Addressing the challenges of central clearing for the buy side

With just one year to go until the end-2012 deadline set by the Group of 20 (G-20) nations for all standardised over-the-counter derivatives to be cleared, a number of uncertainties remain – not least, whether the global regulators will meet the deadline. In this roundtable debate, sponsored by Calypso Technology, Eurex Clearing and SwapClear, panellists discuss the outstanding issues and the steps they are taking to prepare







Risk: **How important is it to get an early start on clearing?**
Barry Hadingham, Aviva Investors: It's extremely important, but we shouldn't forget that we have known this was coming since 2009. Investors have engaged heavily in terms of getting our requirements across. This isn't the starting point – we started some time ago. If people haven't started now, they really need to become engaged.

Stuart Heath, Eurex Clearing: We see quite a range of readiness from the buy-side firms that we have contact with. We already have buy-side firms using clearing services in the US, and many of those have European arms. They are fairly well advanced, whereas, in the UK and Europe, some people are in the early stages.

Risk: **How do you go about choosing a clearing member and what criteria have you used?**
Barry Hadingham: In November 2010, we started out our process of looking at who we would consider as our central clearing partners. In terms of the process we followed, there were a number of hygiene factors that we needed to consider. We view clearing as a utility service – it's not a value-added service. From an operational risk perspective and from a counterparty risk perspective, we're looking for good credit quality – it is one of the hygiene factors we focus on. We had a whole range of criteria – some commercial, some around pricing. The variation we saw in pricing was quite dramatic but, from our perspectives, pricing was pretty low down on our list of priorities at that stage.

There are two things that are, in our opinion, most important. One is a hygiene factor, in terms of credit quality and whether your clearing member is going to be there in the long term. Second, this is new to everybody. We were very much looking at who we could partner with and who could get us into clearing. We had each of the dealer banks in front of us so we could talk with them, understand their strengths and weaknesses, understand their experiences and what they could bring to us, and also to determine if we could work in partnership with them.

The Panel

Aviva Investors, Barry Hadingham, Head of derivatives and counterparty risk
Calypso Technology,
David Little, Director of strategy and business development
Eurex Clearing,
Stuart Heath, Executive director, head of UK representative office
SwapClear, LCH. Clearnet,
Philip Whitehurst, International head of product management

Risk: **Some of the timelines have been extended, particularly in the US. What sorts of challenges does that pose for SwapClear?**
Philip Whitehurst, SwapClear: It makes it easier because you're building towards a certain deadline. But the biggest challenge is around priorities. The changing timelines tend to interfere with the decisions you make with respect to when to deliver a particular enhancement. So it might appear critical at the point you make the decision but, if there's a change either in the regulation itself or in the time by which the regulation will be implemented, then that makes it complicated. The real complication is in the fact that these things are not typically isolated – they tend to have a knock-on impact on other decisions. That's the most challenging element to the timelines.

Risk: **How is the moving of the deadline affecting the demand for the technology? Are you seeing people delay their buying decisions until the rules are finalised?**

David Little, Calypso Technology: Uncertainty is the thing that is most challenging about the entire set of changes. There is uncertainty around regulation and there is uncertainty around how the market is going to respond to that. Where is liquidity going to end up? Will people move from more exotic to less exotic types of trades? What products will central counterparties (CCPs) offer, and how much will legislators defend national interests? The larger organisations have found it easier to make the necessary decisions, to make the investments and to prepare for it. Most of the top-tier banks have been more comfortable with the uncertainty because they have reasoned along the lines that it doesn't matter exactly how it all plays out – we know we want to be at the heart of this and we know we need to be offering a full service to our client base. That has been a less compelling argument as you move down the size scale. Similarly, on the buy side, the largest firms think they are going to have sufficient volume to justify investment in technology. People have been placing a premium on adaptability, knowing that whatever they do is liable to change in the future, so they need adaptable solutions. For the smaller firms, it has driven them towards thinking that, in the early stages, outsourcing may be a good idea, rather than investing in buying or building technology.

Risk: **One of the big stories of the past couple of months has been the failure of MF Global. That has pushed margin segregation to the top of the agenda again. What lessons have been learnt from this experience?**

Stuart Heath: The lesson for all of the clearing houses involved in MF Global, particularly in Europe, was that the margin the clearing houses took from MF Global for its positions and its clients' positions was sufficient to cover it in a default event. There was no loss to anyone. What has been highlighted is that people want to know where their margin is in the event of a default, particularly for clients of a clearing member. It's highlighted once again that there are issues. People don't always know where their money is or where their money will be in the default of that clearing member, and it highlights that the segregation of margin, the segregation of positions and the ability to port those are once again high on the agenda. It's as if the lesson had been forgotten a bit over the past couple of years and it has just brought it back into clear focus.

