FT DEUCHLAND SHIP FINANCE CONFERENCE
Session 1: Winners and losers – ship finance following the serious crisis

SMM Hamburg,
6th September 2010
Final

"A Year of Decisions For Shipping – How Will The Markets Develop?"

Dr Martin Stopford, MD Clarkson Research Services Ltd

Figure 1: Jingnan shipyard: a long established Chinese shipbuilder that opened a major new facility

1. The Decision Makers

Good morning ladies and gentlemen. The title refers to "a year of decisions", so let's start by looking at who the decision makers are. In shipping there are four primary groups of decision-makers, and today each faces a very different situation.

Shipowners are at the heart of the equation and they face a wide range of different problems over finance and investment. *Bankers* are still struggling with the credit crisis generally but shipping portfolios have their own problems. The *shipbuilders* who are expanding fast are juggling the problems of cashflow; funding new facilities and managing accounts which cannot meet their commitments. Finally where things are not going smoothly *governments* are being drawn into the frame, generally reluctantly.

In the wake of the great boom these decision makers have plenty to worry about and my focus this morning will be on getting the facts we know into perspective. But this is what they are paid to do – worry about the future and in the end its just a job like any other. Some do it better than others.

I will start by looking at the market trends in recent decades, both as earnings and return on investment. I will then take a look at those key drivers of the future markets – the market fundamentals; the world economy, ship building and demolition. Finally I will pull all this together into some sort of perspective on the dilemmas facing decision makers in the various parts of the industry today.

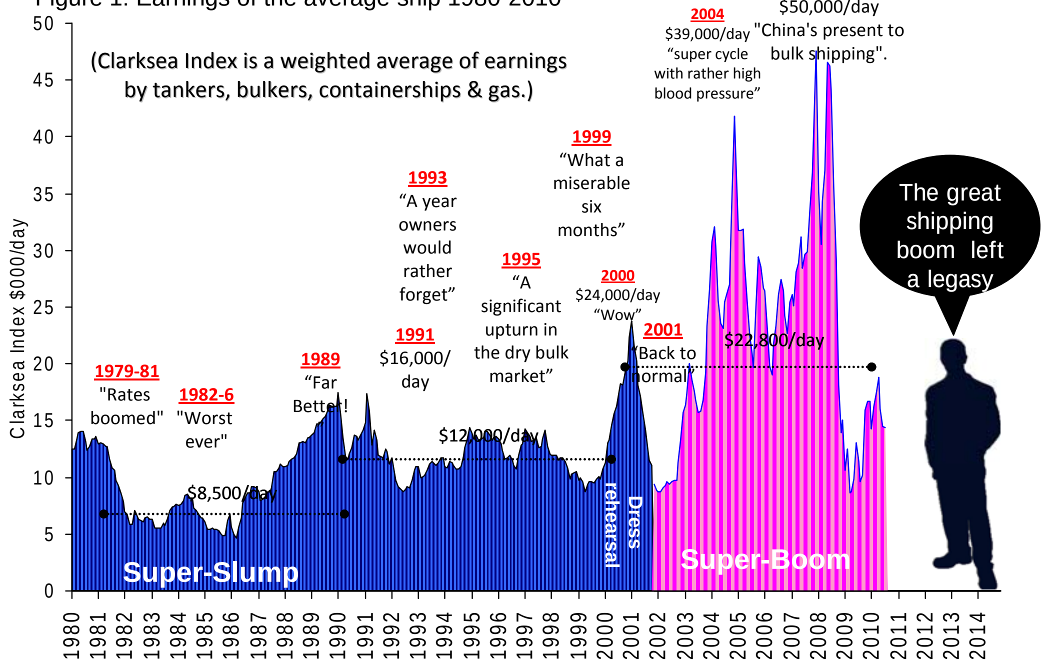
2. Freight rates 1980 to 2010

A quick run through the last three decades gives illustrate how previous generations of decision makers have handled the same sort of decisions we are struggling with today (Figure 1). In fact each decade has a different character and none turned out to be quite what the market expected at the outset.

