# Japanese economy in the age of Low Fertility and the significance of Asian Unification

A New Growth Scenario of Japanese economy and society under demographic and geographic changes

# Yasuhiko Ebina Ph.D

#### Content

## Preface

- . The arrival of the age of Low Fertility in Japan
- 1. What is the age of Low Fertility?
- 2. The Low Fertility and Japanese economy and society
- . Anticipating results of Low Fertility on Japanese economy and society
- 1. The reduction of domestic market
- 2. The decrease of the growth potentiality
- 3. A possibility of the collapse of regional economies and societies
- 4. The unequilibrium between active generation and future generation
- 5. The expansion of the deficit in the social security
- 6. The possibility of financial crisis
- . The way of the regenaration of Japanesae economy in the age of Low Fertility
- 1. The "Social Growth"
  - (1) The spontaneous development of national economy under globalization
  - (2) Putting the importance on SCINs (Social Cultural Intellectural Needs)
- 2. The creation of "New Industries and Ventures"
  - (1) The scale of SCINs market
  - (2) The emergence of SCINs related industries
- . The significance of Asian Unification to Japanese economy and society
- 1. The mega-trend of the unification in Asian economy
  - (1) The emergence of Asian Business Economic Zone
  - (2) The formation of FTA
  - (3) The arrival of the age of Asian Unification
- 2. Asian Unification and Japanese economy
  - (1) The effect on macro economy
  - (2) The effect on industries
  - (3) The effect on enterprises
- 3. The significance of Asian Unification for the regeneration of Japanese economy
  - (1) An adjustment model
  - (2) A symbiosis model
  - (3) Some issues for symbiosis economy and society

## Preface

From the medium and long-term viewpoint, there are two issues that Japanese economy and society are going to encounter. One issue is the arrival of the age of Low Fertility. Another one is the arrival of an age of Asian Unification namely "Asian Community."

It goes without saying that the low fertility rate will bring about the decline of Japanese economy and society, if there is no change in other conditions. Because there will be a possibility that Japanese economy and society will fall not only into decline but also into even "crisis" owing to the reduction of domestic market, the decrease of growth potenciallty, the collapse of regional economies and societies, the unequilibrium between active genaration and future genaration, the expansion of the deficit in the social security, and the financial crisis under the age of low fertility.

On the other hand, the unification of Asian economy has a possibility to accelerate the decline of Japanese economy and society, because there is steep emergence of Asian economy on the background of its unification necessarily resulting in a possibility of the "hollowing" of Japanese economy. This scenario will be more evident especially in regional economies through the competition with Asian manufacturing in domestic market and the advancement of Japanese enterprises to Asian countries accompanied by the decrease of domestic production and employment.

How can we avoide such kinds of decline and crisis in Japanese economy and society which will owe its roots to the low fertility and how can we regenarate Japanese economy even under Asian Unification? The solutions of these problems will depend on how we can find the way oriented toward new growth scenario of Japanese economy and society under new demographic and geographic surroundings.

In conclusion, the key factor is the concept of a symbiosis model. Because new growth scenario will depend largely on whether Japan adopts a symbiosis model in the age of Asian Unification or not. A symbiosis model means that Japanese industries and enterprises not only hold present value-added concept consisting of old needs oriented value sources namely price productivity technology competitiveness, but also adopt new value-added concept consisting of SCINs (Social Cultulal Ietellectual Needs) oriented value sources namely nonprice competitiveness (quality security etc) and noncommodity competitiveness (sense intelligence culture etc).

Why does a symbiosis model contribute to the solution of problems and combine to

manifest a new growth scenario? The answer is as follows. Because SCINs on which a symbiosis model puts importance have two important characteristics of which one characteristic has relationship with the creation of Japanese new competitiveness against Asian countries on the one side and another characteristic has relationship with the regenaration of Japanese economy and society through the "Social Growth" even in the age of low fertility on the other.

It should not be forgotten that the adoption of symbiosis model requests for Japanese economy and society to address some issues. Firstly, symbiosis economy and society needs the "Structural Reforms" not only in the field of Japanese economy but also in the field of Japanese society. Because the "Srtuctural Reforms" needs both of economic reforms and social reforms for the "Social Growth" and "New National Land Planning." Secondly, Japanese enterprises need to adopt new business model which puts the importance on business ethics-for instance CSR (Corporate Social Responsibility). Thirdly, Japanese society needs to recover social stability and vitality which owes especially to the role of local societies expected to contribute to the provision of both the occupational opportunities for youth and the life worth living by youth. Fourthly, it should be stressed that symbiosis model be centered on education accompanied by the ethics education of the next generation and borderless education comprised of both foreign students and domestic students. Fifthly, we should adopt the strategy by which we will be able to use regional institutions and treaties in Asian Unification to avoide the isolation of Japanese economy especially in the North East Asia. Sixthly, we should respect for the general value transcending racial value not only for the symbiosis but also for the unification in Asia. Lastly, the issues mentioned above need to be challenged by government's policies including not only the Central government but also the local governments.

The construction of this article is as follows.

- 1. The arrival of the age of Low Fertility
- 2. The result of Low Fertility on Japanese economy and society
- 3. The way of the regeneration of Japanese economy and society
- 4. The significance of Asian Unification for the regeneration of Japanese economy and society

. The arrival of the age of Low Fertility in Japan

Japanese demographic condition is very severe. Then firstly we should study how it is severe and what effect it will bring on Japanese economy and society.

# 1. What is the the age of Low Fertility?

Japannese economy and society is going to reach the age of Low Fertility accompanied by rapid decrease of population. Japanese total fertility rate (Note 1) is 1.29 in 2004. If such a kind of the low fertility rate will continue in the future, the population of Japan will dramatically decrease. According to the estimate of NIP & SSR (National Institute of Population and Social Security Research), Japanese population will decrease from 127.7 million in 2004 (as of October 1st) to 100.6 million in 2050 even in the case of medium variant (under 1.38 in the total fertility rate) and it will drastically decrease from 127.7 million in 2004 (ibid) to 92.0 million in 2050 in the case of low variant (under 1.10 in the total fertility rate).

Then, if we want to avoid such a rapid decrease of population, we should pull up the total fertility rate in the near future. Will there be any possibility of raising this rate in the near future? Unfortunately there will be little possibility. According to the estimate of NIP & SSR, Japanese actual total fertility rate has been steeply decreasing from near 4.0 in 1950 to 1.29 in 2004 and Japanese projected total fertility rate will continue through the current low fertility rate untill 2050 in the most possible case.

## 2. The Low Fertility and Japanese economy and society

It will be easy to presume that such a kind of low fertility will bring up severely effect on the Japanese economy and society in the near future. Firstly, the decrease of youth population owing to the low fertility will diminish the potentiality of economic growth, as youth population decisively needs to sustain Japanese economy and society. As a result, it is predicted that Japanese share of GDP comparing to U.S.A. shall GDP will decrease from 38% in 2002 to 16% in 2050 according to the estimate of NIRA (National Institute for Research Advancement). Moreover Japanese economic position will be broadly outdone by Chinese economic position, because it is predicted that China shall proportion of GDP comparing to the U.S.A. shall GDP will increase from 13% in 2002 to 166% in 2050. By the way, Japanese decline will not be restricted only to the field of the economy. There will be a possibility of the decline of general strength of the nation

(Note 2), because there is a close connection between the declining of the economy and the declining of general strength. For instance, it is predicted that the index of Japanese general strength of the nation will decrease from 29.4 in 2000 to only 8.4 in 2050 giving way to a steep increase of Chinese general strength of the nation of which the index will mark up from 44.7 in 2000 to 100.0 in 2050 according to the estimate of NIRA, too.

Secondly, the low fertility has a possibility of the destruction of Japanese tradition and value in society, culture and environment. Because the unsustainability of youth employment, the disturbance of the peace and order and the collapse of the family and community which will be brought about by the low fertility have the possibility of producing vicious effect on Japanese tradition and value in society, culture and environment.

(Note 1) The fertility rate = the number of children per woman during her lifetime. (Note 2) Genaral strength of the nation consists of population, GDP and military power.

