that there is some room to reduce healthcare expenditures for Japanese elderly. Taking Tables 2 and 3 into consideration, French healthcare expenditures are higher than that of Japan due to higher physician density and higher pharmaceuticals. Both countries are seeking the right incentive structure for all parties concerned because this is crucial for the sustainable development of the healthcare system. New approaches in reimbursement systems such as RMOs and DPC are typical examples of this direction. Although information asymmetry is inevitable in the healthcare system, the fact that patients rights and choices have not been well observed explains, at least to some extent, why quality of healthcare services are not widely published in Japan so far. Prevention and the empowerment of patients are gaining importance in Japan as key factors to advance higher quality and greater efficiency in the healthcare system. Japanese universality concerning healthcare delivery and pricing of the services provided may have some significant effects in terms of preventing the occurrence of moral hazard on both service provider sides and service user sides.

Patient's involvement is more and more needed in order to achieve higher quality and greater efficiency in the healthcare system. Patients are free

to choose any healthcare institutions and the prices of the services provided there are basically the same. Priority has been given to cure rather than prevention and to equality in healthcare delivery. However, the need to balance patients' freedom and cost containment makes it necessary to consider the so-called gate-keeping function of primary care physicians and to focus more on prevention of lifestyle-related diseases. Prevention is important not only for averting cost-push pressures to health expenditure but also for people's quality of life. It is quite natural from the consumers' point of view to demand coordination between healthcare and long-term care services.

The scale of social security is determined by the degree of solidarity and public-private interaction. It is all the more important to consider a desirable division of roles between the public system and a private arrangement within each country's context. Solidarity contribution is required to finance solidarity benefits in social security. The prerequisite for this is that the social security system is consistent and fair, and purpose of the system is supported by the general public. The existing coupling of funding to the wages and salaries has shown weakness, not fully taking the changes in the job market into account. However, there is no easy solution, and options such as reducing the benefit catalogue of the public health insurance and relying more on private health insurance should be based on careful deliberation.

The financial sustainability of the health care system is a perpetual source of concern, particularly due to the fact that actual expenditure consistently exceeds the targets set. Until now, the high cost of the health care system has been accompanied by high levels of access to health care, but the demographic change expected within the health professions may lead to an increase in explicit rationing in future years.

The sustainability of healthcare systems depends on the attitude of the people. People wish for quality healthcare services, and they will pay higher prices for better healthcare services. People will accept greater responsibility for lifestyle-related diseases. Whether to put the stress on solidarity or on self-help is not a matter of choice but a matter of weight (Fukawa, 2007). The scale of social security does matter, but the utility of the people will differ depending on contribution and benefit structure of social security, even if the scale of it is the same.

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Notes

(Note 1) The Health Service Program for the Elderly (HSE) was first introduced in 1983 to equalize the burden of healthcare costs of the elderly among various health insurances and to ask elderly patients for reduced cost-sharing. Membership in this plan was those who were aged 70 or over as well as disabled persons aged 65-69. These persons may be in any fund, although they are most likely to be in National Health Insurance. The cost-sharing of the elderly patients (70+) was increased from a fixed amount to 10 percent of the cost in 2000. The eligibility to the HSE has gradually increased from 70 to 75 years old in a 2002 reform. Under this program, patients' cost-sharing is 10 percent (20 percent for high-income elderly) of the expenditure, although the patient's cost-sharing in excess of a certain amount is covered by the program.

(Note 2) A new health insurance for the elderly aged 75 or over has been implemented since April 2008. Under the new scheme, all the elderly including those who used to be dependent have to pay contributions.

(Note 3) The Japanese DPC (Disease Procedure Combination) system is basically a per diem payment with some elements of prospective payment.

(Note 4) Patient's cost-sharing used to be different among different schemes, but it has been unified to 30 percent of healthcare costs for non-elderly patients and 10 or 20 percent for elderly patients. Moreover, there is an upper ceiling on patient's cost-sharing, and all sickness funds pay 100 percent of expenses above the upper ceiling. This cap is lower for low-income persons and those who have already paid the maximum for three months within a year. Because of the cap, patients' cost-sharing used to be low.

