The Korean Economy and the FTA with United States*

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Let me start by thanking my friend II SaKong for his kind introduction. It is a pleasure to be here with you this morning. Every time I give one of these talks, I am struck by the dedication of the audience. I am hard pressed to think of anywhere other than Korea where one could get such a high quality audience so early in the morning.

And that brings me to my topic-what is special about Korea and its economy. Actually, when I agreed to give this presentation, Dr. SaKong and I agreed that I should give my perspective on the Korean economy. Since then, there have been-how shall we put it? -new developments, namely the crisis in U.S. financial markets. I can't resist the temptation to talk about this as well. So I am going to summarize rather dramatically my thoughts on Korea and then turn to recent developments in global financial markets.

1. Some Historical Perspective

Korean economic growth is of course one of the great success stories of the last half century. A growth rate averaging 8 per cent per annum over the period fundamentally transformed the country and the lives of its citizens. From a starting point as one of the very poorest countries, South Korea now is the 12th largest economy in the world (more or less-these league table, which tend to be presented with a spurious air of precision, depend on how exactly you do the ranking). It is a member of the OECD. It is known around the world as a producer of motor vehicles, household appliances, consumer electronics, and youth culture. It is hard to imagine a more dramatic success story.

Yet almost from the start, Korean observers downplayed the economic miracle and raised questions about its sustainability. In the 1970s it was commonplace to question the efficiency and rationality of much of the investment in the heavy and chemical industries and to complain of low profits and mediocre productivity growth.

The 1980s started with a debt crisis, a recession and a wrenching structural adjustment

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and concluded with a wage explosion, all of which were seen as threats to continued growth. The first half of the 1990s featured gradual economic and financial liberalization and a governmental campaign to rein in the big conglomerates, motivated by the belief that a cosseted economy and *chaebol* dominance were incompatible with sustained productivity growth. The second half of the 1990s was of course dominated by the financial crisis. Now the secular decline in growth rates from the high-to the midsingle digits, occurring against the backdrop of competition from China, raises questions among the public and officials about the current performance and future prospects of the economy.

My point is that there is nothing new about the current sense of angst. Koreans have long questioned whether their country's superficially impressive economic growth is in fact built on firm foundations. The tendency to emphasize problems rather than achievements, at least in discussions with foreigners, may be a national personality trait. Certainly this is not a trait that the citizens of my country, the United States, display any degree. But Koreans' emphasis on problems may encourage an excessively pessimistic view of the economy. To be sure, per capita incomes and productivity remain lower than in Japan and the United States. But both variables are growing faster than in these two richer countries. Convergence is ongoing. It could be that the feeling of angst reflects awareness that other countries in the region are growing even faster, or that Korea itself needs to grow faster in order to be ready for the difficult and costly task of reunification. My sense, for what it is worth, is that the current unease is simply the latest manifestation of the general tendency to emphasize problems at least as much as achievements.

2. Popular Explanations

Discussions of why Korea isn't growing faster focus on low investment and the high won. The investment/GDP ratio has fallen from the nearly 40 per cent scaled in the mid-1990s to barely 30 percent today. Standard growth accounting suggest that the contribution of capital formation to the growth of output was only half in 2000-2005 what it had been in the decade from 1985 to 1995. So-called "new-growth" models positing positive externalities from investment suggest that the negative effects of the post-1995 decline in investment may have been larger still. The idea that the effects should have been even larger than suggested by standard growth accounting is supported by the observation that the decline of investment in machinery and transport

equipment, as opposed to construction, had been particularly pronounced in Korea, and that it is the machinery equipment that are plausibly the source of positive externalities.

There is of course no shortage of explanations for the lower level of investment. There is competition in assembly operations and manufacturing generally from low-cost China, just next door. This has encouraged Korean firms to invest abroad rather than at home, arguably resulting in a "hollowing-out" of Korean industry. China has indeed been the principal destination for Korean investment. Fully 60 percent of Korea's foreign direct investment is now destined for other Asian countries. And strikingly, not just the large conglomerates but small and medium sized Korean enterprises have invested overseas.