# . Anticipating results of Low Fertility on Japanese economy and society

We should study severe effects of Low Fertility on Japanese economy and society especially focusing on Japanese economy in more detail. There are six factors in the effect owing to Low Fertility. First factor is the reduction of domestic market. The second one is the decrease in the growth potentiality. The third one is the possibility of the collapse of regional economies and societies. The fourth one is the unequilibrium between the active genaration and the future genaration. The fifth one is the expansion of the deficit in the social security. The last one is the possibility of financial crisis.

### 1. The reduction of domestic market

Above mentioned, it is estimated that Japanese population will decrease from 127.7 million in 2004 (as of October 1st) to under 100.6 million in 2050 even in the case of medium variant. From the viewpoint of the demography, we should pay attention not only to the decrease in the population but also to the change in the structure of the population. The change in the structure of the population means the arrival of an age of low fertility accompanied by the aging society. It is estimated that the number of persons who are over the age of 65 will increase from 24.9 million in 2004 (ibid) to 35.9

million in 2050 whereas the number of persons who are in the active generation (ranging from 15 age to 64 age) will decrease from 85.1 million in 2004 (ibid) to 53.9 million in 2050 (Note 1).

It is not so difficult to assume that such a decrease in the population accompanied by the change in the structure of the population will bring about the decrease of the demand and the reduction of the market which will lead to the decrease of economic growth. For instance, it is reported that the amount of consumption per head will be decreased to 7.1% between 2005 and 2020 resulting in the decrease of 6.7% of GDP (Note 2).

But it is noticeable that the effect of the decrease in population and the change of demographic structure, especially the effect of the decrease in the active generation, will be related not only to Japanese domestic market but also to Japanese growth potentiality.

# 2. The decrease of the growth potentiality

There are two functions in this factor contributing to the decrease of Japanese growth potentiality. One is the function of the decrease in labour forces. Another one is the function of the decrease in family savings ratio. First, let shanalize the former function. The decrease of the active generation from 85.1 million in present to 53.9 million in 2050 will affect not only the demand side but also the supply side. This means we will be able to acquire only 36.7 million labours on active work in 2050 comparing to 57.9 million labours on active work in 2004 (as of October 1st), if the ratio of active work (that is manpower ratio) will continue on present level ratio, namely 68% (Note 3). It goes without saying that such decrease of labour on active work will necessarily pull down Japanese growth potenciality. This is because, even if there will be a little increase of productivity per labour, it will be inevitable that the ratio of decrease of labour on active work will surpass the ratio of the increase of productivity per labour resulting in minus effect on growth potentiality in net base under the condition that there will be no change in other factors which have effect on Japanese growth potentiality (Note 4).

Secondly, let's analize the latter function. Even now, family savings ratio in Japan is going to decrease owing to the arrival of the aging society in which family savings are withdrawn. For instance, its ratio has decreased from 14.6% in 1991 fiscal year to 6.2% in 2002 fiscal year. We can find how the level of 6.2% is low if we compare it to levels in

France (11.5%) and Germany (10.1%). Then, even now family savings ratio affects the Japanese growth potentiality toward the decrease because the ratio of family savings ratio has a connection with the ratio of the increase of capital according to the theory of growth accounting (Refer to Note 4). Moreover there will be the possibility that Japanese family savings ratio will reach to 0% even in 2010 according to the arrival of more steep aging society. It goes without saying that 0% will have a decisive bad effect on Japanese growth potenciality accompanied by the possibility of even minus growth ratio in the near future.

In conclusion, according to the long-range prediction of Japanese economy, it is predicted that Japanese growth rate (real base) will be even under 0.5% per year from 2000 to 2050 even in the case of medium variant owing to the two reasons mentioned above. Moreover, it is predicted that Japanese growth rate (real base) will be limitlessly near to 0% or even minus in the worst case even in 2010 on the background of the decrease of the growth potentiality owing to the decrease of the amount of active labour and 0% family savings ratio. For instance, even Japanese government calculates, as a test, that the ratio of Japanese growth potentiality will decrease from about 2% (average base per year) in the 1990s to 0.2 ~ 0.4% (ibid) in the 2010s till the 2040s, if there will be no chanege in other factors which have effect on Japanese growth potentiality (Note 5).

## 3. A possibility of the collapse of regional economies and societies

Neverthless, even in such kind of stagnation economy, we should not neglect the fact that there will be a possibility of the expansion of the regional divide. For instance, there will be two kinds of districts with even under 1% growth rate (Note 6). There is a group of districts of which annual growth rate will be over 1.0% (national average rate), namely in the range from 1.0% to 1.1%, consisting of (a) only three mega-polis districts which belong to the metropolitan district, the central part of the island and the Kansai district accompanied by deep industrial clusters. On the other hand, there is another group of districts of which annual growth rate will be under 1.0%, namely in the range from 0.3% to 0.8%, consisiting of (b) many under-populated districts which belong to Hokkaido, Tohoku, North Kanto, Hokuriku, Chugoku and Kyusyu•Okinawa (Note 7).

As a result, there will be a great divide in regional GDP in the near future. For instance, it is predicted that the difference in regional GDP (real base, per person)

between the maximum and the minimum will expand from  $\pm$  1.4 million in 2000 to  $\pm$  2.3 million in 2025 (Note 8).

If the prediction mentioned above is correct, we will be unable to avoid the possibility that Japanese decline will be brought about just from the stagnation or the corruption in the worst case of regional economy and society in the near future.

# 4. The unequilibrium between active generation and future generation

We should not neglect the fact that there is a far serious problem in our society. That is the unequilibrium between active genaration and future genaration from the viwpoint of the demography. As already mentioned above, the low fertility brings about a decrease of Japanese population not only accompanied by steep decrease of the younger genaration but also accompanied by steep increase of aging generation. As a result, there are two kinds of the unequilibrium among genarations in Japan (Note 9). One is the unequilibrium between youth and the aged on the same active generation. For instance, in the case of youth (for instance, 30 years old), the amount of net tax burden which will be payed in their genaration is near to +\$300 thousand in a genaration compared to about \$50 thousand in the case of the aged (for instance, 65 years old). Another one is the unequilibrium between the active genaration and the future genaration. For instance, in the case of yourth in the future genaration, the amount of net tax burden which will be payed in their genaration will be near to +\$400 thousand even compared to about +\$300 thousand in the case of youth in the active genaration.

## 5. The expansion of the deficit in the social security

The effect on Japanese economy and society owing to Low Fertility has many influences against the life of the people. Especially, the unequilibrium between the active generation and the future generation mentioned-above has many severe influences against the life of Japanese peoples. The most typical influence is on the social security problem. It is estimated that the amount of deficit in pension budget will reach ¥ 117 trillion in 2030, if there will be no change in payment and burden condition (Note 10).

Beside deficit problem there will be severe unequilibrium problem namely the Payment and Burden condition (Note11). For instance, peoples belonging to the future

generation who have been born after 1982 are obliged to bear  $\pm$  52,230 thousand as net burden (net burden = burdens benefits) throughout their life whereas peoples belonging to the active generation who have been born until 1941 being over 60 years old by 2001 are able to get  $\pm$  64,990 thousand as net payment (net payment = benefits burdens) throughout their life.

# 6. The possibility of financial crisis

There are many pessimistic predictions concering Japanese national debts. We will introduce two kinds of predictions that are thought as the most important predictions in relation to Japanese economy in the near future.

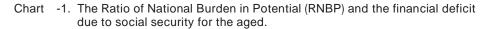
Firstly, there is a pessimistic prediction concerning central government debts. The balance carried forward in government bonds at the end of 2004 fiscal year exceeded  $\pm$  781,552 billion in the form of long term government bonds ( $\pm$  499,014 billion) and another government debts ( $\pm$  282,538 billion) (Note12). This amount is 157.5% of GDP in 2004 fiscal year. It is predicted that the amount of the balance carried forward even in long term government bonds at the end of 2025 fiscal year will reach  $\pm$  1,200 trillion (the ratio to GDP will be about 180%) (Note 13).