The Miserable 1980s

The 1980s was a much worse disaster than anyone expected at the beginning.

Figure 1: Earnings of the average ship 1980-2010



Owners, encouraged by builders who were struggling to fill surplus capacity, made significant counter cyclical investment at the start. It turned out badly and prolonged the recession. Governments handled the second oil crisis badly and trade collapsed. With a large surplus of ships which, for four years in a row, produced earnings which were barely sufficient to cover operating expenses. By 1986 most shipping banks were facing problems with most of their portfolios. The strategy of foreclosure just made matters worse because the sale of ships at distress prices undermined the collateral supporting bank portfolios. But eventually the surplus was cleared and the market got back to some sort of normal by 1990.

The Difficult 1990s

The 1990s was expected to be much better, but the result was disappointing. There was a round of speculative ordering of tankers which turned out to be badly timed. The shipbuilding shortage which was predicted to result from heavy demolition of tankers built during the 1970s bubble, never happened. So by 1999 even diehard optimists were wondering why they soldiered on in the bulk shipping business.

The Tight 2000s

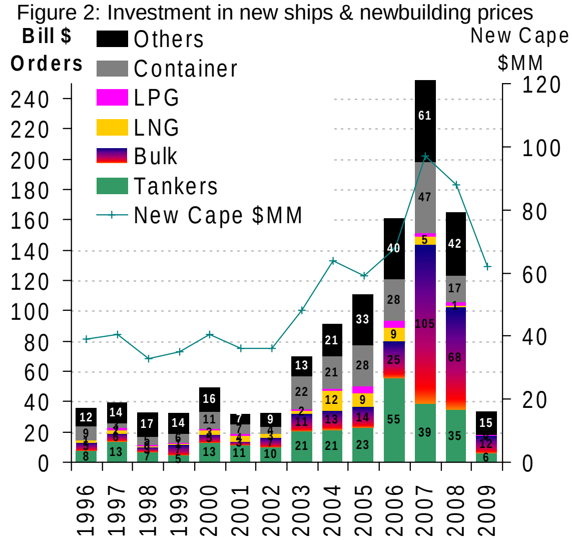
The 2000 provided the answer. After a short dip in 2001, the market took off and for five years from 2003 to 2008 earnings were massively above trend. This was without doubt the best boom in living memory, and possibly one of the best ever. One consequence of the boom was very heavy investment in new ships. During the five years the market committed over $800 billion in orders for new ships. Half of this investment took place in 2007 and 2008 when new building prices were at record levels (see Figure 2 which shows the new price of a Capesize bulk carrier on the right axis).

The Unbalanced 2010s

From my perspective the scenario that lies ahead of us is characterized by a return of the structural imbalances which characterized the 1980s and 1990s. The formula is familiar enough. The world economic outlook is patchy because the OECD countries which still account for half of sea trade, are struggling with unresolved structural problems. So sluggish trade growth is an issue. Meanwhile the supply side of the shipping market is drawing ahead of demand and with shipyard output growing fast the surplus is likely to get bigger over the next couple of years.

This outlook leaves the decision makers mentioned above struggling with several problems. Firstly some prudent shipowners who remembered the 1970s built up very substantial cash balances which they are now tempted to re-invest. But they are not sure if the market has really bottomed out and are anyway are having problems finding well priced assets. Secondly other investors are committed to substantial new orders, on which finance was not always arranged in advance. These ships now look very expensive and with prices well down from the peak, their collateral value is insufficient to support the required loans. Thirdly, as the industry built up a track record of excellent financial performance, new investors were drawn into the market, particularly in Germany where the volume of business done through KG companies grew very rapidly and in the United States where public listings became much more common than previously. Some seem to have interpreted the 5 year financials in 2008 as "normal" and invested in structures devised on that assumption. Fourthly, the investment boom went on so long that shipbuilders were able to drive up prices and had time to plan and build new capacity. As result today's capacity has drawn well ahead of the requirement indicated by long-term trading trends. Fourthly second-hand prices increased very rapidly and seductive arguments about "new paradigms" persuaded bankers to build portfolios which were often based on collateral valued at levels well above long-term trends.

