

Independent Investor

FOUNDER AND EDITOR/Jonathan Davis

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The First Cuckoo of Spring? Is Japan a Buy?

Sandy Nairn, the CEO of Edinburgh Partners, has been a regular contributor to Independent Investor over the years, making several highly prescient calls along the way. He was extremely cautious in November 2007, just as the markets were starting to anticipate the full extent of the banking crisis, and bullish once more in March 2009, when the equity markets finally bottomed out after the severe 2007-09 bear market. In this latest contribution, he looks in depth at the Japanese market and argues that there is cause for optimism about its prospects, despite many years of poor relative performance.



IMPORTANT INFORMATION

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Is Japan Cheap – and If So Why?

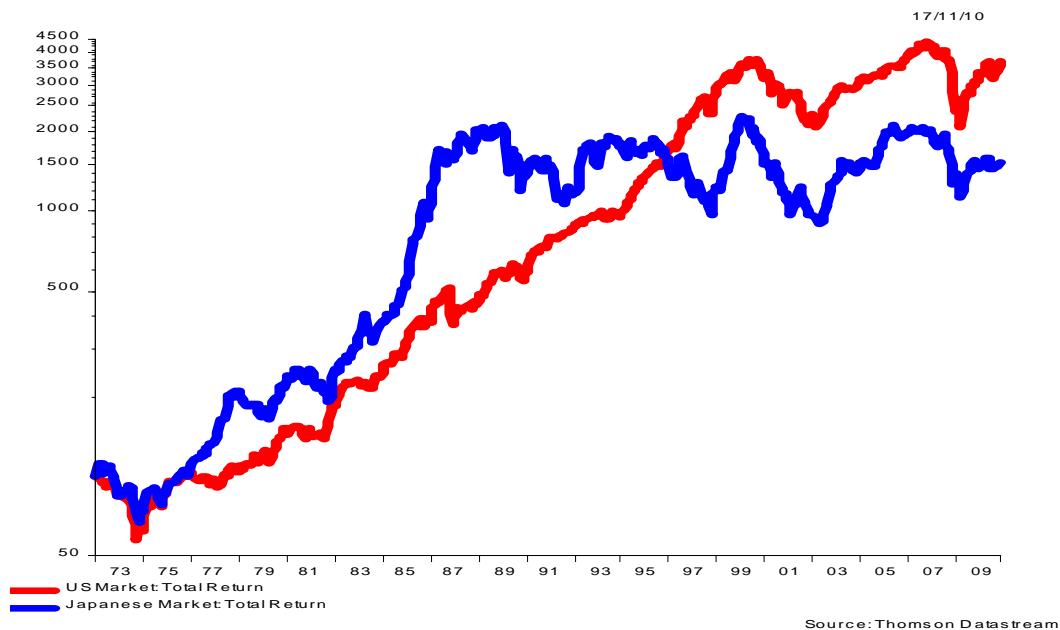
I. Introduction

"Every year a manager turns up and tells us that the Japanese market is cheap, it is like the first cuckoo of spring!"

The sentiment expressed above paraphrases a recent comment from a large blue chip institution in response to the expressed view that we are now finding cheap stocks in Japan. For almost twenty years the Japanese market has either stagnated or fallen, interrupted only by periodic and short-lived rallies. By comparison, markets such as the US have continued to rise; albeit with recent history not proving particularly rewarding. Understandably therefore a degree of scepticism existed.

The graph below shows the total return from the US and Japanese markets using a logarithmic scale. The US dollar return from investing in the Japanese market has been effectively zero since the late 1980s. Why would this time be different from previous years?

Chart 1. Japanese and US markets total return in US\$ since 1973



The questions for investors are whether these poor returns are a consequence of the profit experience and whether this profit experience is likely to continue. Our work on individual companies has for some time been suggesting that value is emerging. This note is intended to examine whether what we are seeing at the corporate valuation level is supported by macro level considerations or whether it is simply another false dawn.

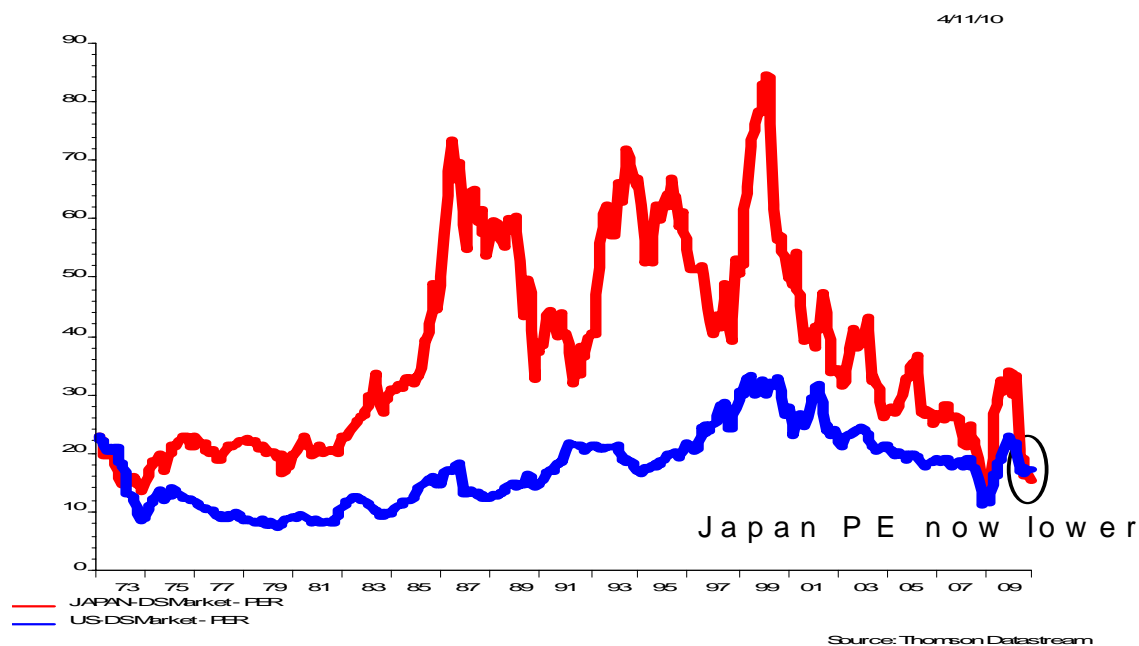
II. Valuation - Are Japanese Equities Cheap?

The short answer is that they certainly look cheap. For over twelve months we have been finding increasing numbers of stocks that we believe to be cheap on a long-term view.

At a market level, during September something happened which has not been seen since 1973: the historic PE multiple of the Japanese market (in red below) fell below that of the US market (the blue line). This meant that it had a lower PE multiple, a higher yield and a lower price to book ratio. That three historic valuation measures show Japan being cheaper than the US does not necessarily mean that Japanese companies are cheap, but it does suggest that if they can deliver future growth then there is a meaningful possibility that this time they are actually worth buying.

This is the first time that this statement can be made in nearly 40 years.

Chart 2. Comparison of Japanese and US market P/Es since 1973



Valuation Measures October 2010

	Japan	US
PE	15.9x	16.0x
Dividend Yield	2.0%	1.8%
Price: Book	1.0x	2.0x

Source: Datastream

The critics of Japan point to 20 years of terrible stock market returns and the fact that many component companies seem unable to make decent profits. This is evidenced by profit margins which range between one third and one quarter of those earned by their competitors. "Asset rich but profit poor" is a constant refrain and one that is borne out by history. US companies have historically earned vastly superior returns on equity than their Japanese counterparts.

Thus, they would argue, the fact that the Price:Book ratio is so low is simply a reflection of the terrible returns that Japanese companies have earned on their equity. This may have been the case in the past but

it is still significant that on this valuation measure the Japanese market is the cheapest it has been in over 30 years.