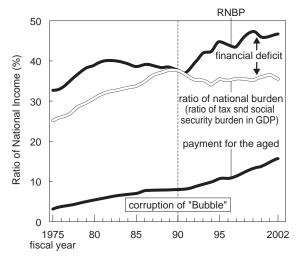
Secondly, there is another pessimistic prediction if we add another national debts which is more serious; because there are "Unrealized Burdens (potential burdens in the future that will be inevitably generated by future government expenditure) "which will consist of medical expenses, welfare expenses and pension payments. How can we calculate the amount of "Unrealized Burdens"? From a theoretical viewpoint, we can calculate it according to the theory of Professor Laurence J. Kotlikoff (Note 14). According to his theory we can substantially calculate it. For instance, the amount of "Unrealized Burdens" in U.S.A is predicted at about ¥7,150 trillion (Note 15). By the way, in the case of U.S.A, the total fertility rate is near to 2.0 even in the present (Note 16) resulting in the increasing of population (Note 17).

Then we can easily suppose how there will be unbelievable amount of "Unrealized Burdens" in Japan facing far lower fertility rate compared to U.S.A by visualizing the example in the case of U.S.A. And we should not neglect the fact that this "Unrealized Burdens" (Note 18) owes mainly to the financial deficit in social security for the aged in the case of Japan (See Chart -1).

Because of the above-mentioned reasons, we cannnot avoid the possibility of

Japanese financial crises in the near future, if there will be no change in payment and burden condition (Note 19).





(Source) Takashi Koshio <sup>r</sup> The decrease of population needs "small government".
(Nihonkeizai Shinbun October 4th, 2005)

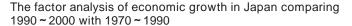
- (Note 1) Refer to NIP & SSR (National Institute of Population and Social Security Research) [URL]http://www.ipss.go.jp/
- (Note 2) Refer to Asahi Shinbun May 4th, 2003.
- (Note 3) Refer to Tadashi Nakamae "Seek wisdoms of many people" (Nihonkeizai Shinbun January 6th, 2004).

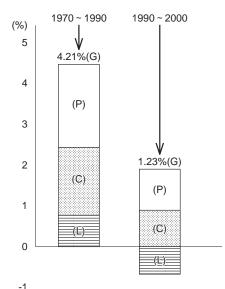
(Note 4) According to the theory of growth accounting, the ratio of growth in potential consists of three factors mentioned below.

The ratio of growth in potential = The ratio of capital increase + The ratio of labour force increase + The ratio of the increase of productivity including productivity per labour.

If we analyze those factors which contributed to Japanese actual growth rate (real base) accoding to the above-mentioned theory, the factor of labour force pulled down Japanese growth rate as the minus factor (See bellow chart). Then if the number of labours on active work will decrease in the near future, Japanese growth potentiality will decrease near to zero, if there will be no change in another conditions.

By the way, Ministry of Health, Labour and Welfare predicts that the number of labours on active work will decrease from 66.5 million in 2004 to 56.0 million in 2030 resulting in about 0.6% of growth rate (per year), if there will be no change in labour policy (In this prediction, Ministry of Health, Labour and Welfare assumes that the ratio of active work is 78%.). On the other hand, it predicts that, if there will be positive labour policy for instance, advancement policy for the working of women, the aged and foreigners, the amount of decrease will be kept at about 5 million resulting in over 0.6% of growth rate (ibid). (Refer to Nihonkeizai Shinbun July 13th, 2005.)





- (G) = The ratio of growth(per year, average)
- (P) = The degree of contribution to growth owing to the ratio of the increase of productivity including productivity per labour
- (C) = The degree of contribution to growth owing to the ratio of capital increase
- (L) = The degree of contribution to growth owing to the ratio of labourforce increase

(Source) The weekly magazine Diamond " Japanese economy will regenerate " (Diamond September 10 2005)p.33

- (Note 5) Refer to Cabinet Office <sup>P</sup> Annual Report on Japanese economy and Public Finance a [2003] p.187 ~ 204.
- (Note 6) For instance, Central Research Institute of Electric Power Industry predicts that Japanese growth rate (real base) will be 1.0% per year from 2000 to 2025 (Refer to Central Research Institute of Electric Power Industry <sup>r</sup> A long range prediction of Japanese economy and energy untill 2025 J (URL).
- (Note 7) Ibid.
- (Note 8) Ibid. But it should be noticed that even in mega-polis districts, there will be the possibility of stagnation due to the mismatch between the decrease of younger labour force and high-technology industries accompanied by younger labour force scarcity (Refer to Akihiko Matutani <sup>r</sup> Spontaneous development of regions J [Economist January 4th, 2005] p.29
- (Note 9) Refer to Aran. J. Auerback, Laurence. L. Kotlikoff and Willy. R. Leibfritz <sup>®</sup> The international Comparison of general accountings a (PDF) 16/38.
- (Note 10) Refer to Akihiko Matutani <sup>r</sup> An affluent society under minus growth (Chuokouron February 2004) p.240 ~ 241.
- (Note 11) In this case, the Payment consists of benefits arising from government consumption and government investment and the benefits due to social security. The Burden consists of burdens accrued due to income tax, consumption tax and social sesurity burden.(Refer to Cabinet Office Fannual Report on Japanese economy and Public Finance [2003] p.211.)
- (Note 12) Refer to Asahi Shinbun June 25th, 2005. Yet there is another governmental bebts cosisting of local government bonds. The amount of local government bonds reached ¥ 203 trillion (estimated) at the end of 2004 fiscal year even only in the long term bonds.
- (Note 13) Refer to Central Research Institute of Electric Power Industry A long range prediction of

Japanese economy and energy untill 2025 J (URL). But we should not neglect the fact that there are refutations against the method of calculation inducing these kinds of high debt ratio argument. Opponents insist that they have an opposing argument owing to the reason why supporters adopt only governmental debt and neglect its assets. Then if we intend to estimate "net debt ratio," we need to use the statement of assets and liabilities of Japanese government. According to the statement of assets and liabilities of Japanese government in the end of 2003 fiscal year, the amount of assets is 696 trillion (the ratio of GDP; 140.9%) and the amount of liabilities is 941 trillion resulting in 245 trillion of net debt amount (the ratio of GDP; 50.0%) (Refer to Mr. Kouichi Mizoguchi "An angle of finance" [Nihonkeizai Shinbun November 30th, 2005]). Nevertheless I think that there is no need to change the stance for financial crisis in Japanese government, because there is a decisive deference concerning the cocept of "assets" between governmental finance and private enterprise accounts owing to the reason why there are many restricts in the disposal of assets in the case of government whereas there is no restricts in the disposal of assets in the case of private enterprise (Refer to ibid and Yomiuri Shinbun March 9th, 2006).

- (Note 14) The identity of Professor J. Laurence Kotlikoff is as follows. The burden of next generation =
  The amount of governmental expenditure anticipated for future + The amount of
  government debts in present + "Unrealized Burdens" (potential burdens that will accrue for
  the future in which will be inevitably burdened by future government) The burden of
  present generation. (Refer to Motoshige Ito "The public sector which is key factor of the
  regeneration of Japanese Economy" [Chuokoron October 2004] p.170 ~ 178.)
- (Note 15) Motoshige Ito "The public sector which is key factor of the regeneration of Japanese Economy" (Chuokoron October 2004) p.170 ~ 178
- (Note 16) J. Laurence Kotlikoff "Japanese unequibility is biggest" (Nihonkeizai Shinbun, Octorber 6th 2004)
- (Note 17) It is estimated that the population in U.S.A. will increse 0.1 billion from present to 2050 (Motoshige Ito "The public sector which is key factor of the regeneration of Japanese Economy" [Chuokoron October 2004] p.170 ~ 178).
- (Note 18) Japanese government adopts the concept namely "the Ratio of National Burden in Potencial" (RNBP) as a substitution of Kotlikoff concept namely "Unrealized Burdens." The Japanese government insists that RNBP consists of the ratio of ntional burden (namely the ratio of tax and social security burden in GDP) + the ratio of financial deficit in GDP. And it predicts that Japanese RNBP will increase from 24.9% in 1970 fiscal year to over 60% in 2025 fiscal year through 47.1% in 2003 fiscal year. (Refer to Cabinet Office Fannual Report on Japanese economy and Public Finance [2003] p.205 ~ 208)
- (Note 19) It should not be neglected that there is an opposite argument against "Japanese financial crises." For instance, Christian Broda and David Weinstein insist that the costs of Japanese "social security scheme" consisting of medical expenses, welfare expenses and pension expenses being inevitably burdened by future Japanese government expenditures owing to the arrival of the aging soceity under the low fertility age have a possibility of being smoothly spreaded out over current and future generations.

