LITMUS ANALYSIS

BIPAR recently met with Peter Hughes, founder of Litmus Analysis, who explained why it always seems that ratings downgrades are either too late or too early by using the analogy of Hooke's Law. Peter has kindly put his thoughts down in writing for BIPAR and we publish them here for BPAR members.

Peter worked for 20 years as a broker before joining Standard & Poor's in 1998. In August 2010 he established Litmus Analysis to help the insurance markets (brokers and insurers) use ratings more effectively. Find out more about Litmus on the website www.litmusanalysis.com, where you will also find further papers from Peter.

The following represents Peter's opinion and does not necessarily reflect the views of BIPAR.

Hooke's Law – A ratings analogy

The idea behind ratings is a simple one: take a complex entity, like an insurance company, undertake an established and consistent approach to understanding the credit quality of the company and then publish a very simple indication of its relative financial strength. But the very simplicity of that indicator can lead to misunderstanding and misinterpretation – it's all too easy for ratings users to make assumptions about what ratings mean which can lead to problems down the line.

The aim of this paper and others in the series is to help insurance market participants gain a better understanding of the basics by exploring some of the myths that persist in the marketplace -

- Rating agencies are always too late (or too early)
- They tell companies how to run their business
- The more you pay, the better the rating
- 'A' is good, 'B' is bad
- Agencies are always getting it wrong

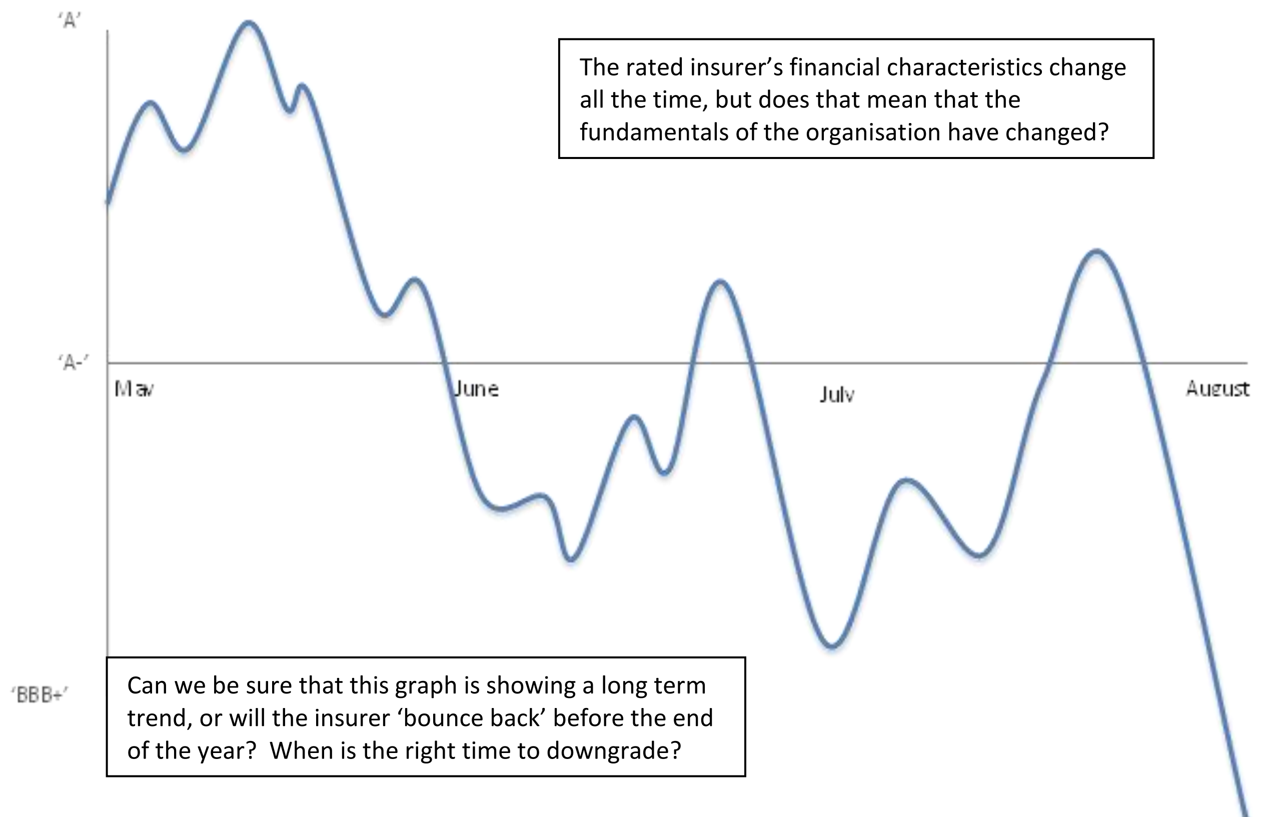
This first paper examines the first of these by using my favourite analogy – **Hooke's Law.**

Many will remember their Physics teacher talking about the concept of elasticity of a substance, and demonstrating this with a spring. The point being made was that when you extend a spring it will, in most circumstances, spring back to its original shape, but that all springs have a point of no return – the point at which the spring stays in its stretched shape rather than springing back. This is an explanation of Hooke's law.

This concept works really well when thinking about ratings. Firstly it's important to remember that ratings are described by the agencies as being medium term indicators – terms such as "*rating through a normal market cycle*" are often used, and the concept of *"ratings stability"* is very important to rating agencies, and to the investors who use ratings for their fixed income investments.

Indeed, there was research undertaken of investment managers in 2007 which asked the question "*What is your preference between rating accuracy and rating stability, assuming that it is impossible to improve ratings' accuracy without reducing ratings' stability?"* Whilst the survey response to this was interesting, it is the question itself which outlines the challenge facing the analysts and the dilemma for all ratings users.