For what it is worth, my own research does not support the idea that there had been significant investment diversion. While there is surely an incentive for Korean firms to invest in processing and final assembly facilities in China, there is also an incentive for them, and for foreign companies, to invest in Korea in facilities for the production of the machinery, equipment, and technology that this country exports to China to meet that country's insatiable appetite for investment, and in factories for producing here the sophisticated parts and components that then undergo final assembly there. While Korea should undertake more foreign investment, it should also receive more foreign investment, because its economic structure, emphasizing capital goods, and its level of technological sophistication are complementary to China's. It could be that foreign investors have been slow to recognize this fact. But this is changing now, as evidenced by attendance at this conference. I conclude that China is not to be blamed for the fall in Korean investment rates.

Perhaps the perceived riskiness of investment has risen. Before the crisis, firms engaging in high levels of investment believed that their survival was guaranteed by the government. Or so it said; I am not entirely convinced by this argument. There were chaebol bankruptcies before the crisis. The Donglip Group, the ninth largest *chaebol* in the 1960s, was allowed to go bankrupt. Dongmyung, the *chaebol* built around what was at the time the world's largest producer of plywood, went bankrupt in 1980. And then of course, there were Hanbo and Kia.

It is said that the macroeconomic environment is less certain now that the economy

has been deregulated, the exchange rate is floating, and the financial system has been opened to the rest of the world. Uncertainty is a key variable in modern theories of investment: the greater the uncertainty, the stronger the incentive to hold off investing in response to an increase in profitability and to wait and see whether the higher profits are permanent. One observation consistent with this emphasis on uncertainty is that the dispersion of growth projections by forecasters has risen significantly since the crisis, for Korean and the region generally. But, again, I am not convinced, for if you look back at earlier Korean history you see that growth was always volatile. Uncertainty was always considerable, whether we are talking about 1979, or 1987, or 1993. Anyone who was engaging in high levels of investment in the belief that the returns were certain was deluding himself.

The alternative is that the lower levels of investment we are now seeing in Korea are basically a healthy problem. As the economy matures and the high-growth period ends, a lower level of investment becomes consistent with any given rate of profitability. Failure to recognize this tendency can explain why investment rates remained high through the first half of the 1990s and why the financial crisis then followed. Of course, one must then explain why managers were so slow to acknowledge the trend. Here I would point to weakness in the Korean system of corporate governance, in which outside investors had limited ability to monitor and discipline managers who failed to recognize and react to what was happening, or who may have simply had their own private agendas, like maximizing the size of the enterprise as opposed to its profitability. But the financial crisis then opened the eyes of managers to the fact that the highgrowth era was finally over. It led to improvements in shareholder rights and corporate governance generally that prevented blockholders and managers from engaging in empire building. The fact that the rate of return on investment is now higher than in the first half of the 1990s, if not as high as in the fast-growth 1970s and 1980s, is consistent with this interpretation.

The other popular explanation for why the economy isn't growing faster, namely the high won, is related, since it is one factor that could be limiting the profitability and that rate of return on additional investment. Everyone in this audience will be aware of the appreciation of the won against the dollar: from 1035 at the end of 2004 to 1012 at the end of 2005 to 930 at the end of 2006, and at more-or-less that level at the time of writing. And the won is up about twice as much against the yen, which has fallen against the dollar by about 15 per cent over the period. In contrast, it is up roughly half

as much against the renminbi, which has appreciated by about 8 per cent against the dollar since the band widening of 2005. Thus, even though unit labor costs in won have risen only slightly faster than productivity since Korea began recovering from the crisis, expressed in dollars they have risen sharply since the beginning of the decade.

To my mind, this focus on other countries and their currencies is the right way of thinking about Korea's exchange rate problem. The yen is weak because Japanese growth is still anemic. (I am not among those who believe that Japan is now embarked on a vigorous recovery.) It is weak because after a decade-long slump the government lacks other instruments with which to stimulate the economy. The dollar is weak because the United States has a current account problem, whose correction requires exporting more and importing less. The response of U.S. exports and imports to the weaker dollar isn't much in evidence yet, but it is coming. U.S. exports are up, and U.S. growth, which drives the demand for imports, is slowing. With the yen and dollar weak, it is almost a matter of definition that the won should be strong, through no fault of the Bank of Korea. With Japanese growth slow and U.S. growth slowing, it is not surprising that Korean growth and investment are not as high as might be hoped.