There are two reasons why it is possible for them to have such kind of optimistic estimate in their insistence. One reason is an optimism concerning Japanese fertility rate. Another one is an optimism concerning Japanese government expenditures in the future. The first is the fact that low fertility occurs at a level of 25,000 dollars (PPP [Purchasing Power Parities] GDP per capita) precisely the level that Japan is at now, and we are able to expect that

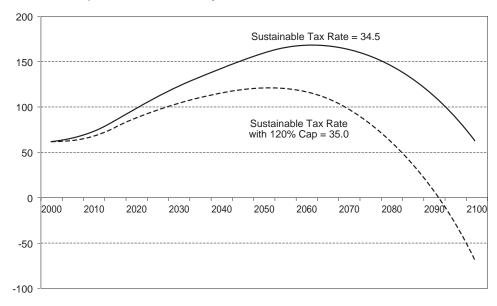


Chart -1. Japan's Net Debt/GDP Dynamics, 2005-2100

(Source) Chrintian Broda & David Weinstein F Happy News from Diamai Science: Raessesseing Japanese Fiscal Policy and Sustainability [Federal Reserve Bank of New York] November 2004
[URL; http://www.ny.frb.org/reseach/economists/broda/pub.html].)

Japanese fertility rate will not remain low forever, but rather will rise at some point in the future (probably in 2060) according to their insistence. Secondly, they calculate Japanese government expenditures per recipient in future on condition that if expenditures on a demographic category are constant, aggregate expenditures should depend on the number of people within the same category. According to such a kind of symmetrical logic, if an aging population means an increase in government transfers to the elderly, then by the same logic, a drop in the fertility rates should mean the decrease in expenditures on younger Japanese.

Accoding to such estimate, they insist that Japanese government debt problem will turn from the peak probably in 2070 (the ratio of net debt to GDP will reach nearly 160%) to more sustainable level in 2100 (the same ratio will decrease to under 100%) even under the substantial tax rate 34.5% (by the way, the present average tax rate is 32.2%) (See Chart -1), too. And they suggest that if Japanese government will be able to increase tax rate only 0.5%, the peak will be shortened probably on 2050 (moreover the ratio of net debt to GDP in the peak will decrease to near 120%) and probably until 2080 the ratio of net debt to GDP will decrease to near 50% (present level). (Refer to Christian Broda & David Weinstein Happy News from the Diamal Science: Reassessing Japanese Fiscal Policy and Sustainability [Federal Reserve Bank of New york] < November 2004>
[URL] http://www.ny.frb.org/reseach/economists/broda/pub.html)

. The way of regenaration of Japanesae economy in the age of Low Fertility

There are two subjects in the way of the regenaration of Japanese economy from medium and long term viewpoints. One subject is the "Social Growth." Another one is the creation of "New Industries."

## 1. The "Social Growth"

The concept of the "Social Growth" is as follows. It means the growth not only led by economic development but also induced by social development to sustain the potentiality of the growth. What kind of factors have the important effect on the Social Growth? The first factor is the spontaneous development of national economy under globalization. Second factor is putting the importance on social, cultural and intellectual needs.

# (1) The spontaneous development of national economy under globalization

The regeneration of Japanese economy under grobalization depends firstlty on how we can "deepen" Japanese economy as "National Economy." In this case "deepening" means that we promote the coexistence of intensive development with extensive development through the positive utilization of globalization instead of the negative stance against it. In other words, the coexistence of intensive development with extensive development means the synthesizing of both.

Conversely saying, to synthesize both developments, we need the spontaneous development. It means the vitality of local economy that is produced through the development of local/regional industries that is compatible with high-tech industry. It is important that high-tech industries always consists of abroad and developed districts taking on a global nature whereas local/regional industries consist mainly of small & medium-sized enterprises allocated on clusters taking on a local nature. But the spontaneous development never means the self-completed development in local zone; instead, it means the potentiality of the development that is provided by the compatibility of the local potentiality of the development with the global potentiality of the development and by the multiplication of both potentialities through international division of labour. Then the spontaneous development should be recognized as the dynamism in the development of local economy through international division of labour.

# (2) Putting the importance on SCINs(Social·Cultural · Intellectual Needs)

Secondly the spontaneous development depends steeply on the satisfaction of SCINs. We should point out that as the demographic change toward the low fertility accompanied by the aging society overlaps with the shift to the prematuring society, peoples so needs are going to change from economical and material needs to new needs namely SCINs. SCINs consist of (a) a change in appearance of consumer needs from the direction for necessity, utility and inexpensiveness to the regard for personality, sensitivity, culture and social problems, (b) an increase of needs for durable and sophisticated house, (c) an improvement of urban surroundings oriented to the satisfaction of people, especially youth, (d) new education necessary to educate the next genaration in the low fertility, (e) an appropriate combination of pensions, nursing and work-sharing regarding the relief and the life worth living of the aged, (f) medical services being provided not only by price mechanism but also by social criteria, (g) a revitalization of regional industries and local enterprises, (h) a formation of sustainablility of regional society, (i) an increase of environmental economy and society.

We should not neglect the fact that the satisfaction of such kinds of SCINs not only improves the social welfare but also contributes to the economic growth. There is a reason why social and, cultural and intellectual needs have the possibility of contribution to the economic growth especially in the age of Low Fertility. It is the emergence of new growth sources consisting of (a) a source in the reason why SCIN has enormous demand in the age of Low Fertility resulting in the increase of aged needs in potential mentioned-above (Note 1), (b) a source in the reason why such kinds of enormous demand will provide many chances for the creation of new industries and ventures especially in the field of Japanese small and medium-sized enterprises, (c) a source in the reason why there will be the possibility of a favourable circle between demand-side and supply-side resulting in the regeneration of Japanese economy. We refer to this kind of favorable circle as the "Social Growth." (Note 2)

# 2. The creation of "New Industries and Ventures"

Can we really expect a favourable circle in the near future in Japan? The expectation will decisively depend on the possibility of SCINs being able to combine in creating new industries and ventures or not. So we must study the problem of the creation of "New Industries and Ventures."

# (1) The scale of SCINs market

We will check the scale of Japanese "New Industries" including SIINs related industries. According to "The strategy of the creation of new industries" which is promoted by Ministry of Economy, Trade and Industry, scales of market &industry related Japanese New Instries are as follows (See Table -1). Then, at first, we will check the scale of market related to New Industries according to Table -1. Firstly, the scale of the market of High-tech industries consisting of Fuel battery industry, Digital home electric appliances industry, Robot industry and Contents industry is estimated as about ¥ 21.5 trillion in present and it is foreseen that this scale will reach about ¥ 35.8 trillion ~ ¥ 47.2 trillion in 2010 ~ 2025. Secondly, the scale of the market of SCINs related industries consisting of Health• welfare equipment & service industry and Environment• energy equipment & service industry is estimated as about ¥ 108 trillion at present and it is foreseen that this scale will reach about ¥ 153 trillion in 2010 (Note 3). Lastly, the scale of the market of Business support service industry is estimated as about ¥ 76 trillion at present and it is foreseen that this scale will reach about ¥ 107 trillion in 2010.

Then we can understand that the scale of the potential market of SCINs related industries is the biggest among new industries even at present and moreover we can expect its steep increase in the near futere.

# (2) The emergence of SCINs related industries

We are going to observe the scale of industry related New Industries according to Table -1. By the way "New Industries and Ventures" consists of High-tech industries, SCINs related industries, Business support service industries and Rgional industries. If we observe the scale of "New Industries and Ventures" with focus on employment, we can find the fact that the emergence of SCINs related industries is biggest compared with emergence of other industries. For instance, the amount of employments in SCINs related industries is estimated as about 6,950,000 persons even in 2001 ~ 2002 and it is foreseen that this scale will reach about 9,410,000 persons in 2010 (Note 4).