Risk: **Many end-users have complained about the strict margin requirements set by CCPs on both initial and variation margin, and many have claimed they don't necessarily have the requisite amount of high-quality liquid assets on their balance sheets to meet the daily margin calls. Barry, what is your view on the current requirements on initial and variation margin? Do you think this has an implication for end-users?**

Barry Hadingham: It very much does. In terms of initial margin, pretty much all of the clearing houses will accept non-cash. The problem you've got is that it's the long-only real-money accounts that get hit hardest in clearing. If you take a pension fund that is running a liability-driven investment strategy with 30-, 40- and 50-year interest rate swaps, you could easily be looking at in excess of 10% of notional on initial margin. The only way you could do that is to reduce exposure to higher-yielding assets and move into lower-yielding assets. This will impact severely on the returns of the fund overall, which potentially drives you to increase the risk on the rest of the investible pot to maintain returns, which seems counterintuitive to me. Some of the discussions we've had with clearing houses have been around the potential for a pledge arrangement for initial margin, whereby the assets never actually move. The clearing house would have a lien over those assets in the event of default. The chances of a pension fund defaulting are pretty minimal because it is effectively an unleveraged pool of assets, so we would certainly be keen to see solutions of that type.

Coming on to variation margin, we fully understand the straight pass-through model so, if we owe margin and someone is owed margin, we pay cash in and the cash goes straight out the door. We totally get that, but there are plenty of other assets we and others believe could be put into the clearing system and repo-ed out. The real question is in terms of stress and turmoil in the market and how you handle that situation. This time last year, we attended a meeting at HM Treasury, along with a number of buy-side firms, clearing houses and Bank of England representatives, to discuss how this could be done in the clearing environment. The Bank of England was quite clear that it wasn't going to stand behind the clearing house in terms of liquidity lines. But that's the obvious solution to us. If the clearing houses are able to deposit assets in exchange for cash in the central bank, it would solve the problem in stressed market conditions rather than buy-side firms having to do it in the interbank market.


Stuart Heath

Risk: **Barry was talking about some of the potential solutions to help resolve the shortage of eligible collateral held by end-users. There is talk about a pledge arrangement and talk about a repo service. Some of the clearing members out there are preparing to offer or are offering so-called collateral transformation services where they do a similar thing – they will take in ineligible assets, repo them out in return for cash and post that to the CCP. Should the CCP be doing something similar? What other solutions are there?**

Stuart Heath: From a CCP's perspective, we want the most liquid instruments available, so cash would be ideal. However, at Eurex Clearing we do accept a wide range of collateral, from various government bonds through to corporate bonds, through to equities and even gold certificates. We understand the requirements, but there is a limit to what we can do for pure risk management purposes. With regard to collateral transformation, the services are there but I think that is quite hard. It introduces counterparty risk because the repos are done with a bilateral trade, and I don't know to what extent the banking system can cope with the additional stress on the balance sheet for what is a utility business. If a large number of buy-side firms wanted collateral transformation services, the bank's balance-sheet appetite would soon run out because the returns on capital are utility-like. There is a chance for the CCPs to be involved – for example, Eurex itself has a Eurex repo service, which is backed by the CCP, so there is the potential for that to be used – but, at the moment, the CCPs, the buy side and the clearing banks have to try and work together to find some solution. I can't see it happening straight away.

Risk: **There is a repo service at LCH.Clearnet. Is there anything you are working on to develop some sort of solution? What are your thoughts on the pledge arrangement idea?**
Philip Whitehurst: On initial margin, we are certainly looking to extend our range of eligible collateral. We realise that is something that can be dealt with in other ways, for example, through haircuts. The ability to take a wider range of collateral is something we can probably respond to. But then we come back to the variation margin question. We have had a lot of very positive feedback from the market about the certainty of pricing that our variation margining policy brings, and the idea that, if you clear a Norwegian krone swap with us and then you lose money on it, then you must post Norwegian krone into the clearing house, which we pass on to the profit-maker on the swap. That gives a real pricing backbone to the market. We think there are collateral transformation services that our members are well positioned to provide and, ultimately, we are not convinced the investment choice should drive CCP policy. Investors should be free to make the choices they want as to their investments and the CCP should also be free to risk-manage in its most efficient way and there is a bridge in the form of a clearing member that can combine those needs.