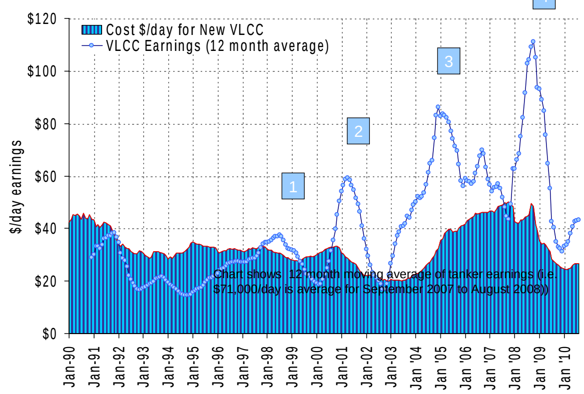
Figure 2: Investment in new ships & newbuilding prices



3. Return on investment 1982 2010

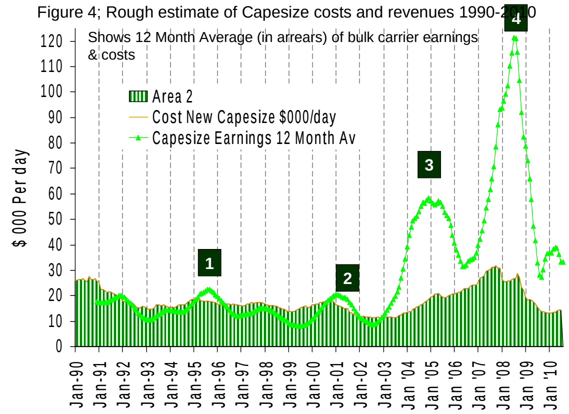
The returns on shipping investment vary a good deal from one decade to another and this is a hood starting point for weighing up what the next decade might bring. I made a rough analysis of the return on investment for tankers, bulk carriers and container ships over the last two decades, based on the sum of operating expenses; depreciation and interest on the vessel value. In recent months the crucial issue has been the fall in interest rates due to financial easing. This has reduced the "cost of capital" in the shipping industry to a nominal level, making it one of the principal beneficiaries of the financial easing policy of governments. It seems likely that this will continue until a robust economy has been achieved.

Figure 3; Rough estimate of VLCC costs and revenues 1990-2010



If we compare to the daily cost with earnings and calculated return, which I took as a percentage of the current new building price. In this analysis earnings play an important part, but so too interest rates (which I calculated using LIBOR) and new building prices, both of which were highly volatile.

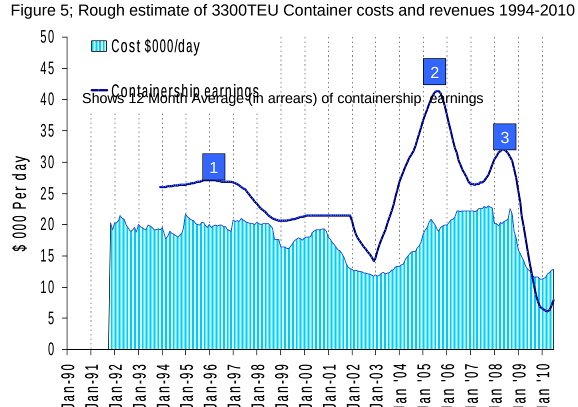
Figure 4; Rough estimate of Capesize costs and revenues 1990-2010



The tankers the 1990s was a very poor decade (Figure 3). During the first half of the decade earnings were insufficient to cover depreciation and interest, and the average over the whole decayed was 2.6% (note that this is after paying interest costs on the full capital value of the ship at LIBOR). Then in the 2000 is things improved and the return over the whole decayed was 9.8%. In

A during the 1990s bulk carriers did slightly better than tankers, with earnings just sufficient to cover costs, (Figure 4) leaving a 3.2% margin. That's in the 2000 is the return shot up to 14.5% over the whole decayed. This may sound low, but remember that until 2003 returns were very low, and there was a dip in 2006.