Then if there will be a favourable circle between the satisfaction of SCINs and the creation of "New Industries and Ventures" in SCINs related industries, we can expect that SCINs related industries will increase according to the expansion of SCINs market mentioned above. And we can expect such a favourable circle will combine to the

Table -1 The prospect of new industries		
[High-tec industries]		
<fuel battery="" industry=""></fuel>		
The scale of	the market in 2010 —	The scale of the market in 2020
	(prospect)	(prospect)
<ul> <li>Automotive equipment</li> </ul>	50 thousand cars	5 million cars
by fuel battery		
<ul> <li>Settled fuel batery</li> </ul>	2.2 million kW	10 million kW
• The scale of market	about ¥1 trillion	about ¥ 8 trillion
<digital appliances="" electric="" home="" industry=""></digital>		
		The scale of the market in 2010
		(prospect)
	about ¥ 10 trillion	about ¥ 18 trillion
	<robot industry=""></robot>	
The scale of	the market in 2003-	The scale of the market in 2010
		(prospect)
	about ¥500 billion	about ¥ 1.8 trillion
		The scale of the market in 2025
		(prospect)
		about ¥ 6.2 trillion
<contents industry=""></contents>		
The scale of	the market in 2001	The scale of the market in 2010
		(prospect)
	about¥11 trillion	about¥15 trillion
[New industries satisfying SCINs]		
<health• &="" equipment="" industry="" service="" welfare=""></health•>		
The scale of the market and employment ———> The scale of the market and employment		
in 2002		in 2010 (prospect)
• The scale of the market; about	¥56 trillon	about¥75 trillion
• The scale of the employment; about 5.51 million persons about 7.5 million persons		
<environment &="" energy="" equipment="" industry="" service=""></environment>		
The scale of the market and employment ———> The scale of the market and employment		
in 2001		in 2010 (prospect)
<ul> <li>The scale of the market; about ¥52 trillion</li> </ul>		about¥78 trillion
• The scale of the employment; about 1.44 million persor		ons about 1.91 million persons
[Business support service industry]		
The scale of the market and employment ————> The scale of the market and employment		
in 2000		in 2010 (prospect)
<ul> <li>The scale of the market; about ¥76 trillion</li> </ul>		about¥107 trillion
• The scale of the employment; a	bout 6.27 million perso	ons about 7.5 million persons
(Source) Ministry of Economy, Trade and industry "The strategy of the creation of new industries." [LIRI 128/41 ~ 34/41		

(Source) Ministry of Economy, Trade and industry " The strategy of the creation of new industries " [URL]28/41  $\sim$  34/41

regeneration of Japanese economy, too (Note 5) even in the age of Low Fertility. It is no need to say that this cinario means the "Social Growth."

It goes without saying that the creation of "New Industries and Ventures" especially in the field of SCINs related industries contributes to advance the spontaneous development of Japanese economy mentioned above.

- (Note 1) Professor Kan Kato insists that we will be able to expect the expansion of new demand namely welfare, nursing, medical, education and environment in the near future (Refer to Weekly Magazine Diamond "Japanese economy will regenerate" [September 10 2005] p.45). And the Diamond estimates that the aging ratio 0.37% per year will contribute to increase Japanese GDP growth ratio 0.24% per year due to the expansion of social demand related to the aging (Refer to Ibid p.40).
- (Note 2) Concerning the concept of the "Social Growth," refer to Yasuhiko Ebina <sup>r</sup> The regeneration of Japanese economy and a tentative theory of the "Social Growth" (Niigata Univercity of Management <sup>r</sup> The Regional Vitalization Journal [No.10 < February 2004>] p.53 ~ 83. (Professor Naomi Maruo introduces some examples of co•existence of economic growth with welfare•energy saving•decrease of environmental burden especially in Northern European countries [Refer to Naomi Maruo <sup>r</sup> Emvironmental policies are not incompatible with economic growth | <Sankei Shinbun Octorber 15th 2005>]. Moreover Nihonkeizai Shinbun develops the same context in the "Social Growth" theory mentioned above[Refer to Nihonkeizai Shinbun <sup>r</sup> Japan; as the Issue-developed country | <September 3rd, 2005>].)
- (Note 3) Though a scope of SCINs is always condemned as a range consisting of three fields—namely Medical and health field, Housing•urban sorrounding•recycle field and Traffic and security field—, in this section we are obliged to adopt another segmentation consisting of two industries—namely Health•welfare equipment & service industry and Environment•energy equipment & service industry—according to the segmentation of Ministry of Economy, Trade and industry owing to the limitation of data.
- (Note 4) Accoding to Ministry of Environment, the scale of the market related to "environment-induced business" consisted of business dealing with environmental goods & services is estimated to increase from ¥ 41 trillion in 2000 to ¥ 103 trillion in 2025 and the amount of the employment related to "environment-induced business" is estimated to expand from 1,060,000 persons in 2000 to 2,220,000 persons in 2025 (Refer to Ministry of Environment <sup>r</sup> Quality of the Environment in Japan J [June 2005] p.22).
- (Note 5) According to Cabinet Office FAnnual Report on Japanese economy and Public Finance a, Japanese government insists that Japanese economy has a possibility to attain 1.4 ~ 1.6% of growth rate (real term, average base per year) in the 2010s untill in the 2040s under the condition of success in the regeneration of Japanese economy (Refer to Cabinet Office FAnnual Report on Japanese economy and Public Finance a [2003] p.203 ~ 204.)

. The significance of Asian Unification to Japanese economy and society

## 1. The mega-trend of the unification in Asian economy

There are some steps in the process toward Asian Unification; namely from inner-independence in the field of international division of labours in the East Asia to the unification of Asian economy and society. First step is the emergence of Asian Business Economic Zone. Second step is the formation of FTA (Free Trade Agreement) in the East Asia (Note 1). Third step is the arrival of the age of "Asian Community."

## (1) The emergence of Asian Business Economic Zone

As I have already stated (Note 2), the advancement of FDI (Foreign Direct Investment) especially Japanese FDI is going to promote inner-industry trade which has a close relationship with the networking of industries and enterprises in the East Asia accompanied by business networks.

Neverthless business network means only a line between one point and another point, there is a possibility that a business network develops to a business economic zone. Because business network is able to overlap each other due to the deployment of FDI. Then we can expect that there will be strata of business networks as a space resulting in the formation of a business economic zone.

Conclusively we can define such kind of business economic zone as Asian Business Economic Zone which implies strata of business networks developing from a stratum of business network as a line to strata of business networks as a space especially in the field of manufacturing in the East Asia.

### (2) The formation of FTA

There are many active movements toward the formation of FTA even in the East Asia on the background of regionalization of world economy. The first runner of FTA in the East Asia is ASEAN which has agreed, in 1999, to form AFTA (Asean Free Trade Agreement) until 2010. The second runner is China, which, on November 4, 2002, agreed to form FTA with ASEAN countries by the year 2010. It is burdened even with the cost of "Early Harvest" (Note 3). The third runner is Korea that, on September 3, 2004, agreed to form FTA with ASEAN countries by the year 2009. The last runner is Japan which has a plan to agree EPA (Note 4) with ASEAN countries.

Then we should not neglect the fact that ASEAN is not only the first runner of FTA but also the main runner of it, because ASEAN take the initiative in the formation of FTA in the East Asia owing to adopt ASEAN + model (Note 5).

By the way, the main purpose of FTA in the East Asia is to advance Asian Business Economic Zone mentioned above. Because main contents of FTA being promoted in the East Asia are aiming at (a) the liberalization of trade (including services), investment and movement of labour in the East Asia, (b) the settlement of common rule of investment in the region, (c) the bringing up of human resources especially intellectual ones, (d) the settlement of the rule for the protection of intellectual property rights in the region, (e) the formation of the standard of criteria, certification and quality concerning business dealings and business practices including electric commerce-environmental regulation in the region, (f) the advancement of business circumstances and business networkings in the region, (g) the compatibility of business systems and business models in the region. It goes without saying that these subjects will steeply contribute to the development of Asian Business Economic Zone resulting in the formation of Asian Unification as mentioned below.