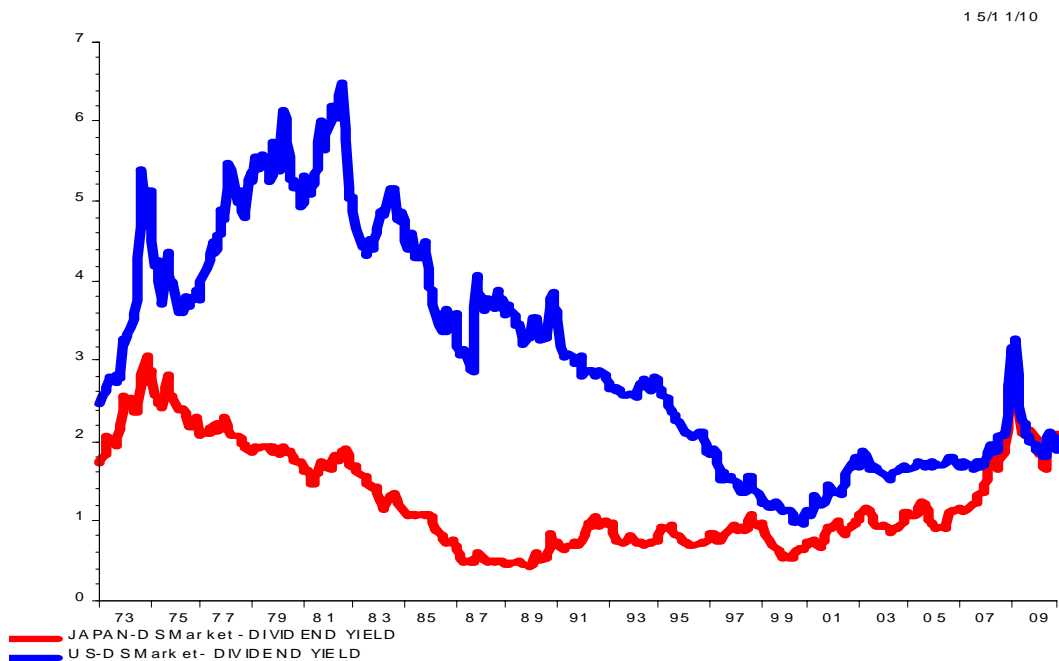
Chart 3. Historic Japanese price:book value over 30 years



Source: Thomson Datastream

Equally, the yield on the Japanese equity market (again, the red line in the chart below) has never exceeded that of the US for the entire period shown. It now does.

Chart 4. Comparison of Japanese and US dividend yield since 1973



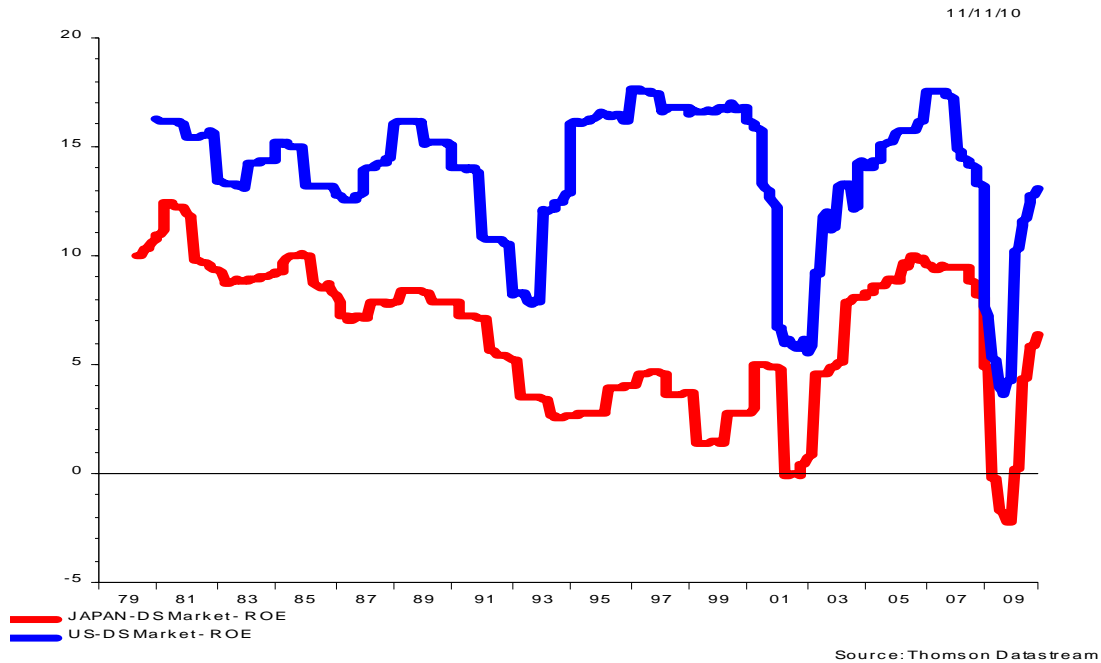
Source: Thomson Datastream

III. Corporate Performance - Is the Apparent Low Valuation Just a Reflection of Poor Prospects?

On the three valuation measures above Japan appears, at the very least, interesting. It therefore demands further analysis on how profits may unfold in future years. To do this one first needs to understand what the

historical experience has been. Given the historic low in the Price:Book metric, it is worth beginning with an examination of the returns Japanese companies have been earning on shareholders funds. This is termed Return on Equity (RoE). The graph below illustrates the point made concerning the low returns earned by Japanese companies.

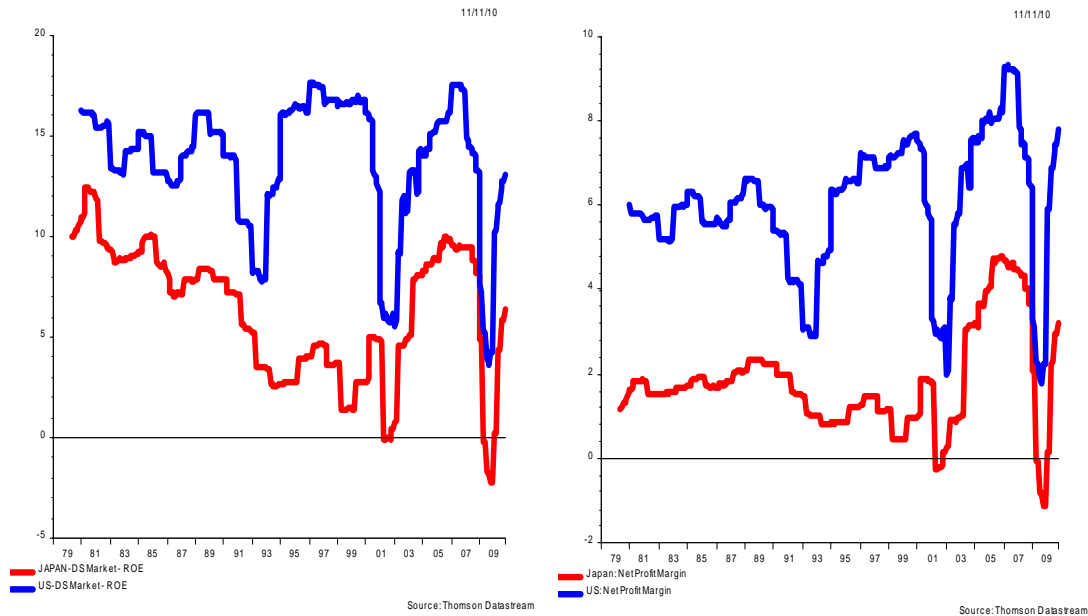
Chart 5. Comparison of Japanese and US ROE over 30 years



Historic Return on Equity

Return on Equity (RoE) measures the amount of after tax earnings earned relative to shareholders funds (also termed shareholders equity). This is influenced by a range of factors including balance sheet structure, cost of debt, taxation, depreciation policy and sales to assets. These can be isolated by breaking RoE down into a series of component parts. This so-called DuPont analysis is named after the organisation which popularised its use as an analytical tool.