Figure 5; Rough estimate of 3300TEU Container costs and revenues 1994-2010



I also included containerships in the analysis (Figure 5), though this market is much less established and the data correspondingly less reliable. However the same analysis showed a return of 9.4% in the 1990s and 9.3% in the 2000s, when the higher return in the first part of the decade was pulled down by the very poor performance between 2007 and 2010. It is also noticeable that the volatility of this market segment increased significantly over the period. From this perspective the recent crash looks less frightening, though structurally the volatility which has been building up could be due to a structural change as the size of the container charter market expands and investment control moves away from the service operators, who controlled all investment until 1990 and had it on their balance sheets, to independents who are buying ships to charter and now account for half the market.

This analysis the results of which are summarized in Table 1, provides a useful benchmark for weighing up the coming decade. The spread of returns in individual segments and is between 2.6% and 14.5%. It also demonstrates that there are significant differences in the performance of different segments of the market. In general bulkers did somewhat better than tankers, but overall containerships produced the best return -- remarkably close to the famous 8% offered by KG companies.

Return on shipping investment (ROI) 1990-99 & 2000- June 201

	1990-1999	2000-2010
% per annum increase		
LIBOR 6 month	5.50%	3.20%
VLCC	2.60%	9.80%
Capesize Bulker	3.20%	14.50%
Container (3,500 TEU)	9.40%	9.30%

Note: the ROI calculations based on a new ship depreciated over 20 years, with interest charged at LIBOR on the full newbuilding price each month and OPEX added. The ROI is calculated as follov ROI_t = ((depreciationt$_t$ + interest$_t$ + OPEX$_t$) x 350)/newbuilding pric

Our task is to weigh up where things will sit in future.

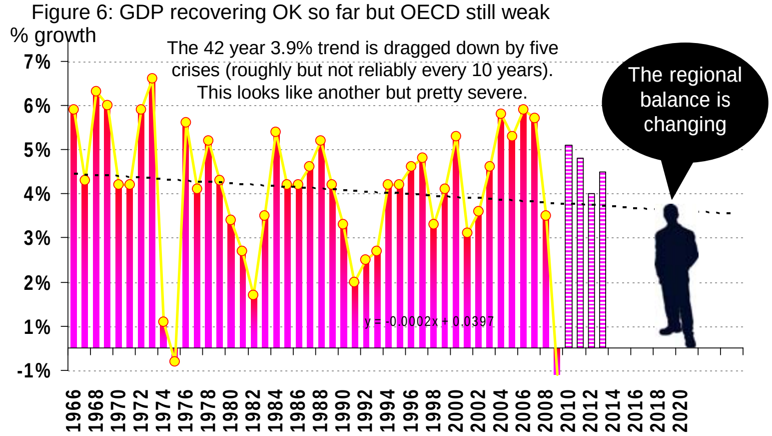
4. The world economy

The world economy had a record run between 2003 and 2008, followed by the most severe recession since the early 1970s (Figure 6). Looking below the surface, the principal pattern today is that the non-OECD countries are generally performing well. It's is not difficult to be positive about the performance of China, India, South America and other non-OECD areas during the coming decayed. These economies have growing markets and are no longer so dependent on the north Atlantic. In contrast to the OECD economies are now mature, with demographic problems and problems in the banking system which are still unresolved.