So I regard the strong won as more a symptom than an independent cause of the pressures on the Korean economy. Given this diagnosis, I also doubt that much can be done about it. Lowering interest rates would bump up against the Bank of Korea's inflation target. Sterilized intervention would have little purchase, given the openness of the Korea's capital markets and substitutability of domestic and foreign assets. While tightening fiscal policy would limit the appreciation of the exchange rate, it would also slow the growth of domestic demand, which would not be constructive. "Grin and bear it" is not very helpful advice. But there are few alternatives, given how exchange rate appreciation mainly reflects problems abroad.

3. Difficulties of Transition

So why is Korea growing more slowly? Part of the answer is simply greater maturity-less scope for catching up, in other words. But another part is the transitional difficulties of restructuring the economic and social system. An economic and social model is a system of interlocking parts. Those parts fit together in intricate ways. The operation of each individual component complements the operation of the others, enhancing the efficiency of the mechanism. Now assume that the mechanism has to be updated- that

the parts to be succeeded by more efficient replacements. But if the parts cannot all be replaced at the same time, there then is a danger of incompatibility, or at least slippage, between old and new ones. Think of when jets replaced propeller airplanes. The new engines promised to enhance efficiency and increase speed. But to exploit that potential it was also necessary to develop and deploy new stabilizers, new wing designs, and new mechanisms for fuel delivery. Just installing the new generation of engines without also making these other changes would have reduced rather than enhanced the efficiency and stability of the craft.

The economic and social equivalent is capital markets, labor markets and product markets, along with policies for their regulation. Korea's bank-based financial system was very good for mobilizing large amounts of savings and plowing them into established industries using known technologies. A labor market in which workers enjoyed high levels of employment security-at least in the large-firm sector-but relatively little autonomy worked well when growth depended on providing workers with vocational training and familiarizing them with new technologies. An industrial structure dominated by large firms was well suited to a period when technological change meant importing from abroad technologies offering economies of scale and scope. Government policies emphasizing savings and extending investment guarantees fit the bill when the task for growth was to expand capacity in industries using known technologies rather than to develop new products and processes at home. Critically, these different elements complemented one another. By providing steady finance to an established set of industrial clients, the banking system facilitated the provision of vocational training and enhanced the stability of employment, irrespective of fluctuations in the cash flow of the borrowers. Strict regulation of the labor market in turn made lending decisions easier for the banks. And so forth.

Now the model needs to be updated for the 21st century. As Korea approaches the technological frontier, capacity to innovate becomes more important. The country's bank-based financial system has to give way to stock markets and venture capital, which are better at taking bets on unproven technologies. Technological flux implies the need for more small and medium sized firms, which are the sources of radical new technologies. It implies the need for more turnover in the labor market, as firms are born and die. The role for government is no longer to encourage investment generally or to attempt to govern individual investment generally or to attempt to govern individual investment generally and tertiary education,

which have positive externalities in a technologically-dynamic world.

In other words, reforms are complementary. But there is no all-powerful social planner to implement these various changes simultaneously. The different components making up the mechanism evolve at different rates; they are reformed at different speeds. Here, financial market reform has gone faster than industrial restructuring. The reorientation of government policy has lagged.

I think the problem of slow growth in Korea, slow growth by your standards, at the beginning of the 21st Century is a colliery of this structural adjustment. It is disruptive, change is disruptive, especially the change of a system of interlocking components that is the definition of an economic and social system is especially disruptive to growth. It does not make the destination any less desirable or the change any less necessary but it does have a depressing effect on the short and intermediate run on growth.

So this is where policymakers' emphasis on the FTA has played a useful role. I really see the FTA as a mechanism for intensifying product market competition in Korea, partly it is a signaling mechanism by the government, it is signaling that it is really serious about promoting freer product market competition, partly it is not a signal it will be a market fact. There will be much more import competition in pharmaceuticals, auto parts and a variety of other industries that are going to force Korean companies to shape up or die. So the argument about product market competition is that it has been shown mainly by the OECD in a variety of contexts as key elements in this restructuring process.

If you look at countries that started off with economic and social systems appropriate for catch up growth just like Korea has undergone for the last half century, Europe had to catch up to the United States, starting off with only half of its GDP in 1950. Especially in the third quarter of the twentieth century, their economic and social systems had to undergo radical change and some European countries have succeeded in remaking their economies Ireland, UK to an extent, the Scandinavian countries to a surprising extent that is not appreciated outside of northern Europe, even Germany has finally made considerable strides in remaking its economy for the needs of the 21st Century more hi-tech, more export-orientated, more flexibility. What has been the key to their success, to a large extent intense product market competition has sharpened the incentive for firms to make hard changes, even hard changes that are painful and risky

in the short run. So that is what the OECD has shown quite strongly for Europe that is where product market competition has been the most intense, structural change has been the most extensive and successful.