When this analysis is conducted at an aggregate level for the Japanese and US markets, the reason why RoE has been lower in Japan than elsewhere is clear. It is not the result of debt levels (leverage), nor the use of assets (asset turn), nor differences in taxation or interest costs. The explanation is simply that Japanese companies have historically earned lower profit margins than their global counterparts. The left hand graph shows a comparison of the RoE earned by Japanese companies with those in the US, while the right hand graph compares the net profit margin of the two markets.

Chart 6. Comparison of Japanese and US ROE (left) and net profit margins (right)

The direction of the relationship between margins and return on equity is clear from inspecting the charts. The patterns are almost identical. What is also noticeable from both charts is that whilst US margins recovered after the recession of the early 1990s, those in Japan remained much lower, reflecting the condition of the domestic economy. The focus therefore needs to be on why Japanese profit margins have been so persistently low. There are a number of possible explanations. One possibility is that the difference in margins is related to the different industry structures of each market.

Why Are Aggregate Japanese Returns and Margins Low?

(i) Market Structure

The principal differences between the Japanese and US indices are that consumer goods and industrials account for nearly 45% of the Topix index, but only 22% of the S&P. By contrast, the S&P has nearly 40% in technology, healthcare and oil and gas, compared to 13% in these sectors in the Topix. Since technology and healthcare typically have higher margins than consumer goods and industrials, superficially this might explain the difference at an aggregate level.

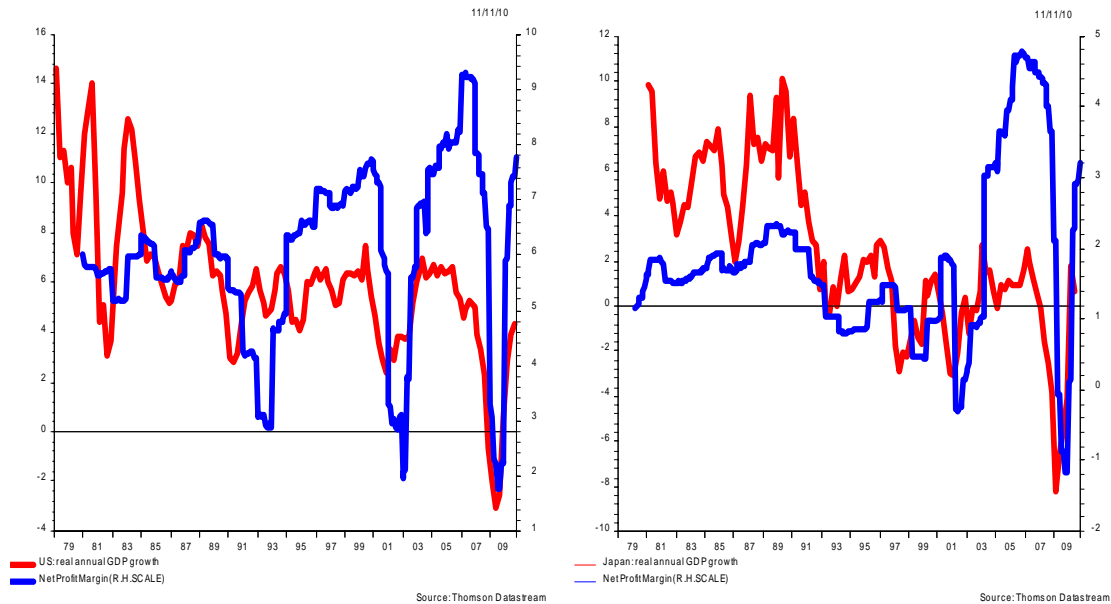
It is possible to try and gain a rough guide as to how important these differences are by creating an aggregate margin on the assumption that the two indices had the same structure. If the Japanese market had the same sectoral distribution as the US market, the average margin of the Japanese market would only increase by 1%. In other words, whilst the structure of the two indices are different, this explains only a very small part of the difference in margin.

(ii) Cyclicality

If the answer does not lie in the composition of the market, what about macroeconomic factors? We know for example that Japanese domestic growth was stagnant or negative for large parts of the 1990s, whilst US

domestic growth was quite the opposite. It is well known that company profitability varies with the economic cycle, and so profit margins and RoE are the product of both company action and the prevailing economic climate. In the short-run both are highly cyclical. The challenge is to split out these cyclical elements from longer term structural differences (which themselves may not necessarily be stable, depending upon industry and product cycle influences).

Chart 7. Comparison of Japanese (right) and US (left) annual GDP growth with net profit margin



The charts shown above clearly illustrate how margins, and hence RoE, are impacted by the economic cycle. In particular, they suggest that the low nominal and real rates of growth which Japan experienced during the 1990s are likely to have been a major contributory factor to the slide in profit margins. After the anaemic recovery from the recession of the early 1990s, real Japanese GDP growth has stagnated for ten years.

That margins fell should not be a surprise given that the environment was characterised by the following:

- No growth in private domestic consumption
- An absence of inflation and, in fact, periods of deflation
- Falling nominal and real wages

This contrasts with the US where over the same period consumption, inflation and real wages all grew at approximately a 3% annual rate.

(iii) Domestic Economic Factors

One way to look at the impact of domestic economic conditions is to select a sector in which global competition is the key. In sectors where Japanese companies and their main competitors operate globally, one might expect to see smaller differences in margins. The obvious global sector to pick is the auto industry, given its pervasive nature. In the graphs below we can see that whilst margins vary at both an individual company and the sector level there is no obvious pattern of a sustained difference in margins. There are periods when one country or company does better, but this is no more than expected. The other

'global' sectors tend to support this conclusion. Examples include the industrial engineering and electrical equipment sectors.