One of the most striking messages from the history of the last 30 years in the shipping market is that demand leads the way and fluctuations in demand for more important in triggering the major developments in the shipping market than supply. However the demand side of the shipping market is much more difficult to analyse than supply, because it involves two lares of complexity, first the cycles and crises in the world economy and secondly the specific developments in seaborne trade. Over the last 50 years there have been regular "crises" in the world economy - the stories crisis in 1956 and another in 1967. The oil crisis in 1973 and another in 1979. The US financial crisis in 1990 to 93, then the dot-com crisis in 2001. Finally we have the credit crisis which started in 2007. All of these crises are shown in the figure below which also shows a close correlation between cycles in the world economy and cycles in seaborne trade.

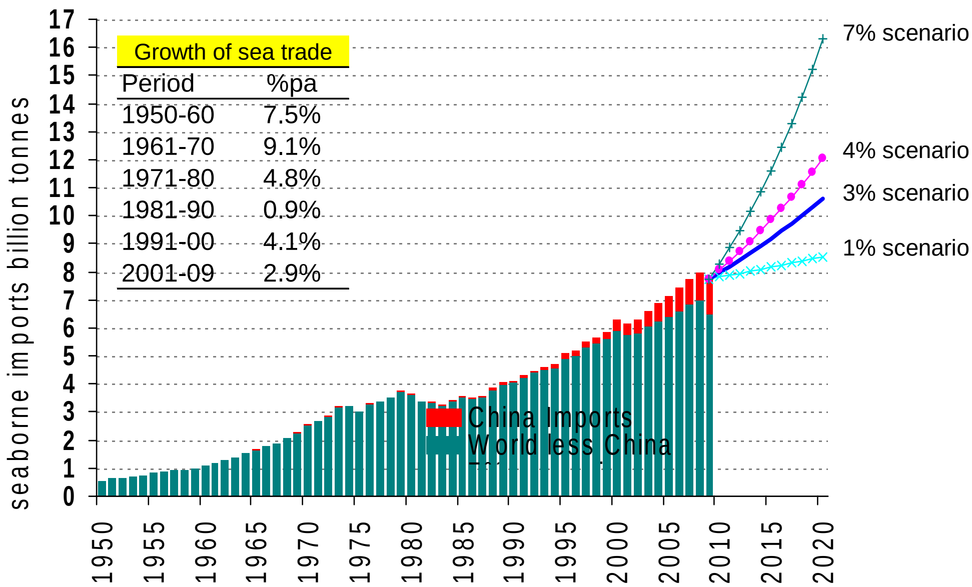
In practice forecasts of the world economy have little credibility -- 2 years ago when I spoke at this event, the consensus forecast was that world GNP would grow at 4.2% in 2008 and 4% in 2009. In fact GDP fell by .6% in 2009. The sad reality is that we just do not know when these cycles will appear. Today the forecasting agencies are predicting growth of about 4% per annum over the next two years, but I doubt whether anyone in this room takes these projections seriously. The truth is we face a very uncertain outlook.

Figure 6: GDP recovering OK so far but OECD still weak



However as far as seaborne trade is concerned, decision makers do not really need precise forecasts. They just need a sense of what is possible. Over the last five decades the annual growth of sea trade has varied enormously from a peak of 7.5% per annum in the 1950s to a trough of .9% per annum in the 1980s (see inset table in figure below). During the decade 2000 to 2009, despite the best efforts of China, trade only grew by 3% per annum. In Figure 7 below I have set out four different scenarios. The lowest is 1%, and reflects the growth rate during the 1980s. The second 3% reflects the growth rate in the last decade, and the third is 4% which was the growth rate in the 1990s. Finally I have added a 7% scenario which is the growth