That is why I think that Korean policymakers have made the right choice and made an important choice in emphasizing the FTA, it is going to result in more intense product market competition and going to catalyze other changes. It is going to do so only if it is ratified by both partners, so I would like to be the messenger providing a more positive message about public opinion and political reaction to the FTA on Capitol Hill and Washington DC. The current situation is not very positive. People in Korea know what a Presidential election, how it can affect the policy debate, it can cause candidates to posture, to take populist positions in order to try to secure the nomination and secure the election.

And that is what we are seeing in the United States, I think all of the Democratic candidates have come out in opposition to ratification of the FTA, Hilary Clinton has come out opposing it, Obama has come out opposing it and Edwards has come out opposing it. On the Republican side there has not been much discussion of the Korea-US FTA, but I think a Republican President whoever that person might be would have to contend with a heavily Democratic Congress given the way the political winds tend to shift back and forth both after many years of a Republican Congress the electorate may feel it is time for a shift as well because of what is happening in Iraq is not good for the Republicans.

So all of that will make ratification by the United States difficult, it will require Presidential leadership to get the Congress to agree, it will require the political candidates who oppose the FTA to turn into political leaders or will require the candidates to turn into statesmen or women and decide that there are larger issues at stake. But my message would be the need for continuing structural change in Korea and to rely on the FTA as the catalyst for that is risky because to rely on U.S. ratification would be risky unfortunately as well.

That does not make me entirely pessimistic about Korea. One can imagine a not-toodistant future in which capital markets, labor markets, industrial structure, and government policy have all been remade to meet the needs of the 21st century. But with different elements of the system being updated at different times, the efficiency of the mechanism is likely to be less while it is still under renovation. These transitional difficulties are the explanation, in my mind, for why the economy is not growing faster. The good news is that this story points to a happier future.

4. The Big However

But there is a big "however." That big "however" is the growing financial crisis in the United States. In my view, investors have only begun to appreciate the importance of the U.S. financial crisis for the Asian economy. The Kospi's 7 per cent plunge on August 16th may have been a wake-up call for Korean investors. But for those hoping that the worst is over, I have news from America. You ain't seen nothing yet.

The outlook for the U.S. economy is bleak. It is increasingly difficult to tell a story that doesn't involve a recession, or at least a very significant economic slowdown, in the next 12 months. The U.S. housing bubble has burst. This is not exactly news, of course. Existing home sales had dropped by 20% from their peak even before the most recent bout of financial turmoil. New home sales had declined by 40%. The inventory of unsold homes had already exploded.

What is news is that the American consumer has woken up and smelled the coffee. Last week's disappointing consumer confidence numbers from the University of Michigan clearly signaled this fact. Those numbers surely loomed large in the Fed's extraordinary intra-meeting decision discount-rate cut last Friday. The threat to the U.S. growth is not simply that residential construction has halted and that residential construction accounts for 40 per cent of all fixed investment. It is not simply that nonresidential investment will tank now that corporations in other sectors are finding it more difficult and costly to borrow. It is that the growth of private consumption will now slow sharply. And private consumption accounts for more than 70 per cent of U.S. demand.

If the "consumer of last resort," the American household, now goes on strike, this will have serious implication for other countries and for Asia in particular. There has been much talk in the last year "decoupling"-of whether Asia can keep growing if U.S. growth stops. The idea is that Asia now has an independent growth pole in China. And with the Japanese economy doing better than it has in a decade, Asia can keep dancing even when the American music stops.

Nothing could be more wrong. Half of all Chinese investment is in the export sector. And those exports are heavily destined for the United States. Thus, a significant slowdown in Chinese growth is now all but inevitable.

As for Japan, Mrs. Watanabe's rediscovery of risk and consequent decision to keep her money at home mean a significantly stronger yen. And in turn this bodes a slowdown in Japanese growth and even the return of deflation.

The implication is that all of Asia should prepare for a significant economic slowdown. With growth in China slowing significantly, none of the neighbors will be immune. Since much of what other Asian countries sell to China is, in turn, simply assembled and sold on to the U.S., the impact of U.S. troubles will be more immediate still.