Chart 8. Margin Comparison: Toyota, Renault and Ford

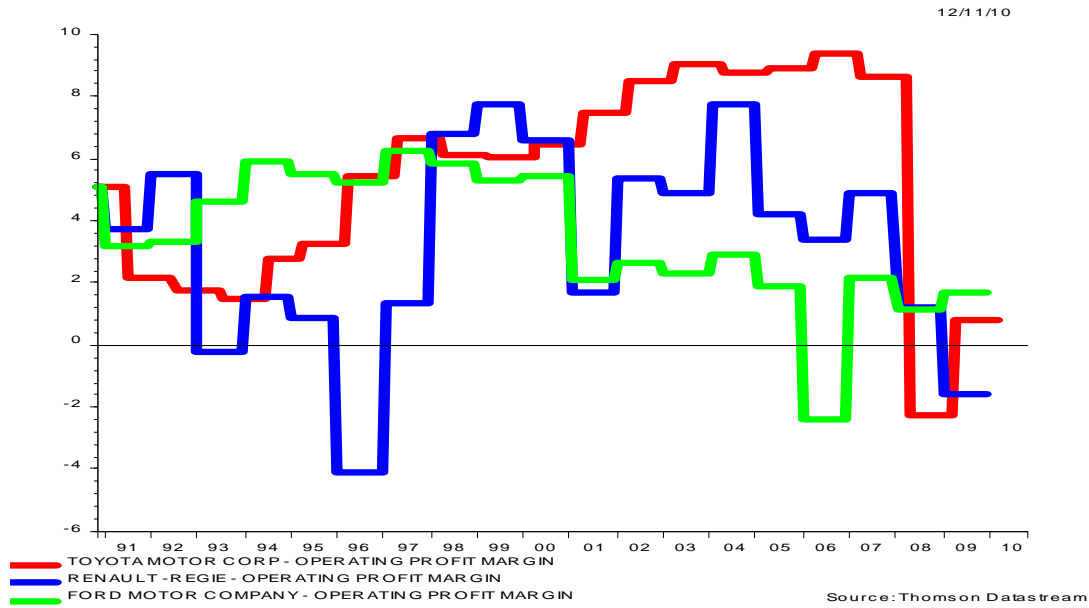
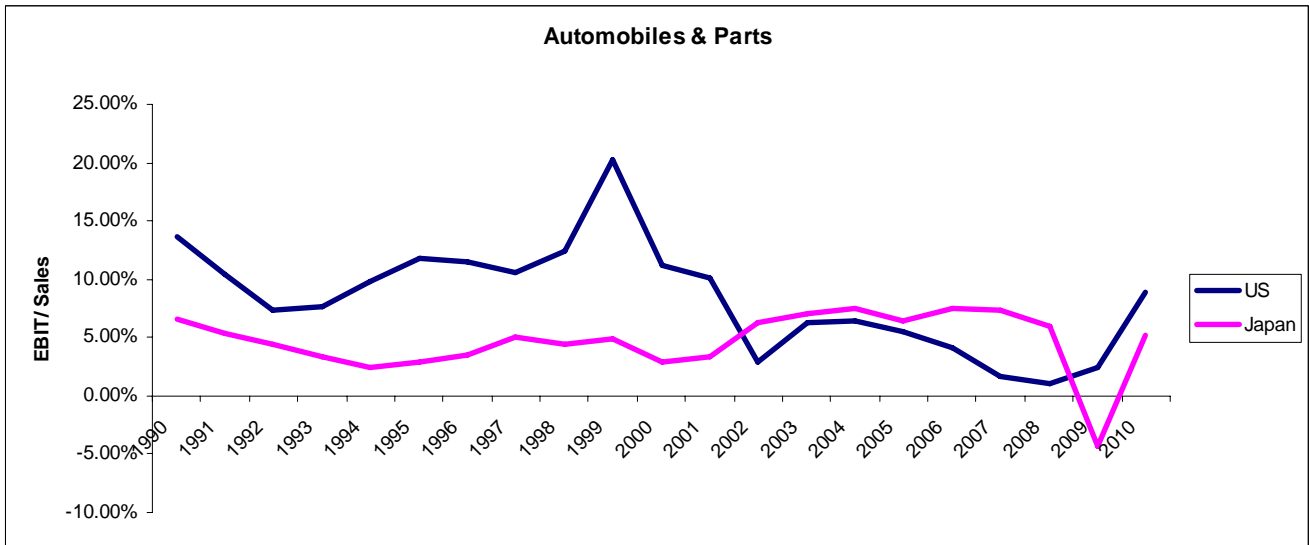


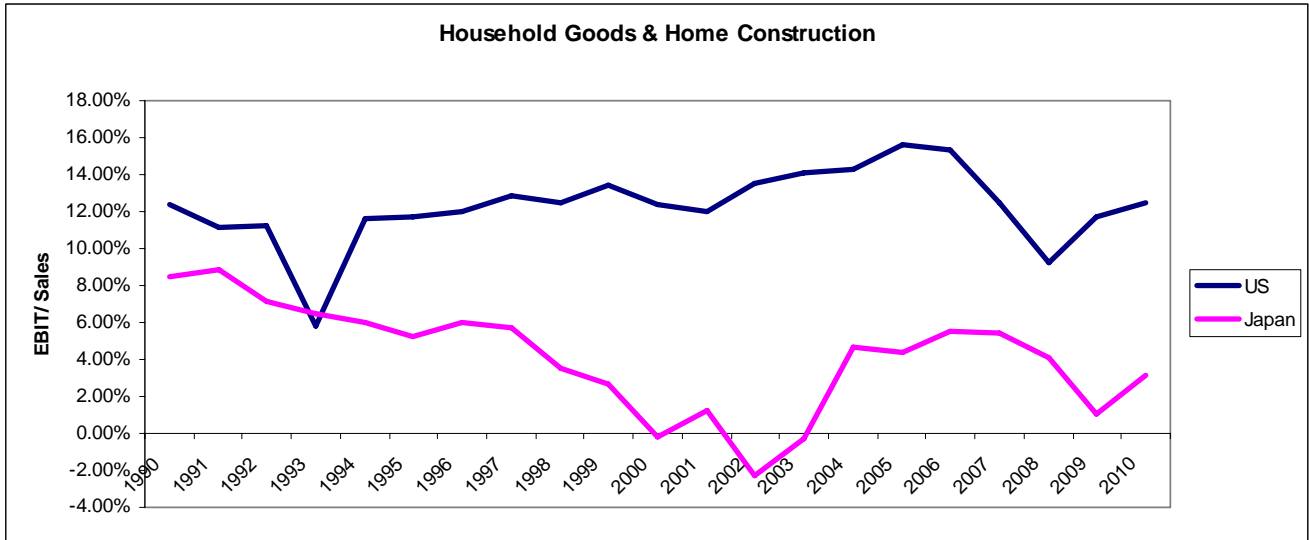
Chart 9. Margin Comparison: Automobiles



Source: Datastream

Conversely, since the domestic Japanese economy was much worse than that of the US through the 1990s it would be reasonable to expect that this would be reflected in the profitability of domestically focused sectors. Using the Household Goods and Home Construction sector as a proxy, we can see that this does appear to be supported by the evidence. In general, while there are obvious exceptions the more domestically skewed a sector happens to be, the worse the relative margin position.

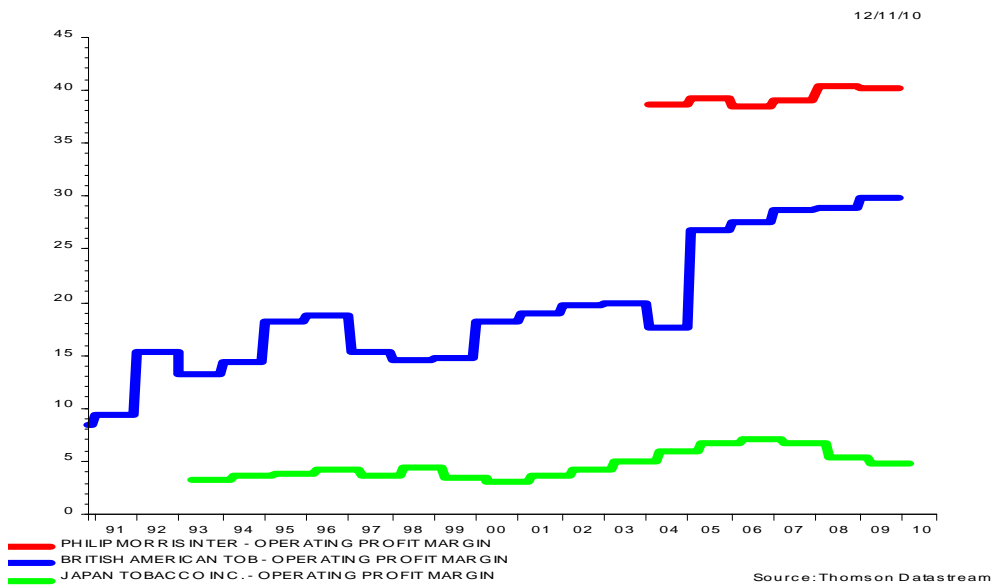
Chart 10. Margin Comparison: Household goods



Source: Datastream

The role of Government is also a potential factor. The Japanese Government is highly interventionist in taxation policy and in setting prices for a number of industries. For example, if one looks at the tobacco companies, one can see the impact of the Japanese Government on profitability quite clearly. The margins achieved by Japan Tobacco Inc (the bottom line in the graph below) are substantially below those of BAT (blue line) and Philip Morris (red line).