Figure 7: Sea Trade scenarios based on different rates of growth



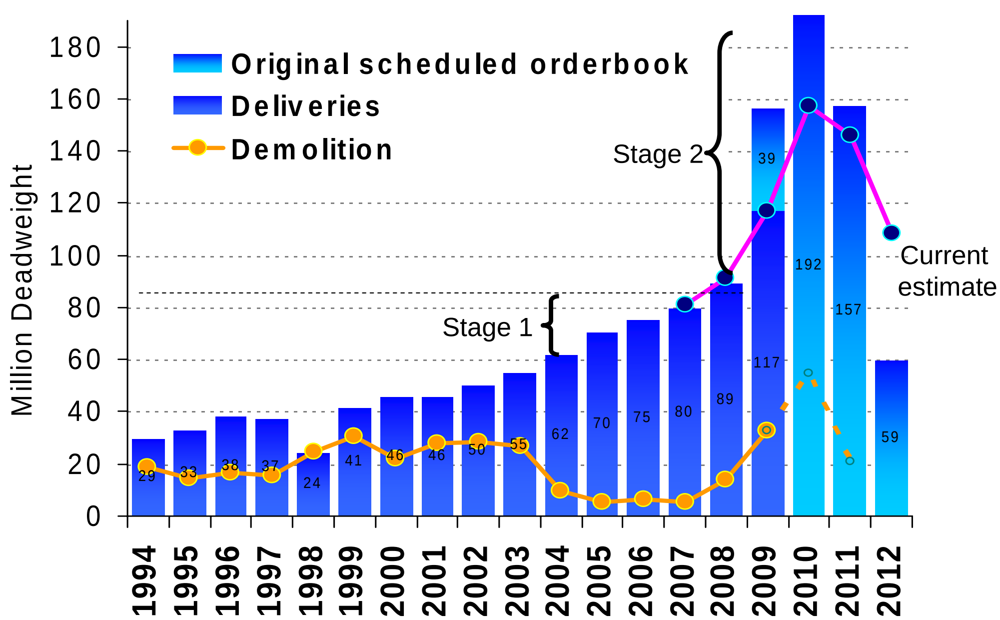
rate in the 1950s. I suspect most readers would settle for 3% as a reasonable outcome, but, when we get to discussing supply, we see that we really need the 7% scenario to keep the shipping market is buzzing in the way they have done over the last few years.

Unfortunately the 7% scenario is very unlikely because although the Pacific countries are growing very rapidly, the OECD countries, which still constitutes a very large proportion of seaborne trade, are growing slowly. On this basis the 2010s are unlikely to be as good as the 2000s, in terms of the world economy, but a return to the 3% growth trend seems possible. In terms of sea trade, perhaps we 3% per annum growth would make a reasonable planning assumption.

5. Shipbuilding and the demolition

One of the principal legacies from the boom was the expansion of world shipbuilding capacity. The yard is delivered 117 million deadweight of ships in 2009 and the trend so far this year suggests 150 million deadweight in 2010, with 140 million deadweight in 2011 (Figure 8). With a fleet of 1.3 billion deadweight, deliveries are running at around 11% of the fleet.

Figure 8 Shipyard deliveries showing scheduled deliveries & latest estimate (line)



Today we have a relatively modern fleet and in 2009 demolition was 32.9 million deadweight, about 2.5% of the fleet. So far in 2010 the pace and demolition has slowed to less than 2% on an annualized basis. Generally in the past order books which have been contracted end up being built, albeit a little late. The severity of the crisis last year made it look as though this might be an exception to the rule. Many shipowners had not arranged adequate finance in advance, and the credit squeeze made financing very difficult.