David Little

Risk: **David, what are your views on the issue of margin?**
David Little: The challenges are real enough in the cleared world, but they extend well beyond the cleared world. The other big demand for high-quality collateral that is going to be growing over the next few years is the liquidity buffers that banks are going to have to keep and then, later, insurance companies are going to have to keep as part of Basel III and Solvency II. Plus, more and more funding is done at central banks, again requiring this so-called high-quality collateral. The demand for high-quality collateral is in danger of outstripping the supply. The very term 'high-quality collateral' is misleading to regulators and to the industry, because what you require within a clearing context, what you want this initial margin to do is to cover you for the period of default in order to liquidate the collateral you are holding and make yourself whole. So the idea of that is needing to cover something like a 10-day period with whatever the volatility is. You certainly need your collateral to be liquid, without doubt. But, with the correct haircuts applied, it is not at all obvious that government bonds are superior at a 2% or 3% haircut to deeply liquid equities at 30% or 40% haircut, or wherever the haircuts are. If you get the haircuts correct, then the collateral receiver ought to be more neutral about where he sits on the spectrum. The more quality assets we can bring in to be regarded as high-quality collateral, and that are able to be used either in liquidity buffers, in funding arrangements or as collateral in clearing arrangements, the greater we will have addressed both the systemic and the credit risk that we need to. That is absolutely essential. The idea of using cash as collateral everywhere makes no sense and the costs are going to be too high.

Philip Whitehurst: Ultimately, it is around protecting the participants of the clearing service. On the one hand, as a user, you want there to be a lower haircut and therefore you post fewer bonds to meet a given margin requirement. Equally, you would like every other member to have significant haircuts, so there is a balance to strike. Ultimately, we need to be confident we can liquidate the bonds or other collateral we might take at the cover value we ascribe to them. Therefore, haircuts are a way of doing this. There are certain assets we will not get involved in because we are not comfortable that the market liquidity will be there in stressed environments, so haircuts are not the only measure we will adopt. We can certainly extend a little from where we are now, and then it is for the market participants to determine the most efficient way for them to meet the requirement. It might be external repo transactions that might mean no haircuts or smaller haircuts, which generates cash that can then be used with the CCP, and that would be a better commercial and risk alternative.

Stuart Heath: There has been a lot of focus on collateral and the collateral gap, but one of the consequences of putting more trades into CCPs will be the netting effect. With the directional long-only funds, it may become more of a strain. However, the bulk of portfolios – if they can offset their over-the-counter (OTC) swap transactions against their futures positions and options positions on the exchange-listed derivatives side – will probably find that their overall initial margin, if they look at it on a portfolio basis, goes down. I can understand this issue about the potential search for collateral if you looked at this on a gross basis, but the more you put into a clearing house, the more you can offset.

Risk: **Should a CCP have a central bank backstop? To some extent, LCH.Clearnet has through its French operation, but could you give us your views on that?**
Philip Whitehurst: At LCH.Clearnet, we do not have that central bank access. Through our sister company in Paris, however, we do. There are questions you have to ask about why you need that liquidity access, and certainly it runs counter to the idea that CCPs should have a resolution mechanism that does not need recourse to those sorts of measures. We are being encouraged by our regulators to look at that, to look at CCP insolvency, to look at issues around termination of services, rather than looking down at the bottom of the waterfall and saying, "well, maybe there is a place for central bank liquidity". We feel you don't want to be creating any adverse incentives for CCPs in their risk management practices to have such a backstop.

Stuart Heath: I think the central bank backstop is a non-starter. It creates a moral hazard straight away. There is thinking that there would be help of some sort in the worst case, but I don't know about fully stepping in. I agree – if all else fails and the default fund has been undermined, then they need to have this living-will-type approach. It depends on the level of central bank activity you are talking about – access to central bank liquidity where you are using instruments that they normally accept in the terms of business from other institutions and other institutions in stress, such as the discount window in the UK, is perfectly acceptable. It will take more than one day to unwind a significant portfolio of a defaulting clearing member.

Risk: **There is also that Basel charge for bank exposures to CCP default funds, which some banks have claimed is rather punitive. So there may be a reluctance to put the balance**

more on the default fund. Stuart, what are you hearing from the client members, and do you think you have got the balance right?