If ratings are medium term indicators, then they need to display stability. But the rated entities themselves change their financial characteristics by the day or even the minute, so they are always 'pulling on the spring' – challenging the elasticity of the rating.



So how do the agencies create that stability? Simply they look at the underlying fundamentals of the rated entity – its financial position, of course, but also the nature of the market it operates in, its position in that market, the management and sources of capital amongst other qualitative issues. And they 'stress' these factors – in other words they consider the impact of normal market stresses with a view to understanding how the entity would cope with these stresses and whether the rating would survive such a situation.

There can be situations where the markets move dramatically away from the fundamentals – when Credit Default Swap ('CDS') spreads (prices), the share price and other short term indicators reflect a rating which is largely different from the level of the actual rating. This has happened very dramatically in some cases, when, before a collapse, the short term indicators suggested a rating level which was much higher than the ratings that the agencies were giving – i.e. the ratings were never very high and the markets thought they should be higher. And it has happened the other way in other cases, where the ratings have remained high although the markets have lost confidence and the spreads reflected much lower ratings.

The key here from an analytical perspective is to understand that in the majority of instances the short-term indicators return to the fundamentals (i.e. the prices begin to reflect the actual rating level), but that sometimes they stay out for so long that they actually shift the fundamentals – the point at which the 'spring' cannot return to its original shape and the rating needs to change.

Is there ever a right time to downgrade?

Psychologists refer to the concept of cognitive dissonance – the ability we all have to hold two contradictory beliefs simultaneously. There are two common cognitive dissonances with regard to ratings, the first of which you may be familiar with (the second we will return to in a later article).

It's not uncommon for rating agencies to be faced with an exchange along the following lines - often in the same sentence, which would start with "why didn't the rating agencies tell us about the problems and downgrade the company earlier?", and end with "….and the downgrade is causing the problem". So what they're being told in the first part is that the agencies have acted too late, and in the second part that if they hadn't downgraded the insurer yet, the problem wouldn't be there – i.e. they've downgraded them too early.

It's clearly possible to do one of these, but not both at the same time!

Which brings me back to Hooke's law – the right time to downgrade is the point at which the spring isn't going to return to its original shape – the point at which the rated entity's characteristics have fundamentally changed, when the 'stresses' which I mentioned earlier have gone past the level which the rating can withstand. That's a tough call that the analysts spend a lot of time deliberating. And it's also a call that, given the chance, is discussed in detail with the management of the organisation, and very clearly signalled by the agencies – if you know where to look….

The early warning signs

If the rating's like a stressed spring, then how do you tell when it's reaching breaking point? The agencies do their best to make this clear. Firstly, there's the use of the "outlook" that attaches to the rating. The outlook refers to the likely direction of the rating – so a negative outlook tells that, all things remaining equal, if the fundamentals continue moving in the direction they are, then the rating's likely to be downgraded.

On occasion, when something happens that is outside normal expectations, a CreditWatch notice is published. This tells us that the analysts need more information and time to review the situation, so it's a clear alert that the event is enough to make them sit up and take notice, and that it could have an impact on the rating.

But the clearest indicators are in the words that accompany the rating: the rationale.

Your expectation is my expectation…

I used the word expectation above, and it's a very important word when it comes to understanding how stressed the ratings spring is. Imagine yourself in the shoes of the analyst – spending a lot of time with each of the management teams of a group of peers in the sector, hearing their views, plans, ideas, pressures, and, most importantly, expectations. It should become clear whether these are achievable, how they compare with those of the competitors, and what direction they are likely to take the company.

If there's a strong enough argument to persuade the rating committee (ratings are determined by committees of analysts) that the expectations of the company are within the realms of achievability, then there's every chance that the company's expectations will become those that drive the rating.

So if the management has declared that it is expecting an return on equity of more than 10%, there's a chance that this will become the expectation of the rating agency – and if the company doesn't achieve the 10%, then the analyst's expectations haven't been met, which sends a clear message about the business and the management, which further stretches the spring.

So how does this feed into the rationale?

Don't be irrational – read the rationale

Rating agencies aim to be as transparent as they can about the drivers of a rating. So they publish a rationale clarifying their thoughts, and in the rationale will usually be an identification of their expectations. *It gets really interesting when there's a negative outlook and some clear issues facing the company*, as we have seen with a number of insurers in recent years.

In this situation some very clear messages come out in the rationale. Let's consider a completely made-up example – following the loss of a significant proportion of capital after an unwise acquisition, an insurer clearly needs to take action to replenish the pot or face a downgrade. The management has performed badly, shareholders are not happy, analysts expectations have not been met; *the spring is approaching breaking point.* But thankfully the capital markets are reasonably buoyant; a new CEO is in place, the company plans a rights issue and has capacity for some debt. It also plans to cut back certain lines of business.

So the analysts believe that pressure can be relieved if these plans are successful and there is some, albeit limited, time to get the plans away.

At this stage, the rationale should paint a very clear picture. The various plans, if public, may be listed in the rationale, with a message from the analysts giving their views on the execution risk of delivering what is proposed. And a clear bi-directional statement should be made, along the following lines –

"*Should the company manage to execute these plans, then the rating will be affirmed, but with a negative outlook. Should the company fail to achieve any one of their proposals, then the rating will be downgraded by a notch to a rating of 'A' with a stable outlook".*

Of course, this is just an example – the stated rating action could be very different depending on the circumstances. But the statement should be explicit, and it should be very clear what will happen to the rating. So here we have a good idea of how close the spring is to breaking point, what needs to be done to stop it from breaking, and what the new spring will look like if the existing one does break.

In the next paper we'll move on to some of the other myths of ratings. We'd be happy to take questions to the following email address - papers@litmusanalysis.com