As is known from the above-mentioned informantion, the main stage of FTA movements is ASEAN. There are no movements to form FTA in the North East Asia even now except a movement concerning FTA between Korea and Japan. But Asian business economic zone has developed due to the FDI especially to Japanese FDI as mentioned above even in the North East Asia. Then it is necessary to form FTA in the North East Asia especially among Japan, Korea and China (Note 6).

# (3) The arrival of the age of Asian Unification

By the way, on the meeting of ASEAN + 3 in Vientiane, it was decided to hold "East Asia Summit" consisting of ASEAN 10 + Japan• China• Korea• India on September 2005 in Malaysia to promote a design of Asian Unification namely "Asian Community." "Asian Community" is designed on the deployment of FTA mainly led by ASEAN mentioned above. Then "Asian Community" will have a familier relationship with the development of Asian Business Economic Zone, too. Saying in reverse, the development of Asian Business Economic Zone will bring the realization of "Asian Community" through the formation of Asian FTA (Note 7).

## 2. Asian Unification and Japanese economy

What kind of effect does Asian Unification bring on Japanese economy? Japan will be affected in three different ways. First is the effect on macro economy. Second is the effect on industries. Third is the effect on enterprises.

## (1) The effect on macro economy

There are two kinds of problems. One is the competition with Asian manufacturing. Another one is the decrease of domestic production accompanied by unemployment.

Firstly, we have to point out the increase of the penetration ratio of Japanese import concerning the competition with Asian manufacturing. For instance, Japanese penetration ratio of manufacturing has steeply increased from about 5.6% in 1983 to 13.5% in 2002 (from July to September) owing to the increase of the import from Asian countries especially from China.

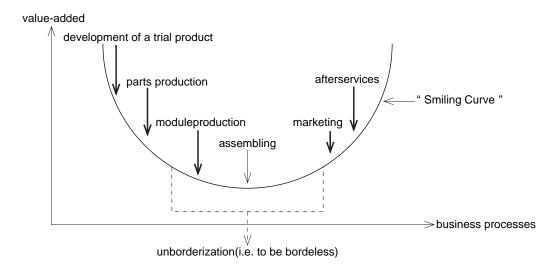
Secondly, we should point out the increase of overseas production connecting to the decrease of domestic production accompanied by unemployment. For instance, the overseas production ratio of Japanese manufacturing has astonishingly increased from 2.7% in 1980 fiscal year to near to 19% (estimated) in 2003 fiscal year through 17.1% in 2002 fiscal year.

It goes without saying that such a steep increase of overseas production has resulted in the broard decrease of domestic production necessarily accompanied by unemployment. For instance, big enterprises have closed their factories at the rate of 20% only in the short term (from 1994 to 2001) and even medium and small enterprises have closed their factories at the rate of 4.2% in same period owing to thire overseas advancement. Such kind of closing has necessarily brought severe effect on the employment. The unemployment ratio has increased from 4.7% in 2000 to 5.4% in 2002 through 5.0% in 2001. Especially regional unemployment ratio has been severe. If we check the data in 2001, its ratio were 6.3% in Kinki district, 5.9% in Hokkaido district and 5.6% in Kyusyu district.

# (2) The effect on industries

Concerning the effect on industries, it is very convinient in the explanation to introduce my last year's study namely the study related to the theory of "The globalization of Smiling Curve." (Note 8)

Chart -1 Unborderization of the "Smiling Curve"



(Note) The original idea of this chart emanated from the Ministry of Economy, Trade and Industry <sup>®</sup> White Paper on International Trade <sub>a</sub> (2003) p.38.

(Source) Yasuhiko Ebina <sup>r</sup> The North East Asian Business Economic Zone and a design of JKC (Japan· Korea· China) - FTA J (Niigata University of Management <sup>g</sup> Journal of Niigata University of Management <sup>g</sup> [No.11 < March 2005>]) p.73

At first we should point out that the "Smiling Curve" is being globalized owing to the shift of main sources of value-added from Assembling process to R & D. Design. Brand. Marketing processes aiming to strengthen the international competition, because assembling process which faces the decrease of value added is obliged to cut the cost of production. Then industries and enterprises which belong to this process have to advance to East Asian countries in which labour cost, always being main cost in assembling, are cheaper than in Japan. As a result the assembling process industry on the "Smiling Curve", firstly, advances to Asian countries and other processes industries facing the decrease of value added, secondly, advances to Asian countries subsequent to the assembling process industry (See Chart -1).

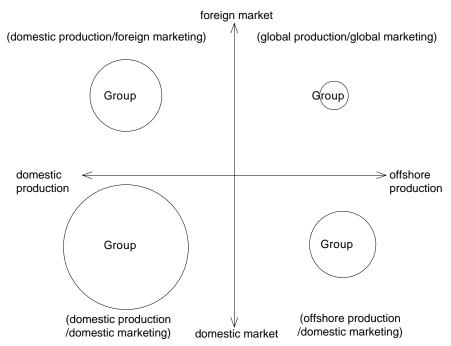
## (3)The effect on enterprises

The affection does not confine itself to industries alone. It extends to the management of enterprises. Below chart (See Chart -2) explains the effect on it. Enterprises which belong to Group are "unglobalized enterprises." Because they produce their products only in domestic factories and sell thier products only to domestic market, too. In reverse, enterprises which belong to Group are "globalized

enterprises." Because they produce their products borderlessly and they sell thier products to borderless markets including not only foreign market but also domestic market, too. Enterprises which belong to Group are "export enterprises," because thier products which are produced in domestic factories are sold not only in domestic markets but also in foreign markets. Enterprises which belong to Group are "offshore enterprises," because they produce thier products borderlessly but they sell thier products only to domestic market.

At a glance, it would seem that Group enterprises namely "unglobalized enterprises" have little effect or no effect from globalization compared with enterprises which belong to Group, and . But such a recognition is decisively incorrect,

Chart -2 The segmentation of the management in Japanese enterprises under four types related to the globalization



<sup>(</sup>Note) The original idea of this Chart comes from Niigata Economy & Society Research Center 

Monthly Report of Center 

(March 2003) p.15.

<sup>(</sup>Source) Yasuhiko Ebina <sup>r</sup> The support for "market-oriented business model" and the cooperation among industries scholarship governments. Focusing on the advancement to China and Asian countries by enterprises in Niigata Chuetu district. (Niigata University of Management Business School Case-Sutudy[Ebina Seminar] The study of the advancement to Chinese & Asian markets by enterprises in Niigata Chuetu district. Some subjects of "Local & Global Brand Strategy". (January 2005) p.74.

because enterprises which are most severely dropping in the competition with Asian manufactures are precisely Group enterprises. The steep increase of Japanese import penetration ratio mentioned above owes substantially to the competition between Group enterprises and Asian enterprises.

This context proves that the affection of Asian Unification is going to cover almost enterprises in Japan.

# 3. The significance of Asian Unification for the regeneration of Japanese economy

As the explanation mentioned above proves, almost of Japanese enterprises are obliged to encounter Asian unification. Then firstly it should be stressed that it is inevitable to adopt a scenario of the spontaneous development of national economy under new geographic surroundings in Asia as mentioned in Chapter -1-(1). Secondly we should put the importance on the point that most important needs are SCINs in the case of adoption of the spontaneous development of national economy as mentioned in Chapter -1-(2). From this kind of foundamental veiwpoint, we will study a scenario of Japanese industries and enterprises which are dropping in severe competition with Asian industries and enterprises for the purpose not only to ovecome new geographic surroundings but also even to utilize it.

From these points of view, we will pick up the relation between Japan and China as a case study. Because the relation between Japan and China has a generality in the relation between Japan and Asian countries. Moreover, it should be stressed that the case study of the relation between Japan and China is especially important in the study of symbiosis model in the relation between Japan and Asian countries.

## (1) An adjustment model

Firstly, from short term viewpoint, adjustment is needed in Japanese international division of labour with Asian countries. To study this problem we will pick up the case of the relation between Japan and China.

Japanese industries and enterprises have the advantage especially in fields of (a) integrated manufacturing, (b) high-functional parts materials, (c) high-class consummer goods, (d) synthesizing goods between manufacturing and service.