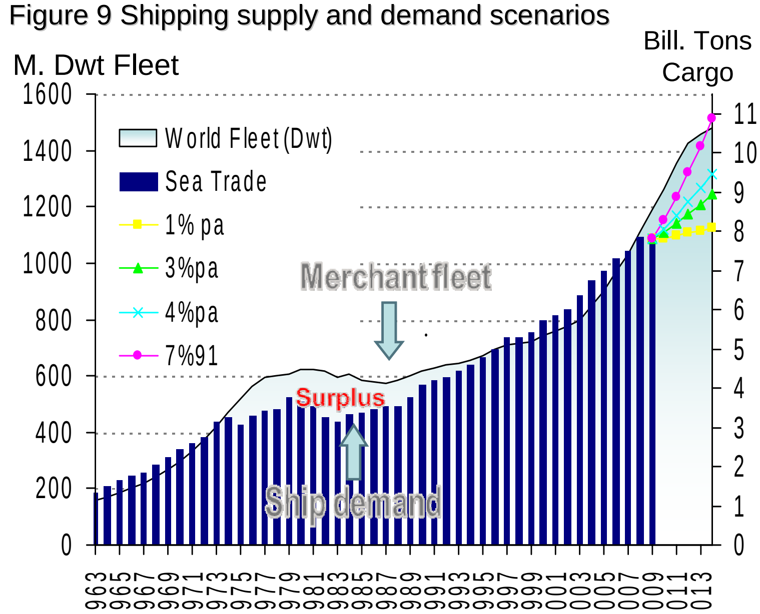
However the shipyards have got over the last 12 months successfully, and output has continued to grow. Some of their clients have had difficulties in raising finance, and we must expect more problems in future as the financial pressures build up, which seems inevitable despite low interest rates and the best efforts of banks to keep the wheels turning (which if the fundamental purpose of financial easing). But potential investors are "circling the wagons". These are the liquid investors, either shipping companies who held back from investment during the boom, or non-shipping investors looking for "kick the tyres" assets at bargain prices. The problem so far has been lack of investment liquidity -- nobody wants to sell their ships cheap and the market has been benign enough to minimize mandatory sales. When we look at the trend in freight rates I described in the early part of this paper, it is clear that thanks to low interest rates and the continued growth of cargo into non-OECD countries, many companies have been able to survive.

In short, the shipbuilding industry is rolling forward, and still has close on 500 million deadweight of ships to deliver. In my view it would require a better than average decade to soak up those ships without inflicting some pain on the industry.

6. The market fundamentals

I do not have time to go into great detail, but it is useful to pull together the supply and demand trends (Figure 9). This is always a precarious business, but in truth we are talking of very broad issues. In recent decades sea trade has grown at around 3.5% per annum and even during long the boom 2003 to 2009 it grew by only just over 5%. However we have deliveries running at well over 10% of the fleet, and a relatively modern fleet which will limit scrapping. The shipyards have survived the most difficult year, and there seem to be enough potential customers to prevent major cancellations, provided "the price is right". So the fundamentals trend is one of growing surplus. My own feeling is that provided the non-OECD countries perform effectively and there is not a further collapse in sea trade, the situation has more in common with the 1990s than the 1980s.

Figure 9 Shipping supply and demand scenarios



7. Conclusions

So let me pull all of this together. I started with the four key decision-makers, shipowners; bankers; shipbuilders and government and pointed out that historically shipping has been a highly volatile business and that these for decision-makers are, essentially, paid to find ways of dealing with that volatility. It's the sort of business that is likely to appeal to people who in their spare time practise extreme sports, maybe mountain climbing or skydiving.

One of the consequences of this volatility is that some decades are much better than others. We might as well accept that, but we must also be aware that we never quite know what is coming next, so flexibility is essential.

Today the economic outlook is mixed, and although China, India and other emerging countries are growing rapidly, the heavyweight OECD countries are struggling. They still have a financial crisis which is largely unresolved. So we cannot expect high levels of global growth in the coming decade. 3% per annum would be a good outcome, though in the disastrous 1980s sea trade grew by only 1% per annum.

Meanwhile the shipyards have sufficient capacity to expand the fleets by 7% per annum, after allowing for scrapping. In the past it has been very difficult to damp down shipyard capacity once it has been put in place. So fairly rapid supply growth seems probable.

Pulling these together, I think that we should be l viewing the coming decade as one in which returns will be in the lower end of the spectrum (which ranges from 1% ROI to 15%) my own feeling is that 5% to 7% ROIper annum would be a good outcome.

Martin Stopford
3000 words
September 4th, 2010