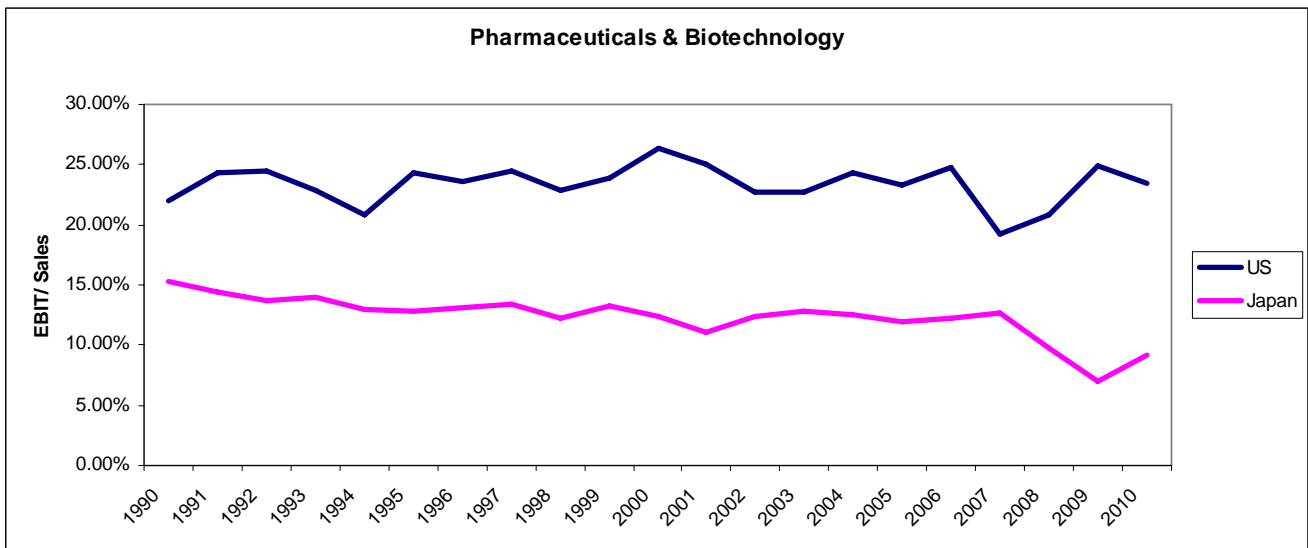
Chart 11. Margin Comparison: Philip Morris, BAT and Japan Tobacco over 20 years



Similarly, the price control regime on drug pricing in Japan is draconian by comparison with that of the US and the impact of this can be seen in the chart below. The domestic straitjacket in Japan also explains a number of demonstrably expensive overseas acquisitions made by Japanese companies in industries where domestic Government control is an issue. Using the cash-flow generated by constrained domestic businesses to acquire overseas entities with higher returns is entirely sensible. The only problem is that

there has been a track record of Japanese companies overpaying for these acquisitions. The most notable examples are to be found in the food and tobacco sectors.

Chart 12. Margin Comparison: Pharmaceuticals



Source: Datastream

(iv) Conclusions About Return on Equity

When one looks at companies which are broadly comparable on a global basis, there is no evidence that Japanese companies are incapable of achieving margins which are consistent with those earned in the rest of the world. Thinking about it another way, the view that the Japanese cannot earn Western margins is as misplaced as the view that they necessarily will. Certainly there are some industries where direct Government intervention on pricing has, and will continue, to play a role but Japanese companies have consistently demonstrated their competitiveness and profitability in free international markets.

The key depressant on profitability has been the miserable domestic economy. When the domestic economy recovers as the effect of historic restructuring works its way out of the system and increasing liquidity is injected, profitability from domestic operations will recover sharply. When this happens, expect to see return on equity rise.

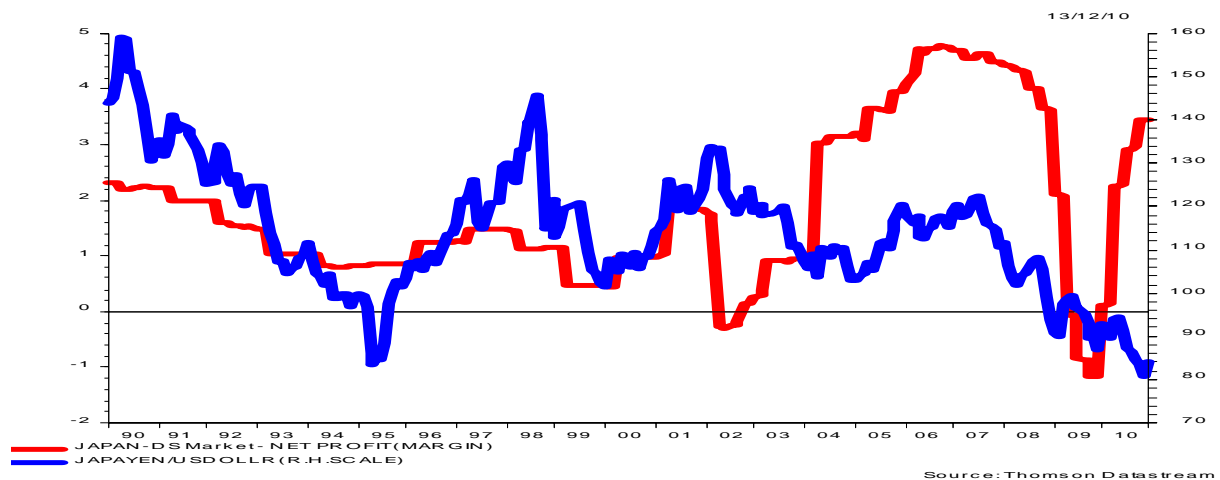
IV. Macro Factors - The Importance of Exchange Rates

The other influential macro factor has been the Japanese currency. Since 1973 the yen has appreciated from nearly 300 yen to the dollar to its current level of around 80 yen to the dollar. In the long-run exchange rates act to clear the effect of different national inflation rates, and Japan's lower inflation experience has clearly been the primary explanation for the yen's persistent strength. The impact of exchange rate movements on profitability is more difficult to gauge however.

To begin with, they are only one factor out of many at any point in time. At a company level the impact can be affected by many company specific factors, such as hedging policy, productivity and plant location. Macro factors such as growth rates and fiscal policy also can be important contributors.

Nevertheless, from the chart shown below it is reasonable to suggest that sharp currency movements have indeed been associated with changes in profitability. When the yen has risen meaningfully, Japanese corporate profit margins have typically fallen, albeit in recent times this has been overwhelmed by the global recession and post recession recovery.

Chart 13. Comparison between value of the Yen and net profit margin

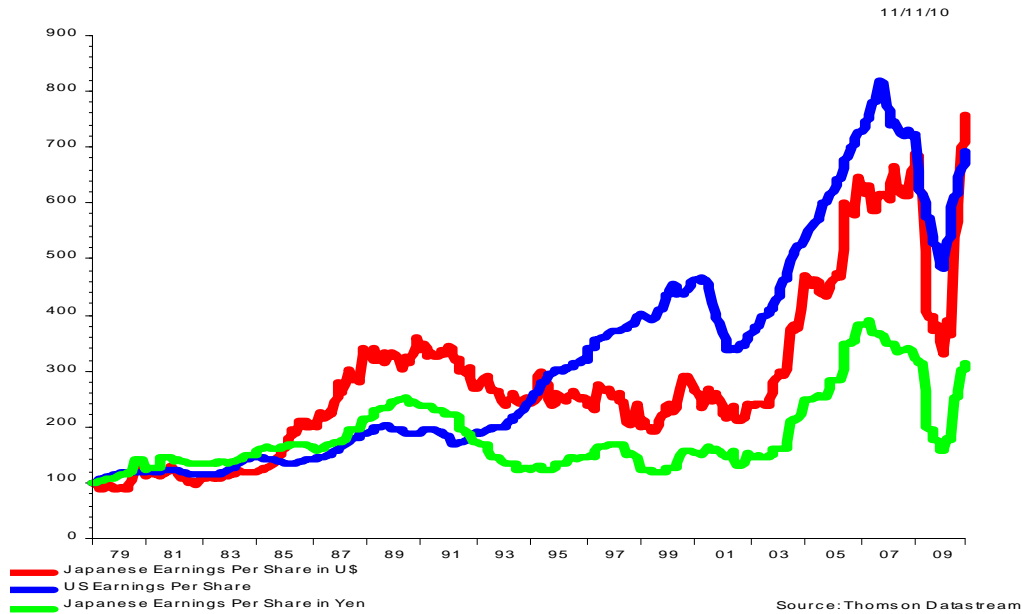


V. Profits Over the Long Term

The earnings per share experience for the US and Japan since 1973 is shown in the chart below. The blue line of the US illustrates the growth which has been witnessed in the US while the green line is that of Japan. The pattern and timing of growth is obviously not identical, reflecting the different conditions of the two economies over the period. For example, in the 1980s Japanese profit growth was substantially faster than that of the US. In the 1990s Japanese profits fell, whilst those in the US rose. Since 2000 the experience has been broadly similar.