References

Busse R., J. Schreyögg and Gericke C. (2005). Health Financing Challenges in High Income Countries. World Bank Discussion Paper.

Busse R. and Riesberg A. (2004). Health Care Systems in Transition Germany. European Observatory on Health Systems and Policies.

Campbell J. C. (1996). The Egalitarian Health Insurance System. in Ikegami and Campbell (ed.) Containing Health Care Costs in Japan, Michigan.

Duriez M. (2009). The French Healthcare System. The Japanese Journal of Social Security Policy, 8 (2).

Freeman R. (2000). The politics of health in Europe.

Fukawa T. (2002). Public Health Insurance in Japan. World Bank Institute Working Paper.

Fukawa T. (2005). Some structural issues in the Japanese social security system. The Japanese Journal of Social Security Policy, 4 (2), 67-75.
Fukawa T. (2007). Macro evaluation of the Japanese healthcare system in comparison with Germany. The Japanese Journal of Social Security Policy, 6 (1), 31-42.
Fukawa T. (2008). Financing of the healthcare systems in Japan and the UK. The Japanese Journal of Social Security Policy, 7 (1), 13-24.
Gunji A. (2001). Regional differences in health expenditures. (ed. Gunji) Toyo Keizai. (in Japanese)
Henke K.D. and J. Schrey?gg (2005). Towards sustainable health care systems: Strategies in health insurance schemes in France, Germany, Japan and the Netherlands. Second edition. International Social Security Association.
Hsiao W. C. (1996). Costs-The Macro Perspective. in Ikegami and Campbell (ed.) Containing Health Care Costs in Japan, Michigan.
Ikegami N. and J. Campbell (2004). Japan's health care system: containing costs and attempting reform, Health Affairs. 23(3), 26-36.
Institute for Health Economics and Policy. (2009). Health Related Data for France 2008. (in Japanese)
IPSS (2006). Population Projections for Japan: 2006-2055.
Lancry P. J. and S. Sandier (1999). Twenty years of cures for the French health care system. in Mossialos E. and J. Le Grand eds. Health Care and Cost Containment in the European Union, Ashgate.
Lee K, K. Buse and S. Fustukian eds. (2002). Health Policy in a Globalising World, Cambridge.
Mooney G. (1996). An international perspective on health services reform. J. Japanese Society on Hospital Administration, 33(2), 81-107.
Mossialos E., A. Dixon, J. Figueras and J. Kutzin, eds (2002). Funding health care: options for Europe. Open University Press: Buckingham.
Mossialos E. and J. Le Grand eds. (1999). Health Care and Cost Containment in the European Union, Ashgate.
Mossialos E. and Thomson S. (2002). Voluntary health insurance in the European Union. In Mossialos, Dixon, Figueras and Kutzin (eds.) Funding health care: options for Europe, Open University Press.
OECD (1997). OECD Economic Surveys 1996-1997 Germany.
OECD (2002). Measuring Up: Improving Health System performance in OECD Countries.
OECD (2004). Towards High-Performing Health Systems.
OECD (2009). OECD Health Data 2009.
Oliver A. and E. Mossialos (2005). European health system reforms: looking backward to see forward? Journal of Health Politics, Policy and Law, 30(1).
Robinson R. (2002). User charges for health care. In Mossialos, Dixon, Figueras and Kutzin (eds.) Funding health care: options for Europe, Open University Press.
Saltman R.B. and Figueras J. (1998). Analizing the evidence on European health care reforms. Health Affairs 17(2) : 85-108.
Saltman R., R. Busse and J. Figueras eds. (2004). Social health insurance systems in western Europe. Open University Press.
Sandier S., V. Paris and D. Polton. (2004). Health Care Systems in Transition France. European Observatory on Health Systems and Policies.
Smith P. C. (2004). Health care reforms in Europe and their implications for Japan. The Japanese Journal of Social Security Policy, 3 (2), 80-95.
WHO (1997a). Re Thinking Reform: Towards Strategies for PHC in the 21st Century.
WHO (1997b). European Health Care Reform: Analysis of Current Strategies..
WHO (2000). The World Health Report 2000-Health system: improving performance.

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