Stuart Heath: We have – we are not changing the current approach so we are using a fairly high 99% confidence interval. The banks are rightly worried about the capital charges on their default fund contributions and they want to play an active part in managing them. The model at the moment – those who introduce the trades to the clearing house pay an initial margin based on the potential for significant loss given moves over the set period – is easy to understand, easy to replicate and easy to justify. A significant change in that balance – because it would have to be applied across the market – to everybody would be quite hard to change at this time.


Philip Whitehurst

Risk: **There are a variety of approaches taken by the CCPs in calculating margin. Do you think regulators need to take a more active role and be more prescriptive in the assumptions CCPs make to try and create some sort of level playing field? Secondly, there have been some criticisms that the real technical detail of the margin models used by the CCPs isn't really transparent – people can't really replicate the margin requirements. Is there an argument for being more transparent?**

Philip Whitehurst: To deal with the transparency issue first, it is a technical business – calculating the initial margin requirement on a portfolio of OTC derivatives transactions is not primary school arithmetic, so there is a certain amount of inevitable complication that is difficult to avoid. We are transparent, certainly as far as our methodology is concerned, and participants are free to access documentation around that. With regard to some of the underlying data that supports the historical simulation that we do, again, it is something that is difficult to circulate. It is provided to our members, so they see it on a daily basis, and we believe they actively replicate. So this issue is possibly overplayed, at least as far as SwapClear is concerned.

As to the other question, there is already a good degree of prescription. We are pleased to see the [US] Commodity Futures Trading Commission (CTFC) has buried within the detail of its rules things like five-day holding periods for liquidating swap books. We have also seen confidence intervals appear in some of the legislation, which is good. But the regulators could go further. We don't think the market really wants to see CCPs competing on margin, which is a possible result of an under-prescriptive regulatory regime. Even at very prescriptive levels of confidence, holding periods and all of the other elements of a methodology, you are never going to have CCPs producing the same number, but there has been good progress made on that point. It could maybe go further, but certainly there is a sensible recognition of a desire to avoid competition on margin.

David Little: We have been able, within our Calypso platform, to replicate all of the major CCP initial and variation margin calculations to a very high level of accuracy. There is enough information out there. They are not necessarily easy sums, but they are still manageable. The effects of putting a portfolio of trades and adding it to an existing portfolio at one CCP or another can be hugely different, and that is less to do with any drive to the bottom and much more to do with whether the new trades that you are putting on are risk-increasing in relation to the rest of the portfolio or risk-reducing. It is extremely important to end-users to be able to see what the impact will be, and it would go beyond that and that future services will be around restructuring portfolios in order to get efficient netting sets at various locations, which is not an easy transformation to achieve. But, in a world where people are limited by regulatory capital and by collateral requirements, it is an inevitable outcome. Increasingly, technology will be required to be able to achieve those outcomes.


Barry Hadingham

Risk: **Do you think the G-20 deadline of end-2012 for the central clearing of standardised derivatives will be met?**

Barry Hadingham: No, I don't. Given where we are with the regulatory build-out, we haven't even finalised the level-one European Market Infrastructure Regulation (EMIR) text in Europe. The European Securities and Markets Authority then needs to write all of the technical standards and translate them into 17 different languages. The timeline being talked about is to do that by the end of June this year. If you look at what has happened in the US, Dodd-Frank was passed in July 2010, and they are still writing the rules. The CFTC has delayed that process a number of times. In the US, we will see some mandatory clearing before the end of 2012 but, in Europe, I just don't think it is possible. The other point about Europe is you don't have a single piece of regulation, you have EMIR and the Markets in Financial Instruments Directive (MiFID) to implement. Now MiFID is running significantly behind EMIR, and a number of things that you need to do in OTC clearing are dependent on those kinds of market infrastructure changes that come through in MiFID.

Stuart Heath: A struggle. A significant number of the larger interest rate swap portfolios, for example, will be on-boarding after that, subject to legislation.

David Little: The market will move as well, and a reasonable proportion of businesses have already moved onto the CCP model, and the incentives are probably balanced with the amount of business that has moved on. Although it will take the regulators a while to get through it, gradually the incentives will build up and more and more of the market will move onto it. In the end, the market might get there before the regulators do.

Philip Whitehurst: The deadlines may slip, but clearing is coming, so we would encourage all of the participants that are going to be caught by it to push ahead.

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