In offering this gloomy forecast, I like to think that I am not simply joining the latest pessimistic bandwagon. Fully a year and a half ago, Yung Chul Park of Seoul National University and I wrote that the main threat to economic stability in Asia emanated from the United States. We warned that a significant fall in asset values in the U.S. could lead to an American recession and an economic slowdown in Asia. Rather than infecting Asian banks and financial markets, we saw problems in the U.S. as hitting Asian economies by slowing the growth of their exports.

Full disclosure requires acknowledging that we anticipated that those problems would be accompanied or even precipitated by a sharp drop in the dollar. So far, however, problems have centered in the markets for collateralized debt securities and commercial paper, not the market for exchange. Investors have not fled the United States for other countries or caused the dollar to tank.

But it is still too early to dismiss this risk. Foreign investors, including central banks, have been diversifying out of U.S. treasury bonds into mortgage-backed securities and the U.S. stock market. These investments now look less attractive in light of recent developments. And if these alternative investments look dicey, diversifying out of U.S. treasuries will require diversifying out of dollars. The result will be a sharply lower dollar, which will be more bad news for Asian exporters.

Which countries are most at risk? Professor Park and I pointed to Hong Kong, Singapore and Taiwan, since they depend most on exports to the United States. Korea

we lumped into a second group-still vulnerable if somewhat less so-along with Indonesia, Malaysia, the Philippines and Thailand. This is still my best guess of who will be hit hardest by the coming U.S. slowdown. It is not good news for Korea. On that pessimistic note, I am happy to take your questions.

Questions & Answers

Q Thank you, Barry. You have covered a number of fields. So let me concentrate on US-Korea FTA, with respect to your comments, US-Korea active growth in a very severe product competition. Unfortunately in Korea, the government just focuses on how the US-Korea FTA will be of benefit to Korea because it will have expanded export-marketing opportunities in the US market. We downplayed in a sense the product competition, which might cause an alert in the businesses community, but essentially your point is correct, I think this is an opportunity for Korea to upgrade our overall system.

And secondly given your pessimistic prospect on the ratification of the KORUS FTA on the part of the US Congress. Some predicted that perhaps in early 2009 the US Congress will eventually ratify the pact, number one, the US Congress has never rejected an FTA proposed by the Administration and second the current Democratic candidates would change their minds once the Presidential candidate is determined at the National Convention as President Clinton did with the NAFTA case. And the third point is that as Karen Bhatia pointed out in the last hearing, that if the US fails to ratify this FTA the US will tarnish its image as a free trade nation as well as the US will lose a great opportunity to link the 12th largest economic power in the world and an economy that plays a critical role in the East Asian economic integration process. In other words the US-Korea FTA will play a formal link towards increasingly integrating East Asian economy.

There is also another view that the Korean National Assembly should ratify first so that they can assert pressure on the US Congress, what is your view on this?

A I am happy to hear that optimism about ratification is still alive in Korea. I heard Mr. Ahn's reference to 2009 and I think that is exactly correct. That the Presidential election

in the US is before and that nothing can happen before then. So the best scenario is one where ratification happens right after the election because as you say the successful candidate will morph into a statesman leader rather than a populist candidate. And there is some precedent for that kind of development; I think Bill Clinton moved in that direction so one could imagine that outcome as well. What renders me more pessimistic is that I think that the Congress is much more protectionist and much more skeptical of these arrangements than in the early 1990s when Bill Clinton came to office. So a new President would have a more difficult task of building the coalition in Congress for ratification. If these fears about the US prove correct that will not bode well for ratification, there will be more concern about unemployment, there will be more of the standard blame game where foreign competition will be blamed for the unemployment so that will not help. So we will have to hope that any slowdown in the US will be short and mild from the point of view of FTA ratification.

I think the strongest pro-ratification card in the Congress is the security card, that the US wants South Korea as a security ally, that the US is worried about North Korea problem, that good political relations between Seoul and Washington for security-related problems are important, so now to embarrass and antagonize one's ally over the FTA would be counterproductive in working with Seoul on the North Korean issue. So that is, if you will, the card to play, the main reason to hope that the politicians will see the light and the importance of ratifying the FTA.

Q Thank you for your number of profoundly insightful observations of the Korean economy vis-à-vis the global world. I have two questions, firstly the bad news I have heard is worse than Dr SaKong made it sound out to be. My question is, Dr SaKong, assuming your forecast is correct, described the anticipated US Recession as a short-term development, my question is how short is going to be this short term in your view, how long will it take the US and world to fix this sub-prime mortgage mess and come out rebounding again.