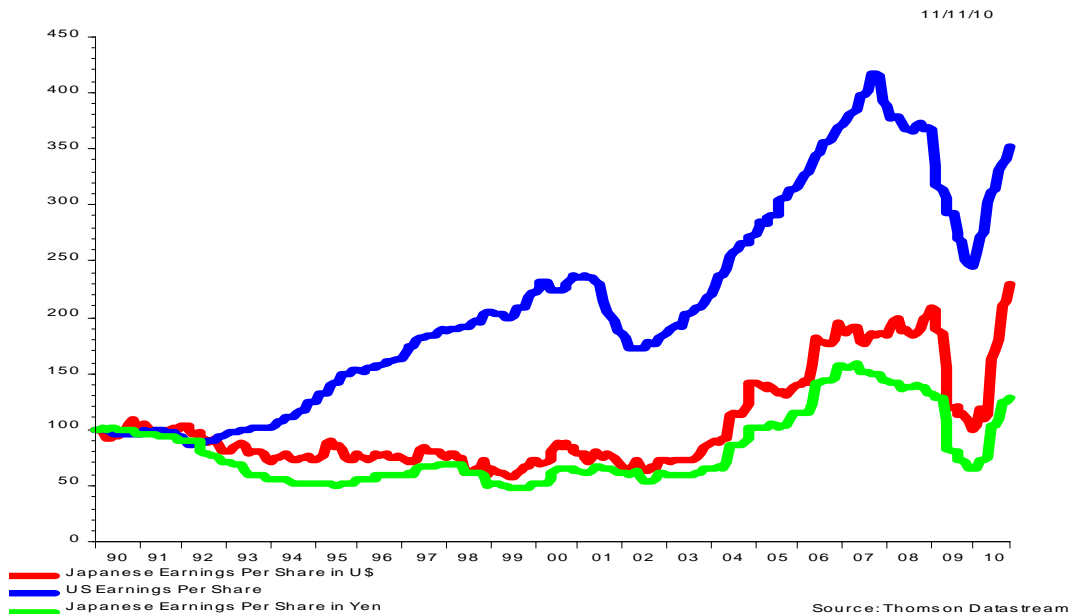
Interestingly, if you convert the earnings into a constant currency (the red line), it shows that Japanese earnings growth over the full period has actually been no worse than that of the US. This only becomes apparent if profits are measured in a single comparable currency.

Chart 14. Comparison of Japanese and US earnings per share since 1973

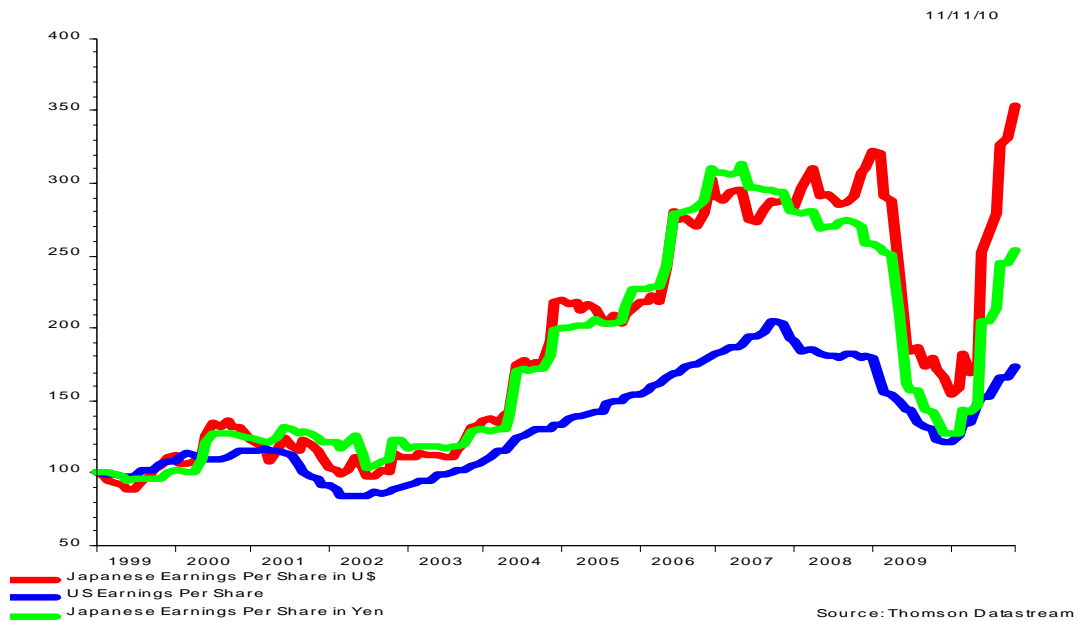


For most investors it is clear that attitudes towards Japan have been heavily coloured by the dramatic collapse of the market since 1989 and the long deflationary period of stagnant growth in the 1990s. If one looks at earnings over this period, it is easy to see that earnings growth in the US easily outstripped that of Japan in both US dollar and Yen terms. Combine this with all the other known negatives about Japan, and it is easy to see why most investors believe it to be a market to be avoided.

Chart 15. 20 Year Comparison of Japanese and US earnings per share



The impact of the deflationary period of the 1990s can be seen in the longer-term charts. However, the chart below paints a very different picture. It shows that recent Japanese earnings growth has not only been robust, but has easily exceeded that of the US. This is true in both yen and dollar terms.

Chart 16. 10 Year Comparison of Japanese and US earnings per share

What the foregoing suggests is that the lack of returns for investors over the past 20 years is a result of an extended period of poor profitability through the 1990s, combined with the gradual deflation of an overvalued market. Since 2000 the market has continued to perform less well than earnings growth would have suggested until it has reached the point where its valuation is now lower than that of the US. A continuation of this earnings performance would suggest that it is an attractive investment destination. Certainly, the evidence does not support the prevailing wisdom of congenital profit underperformance.

VI. Macro Factors - The Fiscal Position and Demographics

Whilst profit performance may have improved in the past ten years, the bears would argue that the future is much darker. With the ratio of debt to GDP qualifying as the worst in the developed world and an aging demographic profile, the critics argue that the days of Japan being able to self-fund its deficit are limited. In turn this paints a gloomy scenario where the likelihood of domestic economic recovery is blighted by the fiscal overhang. Again, it is important to understand the dynamics of what has happened in order to be able to put these questions in a proper perspective.

The long-term bear case on Japan largely rests upon the interaction of key features of the Japanese economy. The first is the size of the national debt where as a proportion of GDP it is well over 200% and substantially higher than the current perceived basket cases of Greece and Italy. The second follows from the impact of the aforementioned ageing population on economic growth and the future funding of that debt. Let's consider each in turn.