Owing to these fields, Japanese exports toward China are going to incresase. For instance, Japanese exports to China in 2004 have increased at the rate of 17.2% per

year grossing  $\pm$  11,827 billion (including export to Hong Kong) (Note 9). If we check the export construction share, electric and electronics occupy 26.9% share, general machines occupy 20.9% and metal processing occupy 10.5% in 2002. In short machinery and metal processing shares are near 60% in total and it goes without saying that machinery and metal processing belongs to some fields ([a]  $\sim$  [d]) mentioned above.

But we should be carefull considering the fact that such fields belongs to fields in which Chinese industries and enterprises have a possibility to obtain competitiveness in the near future owing not only to the "advantageousness of second runner" but also to Japanese enterprises advancing to China especially in the field of high-technology industries. Then we have to say that there is a limitation in the adjustment pursued only by short term viewpoint.

## (2) A symbiosis model

Then we have to shift from an adjustment model mentioned avobe to a symbiosis

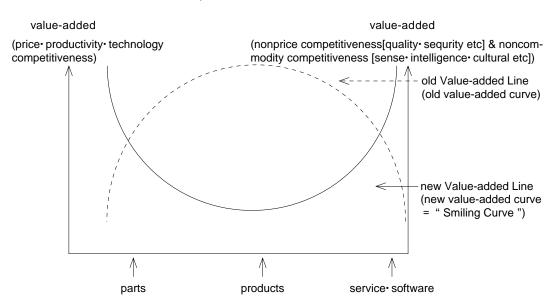


Chart -3 The shift of the Value-Added Line from one value-added system to two value-added systems

(Source) Yasuhiko Ebina <sup>r</sup> The support for "market-oriented business model" and the cooperation among industries scholarship governments · Focusing on the advancement to China & Asian countries by enterprises in Niigata Chuetu district · J (Niigata University of Management Business School Case-Stady[Ebina Seminar] FThe stady of the advancement to Chinese & Asian markets by enterprises in Niigata Chuetu district · Some subjects of "Local & Global Brand Strategy" · J (January 2005) p.92.

model from the medium and long term viewpoint. What is the concept of "symbiosis"? To understand this concept, we will return to the relation between Japan and China once more.

As already mentioned in Chapter -1-(2), there is a shift of needs from old needs depending on people's sense of value putting importance on material and economic interests to new needs, also depending on people's new sense of value putting importance on social, cultural and intellectual affairs according to changes to the prematuring society. We have already referred to this kind of new needs as SCINs in Chapter .

Most important point of SCINs is the fact that we can transfer SCINs to new value theory. New value theory is as follows; in conclusion we can get two kinds of "value-added "supported by value-added and value-added. Value-added consists of SCINs-oriented value sources namely nonprice competitiveness (quality-security etc) and noncommodity competitiveness (sense-intelligence-culturality etc), whereas value-added consists of old needs-oriented value sources namely price-productivity-technology competitiveness (Note 10) (See Chart -3).

Then value-added has a familiar connection with SCIINs. The reason why SCINs has a familiar connection with value-added depends on the substance of SCINs. Remember the fact that the substance of SCINs is formed by social cultural intellectual needs as mentioned above.

Why does an adjustment model has a limitation? Because its sophistication depends only on value added . On the contray, a symbiosis model is free from such a limitation because its sophistication depends not only on value-added but also on value-added .

Therefore, if Japanese industries and enterprises adopt a symbiosis model in the business between Japanese industries & enterprises and its Chinese counterparts, Japanese advantage will sustain even if Chinese competitiveness steeply increases in the field of value-added in the near future.

It goes without saying that a symbiosis model in the relation between Japan and China will generalize to relations between Japan and other Asian countries. Moreover as this model depends on SCINs, it has a possibility to contribute to the promotion of the "Social Growth" in domestic sphere.

Then if Japan adopt a symbiosis model, we will be able to utilize the mega-trend of Asian Unification for the purpose of regeneration of Japanese economy accompanied by the "Social Growth" through which we will able to obtain a possibility that, even if Japan will encounter a crisis in the age of Low Fertility, Japan will be able to hold the counter power against such a crisis.

In conclusion, if Japan will be successful in the utilization of geographical change in Asia namely Asian Unification accompanied by the "Social Growth" owing to the adoption of a symbiosis model which involves familiar connection between value-added and SCINs, Japan will be successful in the regeneration of its economy and society against domestic demographic changes including the low fertility, too.

# (3) Some issues for symbiosis economy and society

It should not be forgotten that the adoption of symbiosis model requires for Japanese economy and society to challenge some issues. Firstly, symbiosis economy and society needs the "Structural Reforms" which covers not only Japanese economy but also Japanese society. Because the "Structural Reforms" involves both of economic reforms and social reforms being needed to pursue the "Social Growth" and being needed to sustain "New National Land Planning." It goes without saying that the "Social Growth" necessarily needs not only economic reforms but also social reforms (Note 11), and New National Land Planning should be sustained by broad and drastic change of social structure (Note 12), too.

Secondly, Japanese enterprises need to adopt new business model which puts the importance on business ethics—for instance CSR (Coporate Social Responsibility)—. As mentione dabove, Japanese enterprises should change their value-added policy from value-added—oriented policy to value added—oriented policy to adopt a symbiosis model as management strategy. By the way, vlue-added—consists of new value sources namely nonprice copmpetitiveness and noncommodity competitiveness which connects to SCINs; however, from the viewpoint of enterprises management, the regard for SCINs is none other than the adoption of CSR business model (Note 13).

Thirdly, Japanese society needs to recover social stability and vitality; which is due especially to the role of local societies being expected to contribute to the provision of the occupation opportunity for youth and the life of youth worth living. The change of demographic structure in Japan, namely the decrease of the youth and the increase of the aged under the low fertility, is relatively severe in local districts resulting in the possibility of the collapse of these districts; which will successively cause a possibility

of the collapse of Japanese economy & society as already mentioned. Then, to avoide such a collapse, it is serious and emergent to regenerate local districts by vilatization policies which owes mainly to the provision of the occupation opportunity for youth and the life of youth worth living through the creation of "New Industries & Ventures" especially in fields of SCINs which is being expected to realize social symbiosis model in Japan.

Fourthly, the importance of symbiosis education accompanied with the ethics education should be stressed especially in fields of the education of next generation and borderless education consisting of both students—foreign students and domestic students. To solve social unequilibrium especilly unequilibrium between present generation and future generations in social secuirity and to realize borderless compatibility especially among the youth of Japan's neighbouring countires and districts, we need symbiosis education system especially putting the ipmpotance on ethics in the field of the education of next generation which is expected to expand borderlessly.

Fifthly, we should be careful about the isolation of Japanese economy in Asia even after "Economic Reform." It is pointed out that Japanese reform especially "Economic Reform," accompanied with the shift to the Right, which has been pursued by Japanese Prime Minister Koizumi has a possibility of the isolation of Japanese economy in Asian countries especially in North East Asian countries owing to rapid emergence of Asian economies especially of Chinese economy with its natiomalism (Note 14). To avoide such a possibility, Japan should adopt the strategy by which we will be able to use regional institutions and treaties in Asian Unification to dilute Chinese "unfaborable influence owing to Chinese over-presence" (Note 15) especially from the viewpoint of sustainable problems in Asia (Note 16). Moreover, if Japan wants to acquire the position of a leading member in Asian Unification which will help it to keep China at bay, Japan will need to maintain familiar relationship with U.S.A. (Note 17). To pursue such kind of strategy, we will even be obliged to re-define the concept of the North East Asia as new concept of the North Pacific including not only North East Asian countries but also North America especially U.S.A. (Note 18).

Sixthly, whereas we recognize diversities in Asian societies and cultures on the one hand, we should respect for the pursuit of the general value transcending their own racial value, which is expected to consist of a sense of values surveying the whole

world, among Asian peoples on the other hand, because the general value is useful not only for symbiosis but also for the unification of Asian economy and society.

Lastly, government policies are needed to challenge the subjects mentioned above including not only the Central government but also local governments. We especially expect to promote local policies in above-mentioned context.