Secondly, you imply that with intensified market competition in Korea we could complete the job of upgrading the system. You implied, you did not say, you implied that we could get back on a higher economic growth path. Over the last four and half years the average growth rate has been about four and half percent. And the leading opposition party presidential contender has been arguing that he will bring up the

growth rate to 7% by upgrading the system exactly in the way that you have described.

Q I am the CEO of Namyong Industrial Company Limited and I also chaired the FTA Special Committee at KITA. First, just one comment, if you read *Wall Street Journal* there was a lot of warning from Alan Greenspan and I don't think the American financial sector took it very seriously and I thought your comment that Asia was very slow was a little unkind because the American markets should have been much more aware of that. Again with the *Wall Street Journal* there is a lot of bad news when you read it and the economic slowdown seems to have started and is well in progress despite a lot of optimistic comments by some your economists. So my question is somewhat related to the previous question, how are you going to fix it? If you were the economic adviser to the President of the United States how would you advise him on this issue?

My question is about this sub-prime mortgage issue, you said that Asian investors are pretty slow in appreciating the gravity of this sub-prime mortgage problem, it is true, and we should admit that. However I still cannot grip why it is a serious problem, as I understand the science of these bad debts it is a few hundred billion dollars, however the size of your markets is tens of trillions of dollars. I see the problem coming from the segregation of CDOs and bonds in several ratings and derivatives and these products are sold to so many investors and fund managers. And fund managers cannot give daily valuations of what they are selling. So I feel this problem is more of financial supervisory authorities and markets who do not understand the size of the problems, where the problems lie, how much and who have these risks. As I mentioned earlier the total size of the problem is just a few hundred billion dollars, which is not too big for America to handle.

A Collecting questions creates difficulty for the speaker when you get so many good questions on so many different things. What kind of recession should we expect, that is a hard one. Forecasting a recession is difficult and risky business, so not only do you want me to give you a yes or no answer you want me to forecast how deep and how long, that is really hard for a forecaster. I think what we should hope for is a relatively shallow downtown but one that is unavoidably going to be quite long because of its basis in residential construction.

So a lot of what has been done is that people have built a tremendous amount of housing out in the desert where nobody wants to live or can afford to live, you have a physical mismatch between a physical capital stock in mainly residential construction and demand, and redeploying that stuff, you can't pick up those houses and move them very easily, so there is a big physical backlog as well that is going to be a drag on the financial system and the economy. And I am often reminded of the 1930s. You had in the United States a big housing boom in the 1920s, the most recent one has been concentrated on Florida and the Southwest and in the interior in the central valley of California, that one was in Florida and that one was a drag on the US economy for the better part of a decade. Because the land had been divided, the houses had been built and nobody wanted to buy them. And working down the associated financial obligations took a long time. So because there is this physical legacy it may take quite a while to work this out.

You also asked me about Korean politics and I refused to be drawn to tell you whether 5 + 2 or 7% is more realistic. Although where I would be prepared to be drawn, is that 7% is very optimistic, I think for a relatively mature, relatively high-income country. But most of us would be happy with 5 or 6 %. So I think Korea could do better, but I think 7% is optimistic. Maybe politicians should be in the business of optimistic targets but then they have got to deliver.

I apologize if I gave slightly the wrong impression of how Asian investors have been slow to appreciate what is going on, but they are not alone. American investors have been slow to appreciate what is going on as well. I am struck how, with the benefit of hindsight, much of this was inevitable and was like writing on the wall. The search for yield and all this money flowing into all kinds of speculative high-risk investments was a consequence of the vast amounts of liquidity in global financial markets. People were looking somewhere to get some yield, so they were looking for the mezzanine at the mezzanine tranche of CDOs, even though they did not know what was in them. And once banks began to normalize the level of interest rates, which the Fed began to do more than two years ago and the Bank of Japan has begun to follow, it was clear that more normal risk prima were going to reemerge. And it was clear that this was going to create difficulties for highly leveraged investors in this risky paper. The fact that they did not see this coming and they continued to buy all this risky stuff because their competitors were buying all this risky stuff and they wanted to match their benchmarks, now we can say, with the benefit of hindsight, that they were slow on the uptake and that is why we are in the mess that we are in now.