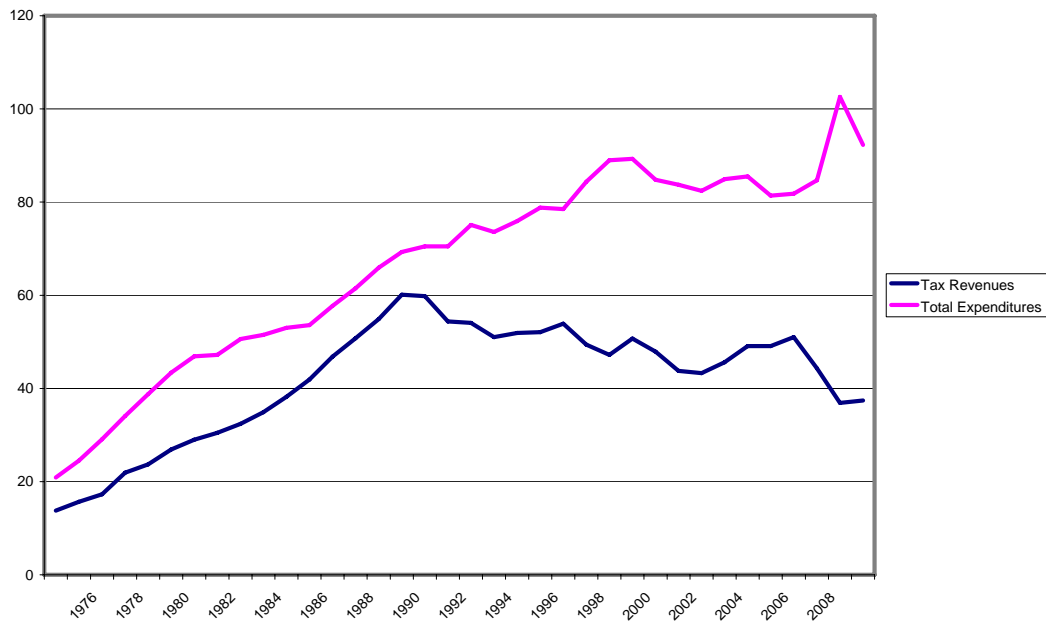
(i) National Debt

Although the national debt of Japan is largely financed out of domestic savings and therefore not reliant on foreign bond investors, this is seen as unsustainable given the aging population and the decline in the national savings rate. Before looking at the demographic and national savings questions it is worth first examining how the debt arose in the first place.

One common, but mistaken, assumption is that the cause of the increase in debt in Japan was similar to that which has subsequently occurred in Western economies, where a seemingly inexorable rise in Government expenditure has eventually created an unsustainable fiscal position. In fact, although Government expenditure in Japan has risen over the period, it has done so at an annualised pace of somewhere just over 1%, which is hardly explosive.

To give that some perspective, expenditure by the US Federal Government rose at an annualised nominal rate of approximately 5%. In both cases these figures are to 2008 to exclude the various packages enacted post the 2007 banking collapse and recession. If the post 2007 period was included the gap in expenditure growth between the US and Japan would be even wider. Whilst a gap of 4% in the rate of growth may not seem like much, what it means is that by the end of the period US Federal expenditure had risen by just short of 140% whilst Japanese government expenditure had risen by less than 20%.

It is emphatically not growth in expenditure that has led to the ballooning national debt in Japan. The principal cause has been the extended collapse in tax revenues. Both the corporate and personal income tax take have declined over the past 20 years to such an extent that the nominal tax revenue in 2007 was some 15% lower than in 1990. By comparison, in the US tax revenues had grown at a similar pace to the level of expenditure and consistently in line with nominal GDP growth. Clearly since 2007, as a result of the global recession the picture had worsened to the extent that by 2010 Japanese government revenues had dropped by one third from the 1990 level.

Chart 17. Japanese Government Revenues and Expenditure (Yen tr)

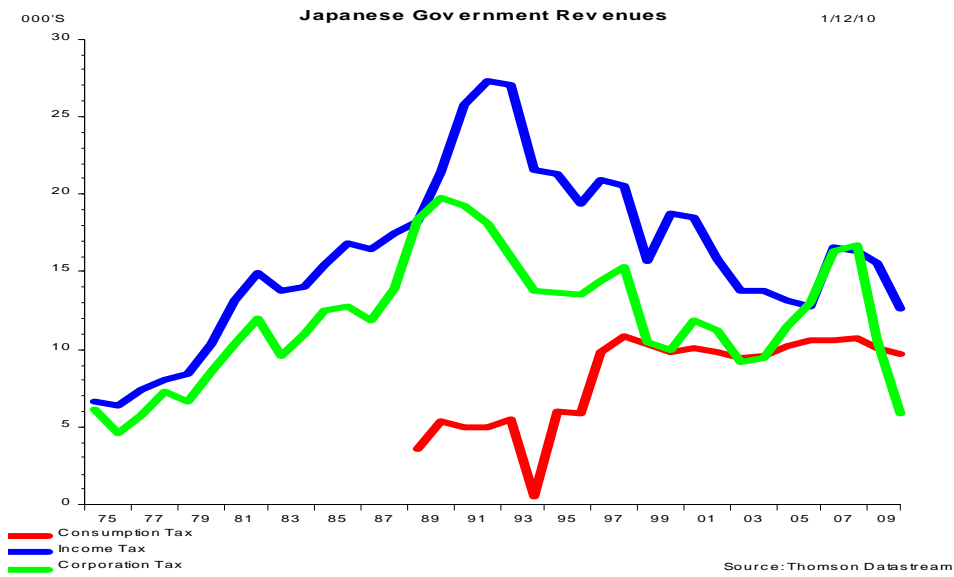
Source: Ministry of Finance, Japan

The fall in tax revenues has been truly startling. Yet the root cause is fairly obvious. Revenues tend to grow in line with nominal GDP. As the asset bubble deflated and the financial sector retrenched in the 1990s, nominal GDP in Japan was largely stagnant. The periodic rises in the yen exacerbated difficult economic conditions for corporate Japan and hence restructuring and declining real wage growth characterised much of the decade.

Decreased total employment and lower real wages led to falling income taxes. Restructuring and higher exchange rates led to lower profits and hence lower corporate taxes. The vicious combination of the two created the outcome of sharply lower revenues and the national debt that we now see.

It is important to note, as can be seen from the chart below (Chart 18), that corporate tax receipts were rising meaningfully until the most recent recession. Given the improved corporate profits we are currently witnessing, it is reasonable to expect that this upward path will be resumed in due course.

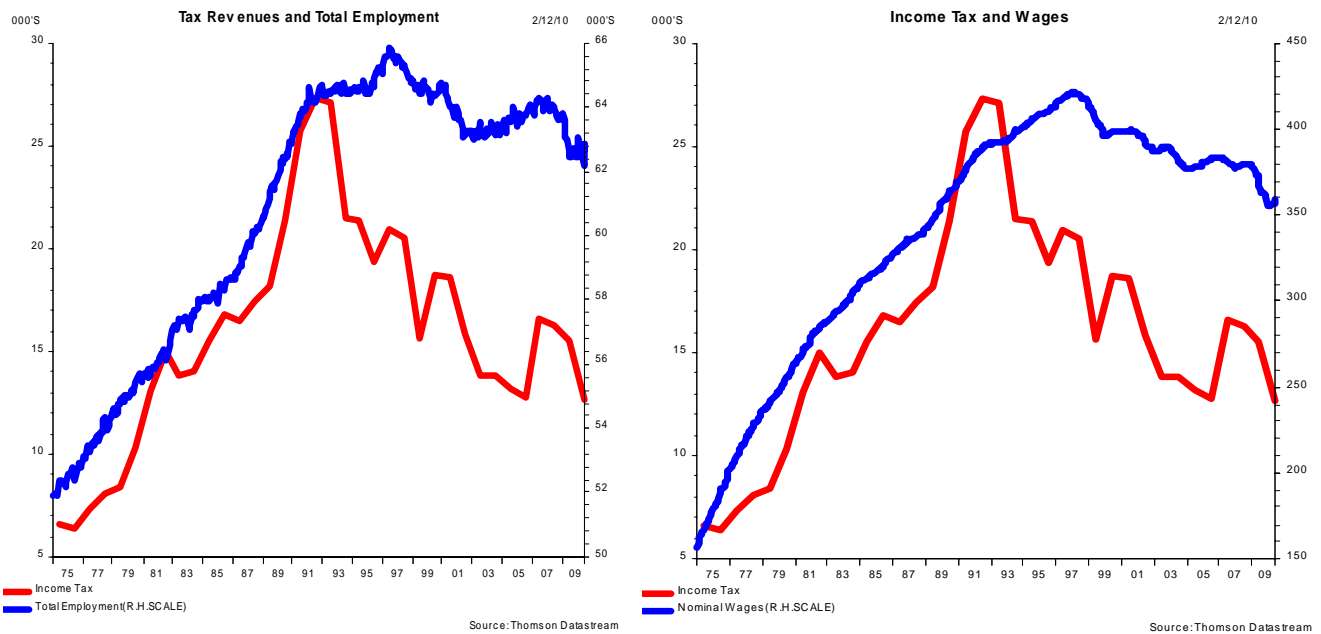
Chart 18. Split of Japanese Government Revenues



(ii) Demographics and Savings Rate

Demographics have undoubtedly played a role in the decline of income taxes, but it is relatively minor in relation to that played by the economy of the 1990s. The two major factors were the decline of total employment as a consequence of the recession, and the fall in real wages in response to both domestic conditions and the impact of exchange rates and restructuring. The charts below show how total employment has fallen and wages stagnated over the period and how income taxes have fallen as a consequence.