- (Note 1) In this article the East Asia means the district consisting of Asian NIEs (Korea, Taiwan, Singapore and Hong Kong), ASEAN (Thailand, Malaysia, Indonesia, Philippines, Singapore, Brunei, Viet-nam, Laos, Cambodia and Myanmar), China and Japan.
- (Note 2) Refer to Yasuhiko Ebina <sup>r</sup> The North East Asian Business Economic Zone and a design of JKC (Japan• Korea• China) FTA <sub>J</sub> (Niigata University of Management <sup>g</sup> Journal of Niigata University of Management <sub>g</sub> [No.11< March 2005>]) p.67 ~74.
- (Note 3) "Early Harvest" means unilateral tariff deduction by China by which 6 countries in ASEAN can steeply export their agricultural products to China from January 2004, neverthless China is burdened with over production and over population in the field of domestic agriculture.
- (Note 4) EPA; Economic Partnership Agreement
- (Note 5) ASEAN + model is not necessarily restricted to the East Asia in the formation of FTA. This model is going to expand to the Pan-Asian Pacific. For instance, it is predicted that ASEAN will form FTA with Australia and New Zeeland till 2006 ~ 2007 (Refer to Takashi Shiroishi Feast Asian Community [Yomiuri Shinbun, September 4th 2005]). It is reported that ASEN has agreeded with India in the formation of FTA by the end of 2006 on November 26th 2005, too(Refer to Nihonkeizai Shinbun September 27th 2005). Moreover, it is reported that U.S.A. and even EU countries have strong interests in FTA with ASEAN countries(Refer to Nihonkeizai Shinbun April 20th, 2005). On the background of such an initiative of ASEAN in the formation of FTA not only with East Asian countries but also even with Pan-Asian Pacific countries, there is the advance of AFTA (ASEAN Free Trade Agreement) which has already been successful in the formation of a common market in ASEAN countries. ASEAN has concluded the building of AFTA in 1992 under the obligation in which six countries starting in advance in ASEAN will be obliged to abolish their tariffs reciprocally till 2010<\*> and four countries starting in later will be obliged to abolish their tariffs reciprocally till 2015, too (Refer to Asahi Shinbun October 27th, 2005). (<\*>AFTA has already started through the reduction of six countries tariff rate under 5% as inner regional rate in 2003 [Refer to Nihonkeizai Shinbun December 18th, 2005].)
- (Note 6) Concerning JKC (Japan• Korea• China) FTA, refer to Yasuhiko Ebina ® A design of ¶ Japan• China• Korea Free Trade Agreement 」 for the formation of the symbiotic economic zone in North East Asia 』 [Akashi-shoten May 2004] p.193 ~ 225.
- (Note 7) It goes without saying that Asian Unification namely "Asian Community "needs not only the formation of Asian Business Economic Zone and Asian FTA but also the arrangement of other economic conditions. For the realization of Asian Unification, many regional cooperations mainly in the East Asia are needed besides the formation of business economic zone and FTA. From this viewpoint, it is noticeable that there are some advances in fields of financial and investment cooperations including the deployment of "Chiengmai Initiative," ACU (Asian Currency Union) and a design of the creation of "Asian Bond Market."

- Moreover, there is a possibility of other cooperations in fields of IT (Information Technology), energy, environment and education etc. Especially, it should be stressed that cooperations cooperations in fields of economic growth, energy consumption and environmental safegusrds—related to the sustainable development of Asian economy and society are important. Neverthless it is not enough to arrange only economic conditions. Because Asian Unification needs not only economic conditions but also other conditions like Asian Social Space, Asian Culture Space, Asian Security Space and Asian Identity etc.
- (Note 8) Refer to Yasuhiko Ebina <sup>r</sup> The North East Asian Business Economic Zone and a design of JKC(Japan• Korea• China) FTA J (Niigata University of Management <sup>p</sup> Journal of Niigata University of Management J [No.11< March 2005>]) p.72 ~74.
- (Note 9) The amount of Japanese export to China ¥ 11,827 billion in 2004 comes next to the amount of Japanese export to U.S.A ¥ 13,720 billion in the same year resulting in China as secondary partner among Japanese export partners. If we add Japanese trade to Hong Kong to Japanese trade to China, total amount of Japanese trade to China ¥ 22,199 billion in the aggregate in 2004 exceeds total amount of Japanese trade to U.S.A ¥ 20,479 in the same year resulting in China as the first partner among Japanese trade partners.
- (Note 10) We should note carefully the fact that the difference between value-added and value-added is restricted only in the theory. It goes without saying that there is the relationship between value-added and value-added substantially. In detail concerning this problem, refer to Yasuhiko Ebina <sup>r</sup> The support for "market-oriented business model" and the cooperation among industries scholarship governments focusing on the advancement to China and Asian countries by enterprises in Niigata Chuetu district J (Niigata University of Management Business School Case-Study [Ebina Seminar] <sup>p</sup> The study of the advancement to Chinese and Asian markets by enterprises in Niigata Chuetu district Some subjects of "Local and Global Brand Strategy" J (January 2005) p.93.
- (Note 11) Concerning the point that the "Social Growth" necessarily needs not only economical reforms but also social reforms, refer to Yasuhiko Ebina The regeneration of Japanese economy and a tentative theory of the "Social Growth" (Niigata Univercity of Management The Regional Vitalization Journal [No.10<February 2004>] p.74 ~ 77.
- (Note 12) Ministry of Land Infrastructure and Transport insists that the New National Land Planning "being scheduled to accomplish by 2007 needs broad and drastic changes of social structure (See Nihhonkeizai Shinbun Octorber 7th, 2005).
- (Note 13) It should not be neglected that the adoption of CSR business model is not necessarily contradictory to the strengthening of the competitiveness. Because the regard for SCINs means the strengthening of the competitiveness especially in the field of manufacturing. For instance, see the example of Toyota which is going to overwhelme old Big Three (GM, Daimler Chrysler and Ford) through the adoption of highbred car PRIUS most excellent car related to the decrease of CO2 emissions in the world. (Concerning the point that there is a familiar relationship between "Green Manufacturing" and new competitiveness, refer to Yasuhiko Ebina <sup>r</sup> A proposal of Asian Green Manufacturing Network For the Formation of Asian Environmental & Economic Zone J (Niigata University of Management <sup>p</sup> Journal of Niigata University of Management <sup>g</sup> J
- (Note 14) Mr. Bill Emmott who is editor of The Economist pointed out that even if Japanese economy will be successful in "Economic Reform" owing to Japanese Prime Minister Koizumi, Japanese economy will necessarily be confronted with the emergence of Chinese economy due to the far more steep growth of Chinese economy comparing to the growth of Japanese

- new economy and the confrontation will be multiplied by the nationalism in both Japan and China (Refer to The Economist  $^{\Gamma}$  The sun also rises A survey of Japan  $_{\perp}$  [October 8th, 2005] p.10  $\sim$  16 Survey).
- (Note 15) For instance, IEA (International Energy Agenncy) predicts that China will steeply increase its share of primary energy demand in the world from 12% in 2002 to 15% in 2030 owing to the high growth rate of its economy. As the result, IEA predicts that China will occupy 21% of the amount of the increase of primary energy demand in the world from 2002 to 2030 and 25% of the amount of the increase of C02 emission in the world from 2002 to 2030 even in the case of growth rate of 4.8% (real term, per year) in Chinese economy from 2002 to 2030.
- (Note 16) Refer to The Economist <sup>r</sup> The sun also rises A survey of Japan <sub>J</sub> [October 8th, 2005] p.16 Survey. Concerning this point, Professor Takashi Shiraishi points out interesting issue. He insists that Japan should use common rules in Asian Unification not only to induce the participation of China but also to restrain its expansion (Refer to Takashi Shiraishi <sup>r</sup> The building of East Asian Unity The expectation for Japan is heavy and great J [Asahi Shinbun November 19th, 2005]).
- (Note 17) Refer to Ibid p.18 Survey.
- (Note 18) Refer to Yasuhiko Ebina <sup>r</sup>A design of North Pacific logistic network and Ineternational division of labour in Japan-sea East-sea A feasibility of Hokuriku EPA/FTA (East Asia Inter-regional Conference <sup>r</sup>The study of East Asia inter-region [No. 5] < Scheduled >)