Two things are likely to make the problem larger than simply the size of the CDO market by itself would suggest. One is that it seems to be having significant spillovers to other parts of US financial markets, like the US Commercial Paper which is dead, totally dead, nobody can issue Commercial Paper in United States now. So we have to hope that this is a temporary phenomena and that the extraordinary steps that the Fed is taking through the "discount window" and other devices are going to solve the problem and limit the damage to the CDO market, that firms with decent credit can issue Commercial Paper again and get lines of credit from the banks again, the banks are not lending either. There was an interesting article by David Wessel in the *Wall Street Journal*, much quoted here yesterday, where he asked whether the Fed had the capacity to get the Commercial Paper Market and bank lending up and running or not whether its tool box was adequate to the task or whether this highly uncertain risky environment you can give the banks liquidity and they are just going to sit on it, the liquidity trap a la Japan in a different form, this time driven by risk rather than low interest rates. So we are just going to have to wait and see.

The other reason to think this will be a problem, a big thing driving consumption in the United States has been mortgage refinancing and US households have been taking an average of 750 billion dollars a year, that's actually real money, even by the size of the US economy, out of their homes through refinancing at lower interest rates each year for the last few years and now that has stopped. So that is going to be a negative hit on consumption independent of these little financial difficulties in the market for CDOs.

What caused it, what have we learned from it, what could we do to prevent it from happening again?

I would point to three things. I would point to the delicious irony that these are things that the United States and the International Monetary Fund criticized Asia for ten years ago. Now everyone is going to criticize the United States for them, instead one is lack of transparency, nobody knows what is actually in these securities or what is actually off these balance sheets and what the risks are, greater financial transparency is going to help. But the other thing we have learned and will be useful for Washington to know is that transparency can only get you so far. Every time the regulators demand more transparency, the rocket scientists find a way of packaging and disguising the risks, so transparency is going to solve the problem of volatility but it is going to help.

Secondly tighter bank regulations, the problem here has been that the banks have been moving off balance sheet risks that regulation is designed to contain, so they have been creating investment conduits off balance sheets to which they have been lending short that have turned around and invested long in thirty years mortgages. So to tighten up the bank regulations again in the United States and make it work. Bad bank regulations were another thing that the US and the Fund came to Asia and slapped everybody's wrists is a problem in the United States too.

Third the rating agency problems, the rating agencies I think have had a conflict of interests. They have advised customers on how to structure security issues, they told them that if you structure them in the following way that this will get a Triple A rating and then they have an incentive to give it a Triple A rating. So I think that firewalls or regulations that prevents the same companies from doing these two different activities that creates a conflict of interests would be desirable as well. So Asian concerns about the operations of major credit rating agencies, here's a silver lining that will now be taken more seriously I think in Washington DC.

Q First of all my congratulations to you for a presentation on many complex issues. I would like to go back to the trade issue. As you might have of heard the Korean government is pursuing simultaneous multi-track FTAs. According to the governments plan they wish to make FTAs with 52 countries by 2012 and then among Korean trade about 55% will be made through FTAs. What do you think these policies under bilateral trade free trade agreement-era versus the multi-lateral approach?

That is the first question and the second question is you already mentioned a very pessimistic view about the ratification process on Capitol Hill. Do you think that some kind of negotiation with Korea and the EU and other competitors will expedite the ratification process on Capitol Hill?

A I like most economists would prefer multi-lateral liberalization and another WTO Round than more bilateral agreements. I come to Korea I enjoy Monte Sauvignon Cabernet but I would much rather see California wine being sold and consumed here. So there is this trade diversion cost going the bilateral route, but I think the multilateral route is not going to be productive now for a while, mainly from the protectionist inclination in the US and because India and Brazil are becoming more assertive which just complicates the process of getting everybody aboard for a global trade round.

So, in this second-best world it makes sense for Korea to pursue bilaterals instead and in that context the more the better. There is a problem that negotiators can only deal with so much at any point in time, the US has only so many skilled trade negotiators, Korea has only so many trade negotiators, and so you can't do 53 simultaneously. But I think to do them relatively quickly in sequence makes sense, it is a desirable second-best strategy when the first-best is not available. And I think in that context another benefit of pursuing the FTA with the EU is to ratchet up pressure on the US that Korea has alternatives. I'm not sure that would make a big difference. To play the security card would be the most effective tactic. But the FTA with EU has its own merits.