Chart 19. Income Tax Revenue and Employment/Wages



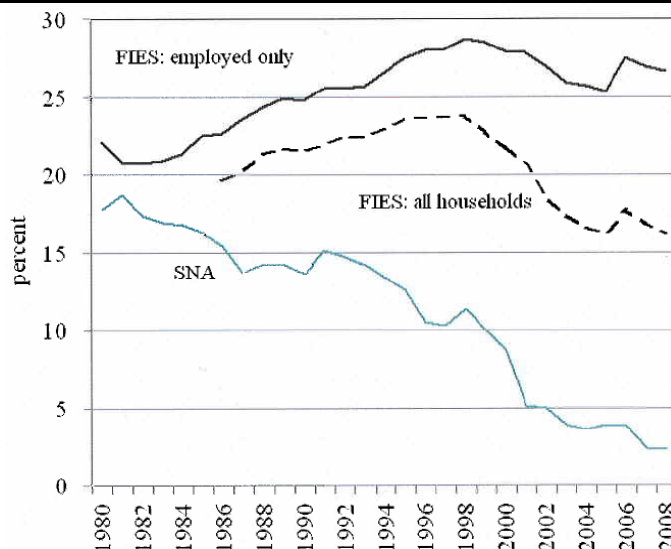
The employment losses have contributed to a marked reduction in the Japanese savings rate over and above the longer-term demographic trend.

In fact, the Japanese household savings rate has been on a downward trend since 1980. It is important to stress that this is the household savings rate, and not total savings, since the corporate sector has in large part filled the savings gap over the period. In part the decline in household savings reflects the changing demographic profile, as the relatively low fertility rate causes the society to age. However, overlaid on top of this has been the impact of the economy. In particular, the experience of the 1990s has distorted the pattern of change and may well have given rise to misleading interpretations.

The 1990s seems to have witnessed two different impacts. In the early part of the decade the corporate response to the economic downturn was to hire less new labour. Following the banking crisis of the late 1990s the response was to restructure and lay off older employees. The likely result of each of these responses is different. The older employees are more likely to maintain consumption with reduced savings, given that they have had a longer period of accumulating wealth. As a consequence the impact is likely to be greater on the savings rate. The corollary of this is that the restructuring should result in higher profitability for corporations and this should in turn manifest itself in higher corporate 'savings'.

As we have seen there is evidence to support these contentions. The graph below shows the savings rate in Japan under different definitions. Under the GDP definition we can see that it has declined progressively over time with a sharp decline from the late 1990s. However, using data from the Family Income and Expenditure Survey it can be seen that for those in employment the savings rate has actually risen and for those in employment and seeking employment it has fallen much more modestly.

Chart 20. Savings Rates: Family Income and Expenditure (FIES) and GDP Measures (SNA)



Source: PRI Discussion Paper Series (No. 10A-06)

It is therefore reasonable to assume that if the economy were to improve, discouraged workers would return to the labour force and both participation rates and the savings rate would recover. Whilst demographics suggest that the fall in the savings rate is a long term phenomenon, it is likely to continue at a much more sedate pace than recent experience might suggest. It is also worthy of note that long-term population projections are fraught with danger and are typically wrong. Fertility rates and migration tend to react to population changes such that the population rarely trends towards explosion or extinction.

(iii) Refinancing bonds at higher rates?

The final argument in Japan relates to the cost of refunding the deficit as existing bonds mature and require to be rolled over. To the extent that inflation creeps into the system, then presumably bond investors will require a higher yield to protect their real returns. As a consequence the cost of debt refinancing will rise.

Certainly in an environment of higher inflation it is likely that the nominal yield on bonds will be higher than otherwise. How much of an impact this carries depends upon the relationship between the incremental yield requirement and the incremental nominal economic growth. If Japan had, for example 2% inflation and an accompanying 1% higher bond yield, then additional tax revenues and reduced debt would more than compensate for the additional cost. In addition, since the current yield on Japanese bonds is lower than the yield at which currently maturing bonds were originally issued, the refinancing of these bonds is taking place at a lower cost. Eventually this will change, but it is not obvious that the change will be negative as an aggregate effect.

Demographics and the national debt are significant factors. They are not terminal in the sense that the situation cannot be retrieved. The key is economic recovery which helps employment, profits (and savings) and hence tax revenues. Fiscal stimulus is out the question and the route of monetary expansion being followed by other nations seems to be most appropriate for the conditions faced by Japan. Should this occur one can see how some of the seemingly inexorable negative trends may be perceived with less certainty than they currently are.

VII. CONCLUSIONS

In summary, there does not appear to be any evidence that Japan is congenitally unable to grow earnings in a manner which is comparable to other international markets. Nor does it appear that the Japanese economy is doomed to stagnation. It is clear that Japan's relative earnings growth varies dramatically between different periods and reflects the damage done by the extended deflationary period of domestic economic stagnation.

The Japanese market is now on a lower historic PE multiple than that of the US. It has outstripped US earnings growth over the past ten years as the impact of the 1990s deflation has worn off. The earnings

growth has been achieved at much lower levels of profitability. Partly this reflects some specific Japanese traits in terms of Government intervention, but mostly it remains a consequence of the combination of a weak domestic economy and an appreciating exchange rate.

If either of these two macro factors were to reverse, then it would be reasonable to expect a degree of margin expansion. Note that future earnings growth is not conditional on this happening, as growth is already happening. It would however be enhanced by such an outcome. At an individual company level it is clear that much of the incremental growth has derived from the growth of other markets in Asia.

This is not surprising given the areas of Japanese strength and the proximity of these markets. It is likely that this will continue, given that the future for China lies in increased consumption and moving up the production value chain. Consumer electronics and manufacturing/automation are areas where Japan continues to hold strong market leadership.

Whilst earnings growth has outstripped that of the US in recent years, stock market returns have not kept pace over the same period. That is the main reason why the valuation of the Japanese market has fallen to the point where it is now cheaper than that of the US.

Investors still seem to view Japan through the prism of the deflationary experience of the 1990s and an overvalued stock market. This is now outdated. The market has spent twenty years deflating and the economy is no longer stagnant. The correct context, we suggest, is to look at what has happened to profits over the past ten years in the context of where the valuation is now. Under this scenario there are attractive investment opportunities which are being ignored by the world.

What we have been finding when analysing Japanese companies does not seem to be contradicted or undermined by taking a macro view. There genuinely are cheap Japanese companies around.

SUMMARY

- Aggregate profit margins in Japan have been persistently lower than those in the US for an extended period.
- Part of this difference is explained by the different structure of the two stock exchanges. The US simply has more companies in higher margin industries.
- The main explanation lies in the combination of economic growth, domestic inflation and currency movements.
- Valuations have now fallen sufficiently for Japanese profits growth to translate into higher potential returns for investors.

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