













CESR CONSULTATION PAPER (CESR/08-1014): TRANSPARENCY OF CORPORATE BOND, STRUCTURED FINANCE PRODUCT AND CREDIT DERIVATIVES MARKETS

On behalf of our members, the International Capital Market Association (ICMA), the International Swaps and Derivatives Association (ISDA), the Securities Industry and Financial Markets Association (SIFMA), the London Investment Banking Association (LIBA), the European High Yield Association (EHYA), the European Securitisation Forum (ESF) and the British Bankers Association (BBA) are pleased to respond to the 19 December 2008 CESR Consultation Paper (CP) on transparency of corporate bond, structured finance product and credit derivatives markets.

Please find attached in Annex 1, our general comments on the CP and response to the questions. Our response is intended to serve as a basis for further discussion with CESR and the wider regulatory community and we would welcome the opportunity to do so at your convenience.

Yours sincerely

Lalitha Colaco-Henry Legal Advisor – Regulatory Policy

GENERAL COMMENTS

- 1. The crisis has revealed significant deficiencies in the efficient functioning of financial markets. Focusing on specific private debt markets, CESR rightly identifies a number of the key symptoms of those failures (contracting liquidity, widening bid-offer spreads, less information available, and valuation difficulties). These symptoms are equally observable to varying degrees in markets outside of the scope of the CP (e.g., government bonds, covered bonds, leveraged loans) and failures are also observable in the efficient functioning of equity markets. They are also experienced with varying force across market segments, indicating that the nature and extent of the failure varies between sectors and so requires a nuanced, targeted response. There is however one common underlying cause; a general collapse in confidence, demand and therefore trading activity caused by great uncertainty, including in relation to the reliability of asset prices.
- 2. Industry is deeply committed to working alongside CESR and other regulators to restore confidence in markets. Transparency has an important role to play. Therefore, we fully share CESR's objective of addressing these deficiencies by restoring confidence to the market while at the same time protecting investors. We are committed to exploring every possible policy option to achieve that goal. We recognise that this endeavour will require changes in industry practices, including the provision of greater transparency to both market participants and supervisors. As CESR is aware, the industry has embarked on (and now mostly completed) a significant number of initiatives to improve transparency in the EU securitisation market, where the deficiencies were most significant. The industry is also working on improving the derivatives market infrastructure. A summary of industry initiatives in the securitisation and credit derivatives markets is provided in Annex 2.
- 3. However, market failures were not caused by a lack of post-trade transparency. Nor will post-trade price transparency help address such failures. The securitisation industry initiatives have not, to date, focused on developing more formal post-trade price transparency since market participants did not see that it could play a role in restoring confidence, and certainly did not see it as a priority over other more important and urgent disclosure and valuation issues (see the slide extracted from the recent Global Joint Industry Initiative on "Restoring Confidence in the Securitisation Market" provided in Annex 3). Similarly, a recent survey of US buy-side concludes that TRACE is "nice to have" but not their most relevant price source (see Annex 4). These findings are consistent with CESR's conclusions that any lack of post-trade transparency was not the leading cause of the market failures identified and that mandating such transparency will not address the failures as a singular measure. Existing mandatory post-trade transparency regimes in e.g., USA and Italy, have not helped mitigate against, much less addressed, such failures. If anything, a comparison of US and EU issuance of investment grade bonds since Q1 of 2007 (both in terms of volumes and number of issues) seems to indicate that EU bond markets have outperformed their US counterparts (see Annex 5).
- 4. Unless carefully approached and designed, the impact of mandatory post-trade price transparency on liquidity could instead act to hamper a return to normal market conditions, thus acting counter to governments' efforts to safeguard financial stability and restore the provision of credit and lending to the economy. As evidenced by recent TRACE studies (see Summary of TRACE studies in Annex 6), academia has become more cautious about the positive impact of post-trade price reporting on the ability of dealers to commit capital, i.e., to provide liquidity. This confirms anecdotal evidence received from not only the US dealer community, but also US investors (see TRACE presentation at EC Sept 2007 hearing on bond

market transparency¹). Academic research carried out by CEPR in 2007 on Europe's corporate and government bond markets emphasises the importance of maintaining both transparent and more opaque price execution settings, and that certainty of execution can sometimes (and particularly in times of stress) only be achieved in a less transparent setting. A February 2009 survey on fixed income trading (see summary findings in Annex 7) shows that this is precisely what is happening and that, when it comes to the buy-side preferred method of electronic execution, the severe market liquidity contraction is causing a move away from the traditionally preferred more transparent openly negotiated RFQ model of execution, towards greater use of single dealer platforms and multi-dealer inventory where greater price certainty can be achieved. A similar shift can be observed from electronic to voice trading. Given the time period necessary for the legislative process, any transparency regime is likely to enter into force at the very point in time (i.e., at the beginning of a market recovery) when it will likely be most damaging. Reduction in liquidity caused by an ill-targeted and unsuitable additional post-trade transparency regime is likely to increase the cost of raising capital for issuers. This would further undermine all the positive effects of initiatives made by the EU governments/central banks to rescue the economy by various intervention measures into the markets.

- 5. We therefore believe that at this stage the likely costs of introducing a mandatory post-trade transparency regime far outweigh the benefits that such a regime would bring. Given that a) there is high scepticism about any positive effect of mandatory post-trade price transparency on market confidence or market failures, and b) there is a very significant risk that mandatory post-trade transparency regime may operate in contradiction with policy objectives to restart credit circulation by further constraining liquidity, there needs to be full clarity and understanding for both regulators and the market about not only the expected benefits of any increased post-trade transparency but also the costs that would be involved.
- 6. We recognise however the importance of robust and reliable price information and are keen to work with CESR on assessing the role that trade price information can play in this process in a way that minimises the risks identified above. We believe that the issue of trade price transparency cannot be looked at in isolation but must be considered from the broader objective of strengthening price information (including valuations) processes, which is key in markets where, in particular in times of stress, most bonds outstanding do not trade. Considerations on post-trade price transparency must further take into account the differences not only between the retail and the wholesale markets but also the differing needs of investors in those two markets.
- 7. We recommend that CESR forms two working groups, one on corporate bonds and CDS, the other on securitisations and CDOs, to discuss with representative stakeholders, and taking account of the responses to this consultation, whether/how greater trade price dissemination can usefully contribute to strengthening the current business models around the provision of price information. In this respect our response takes a number of positions and makes some suggestions which naturally vary across products to reflect, as CESR itself acknowledges, the fact that transparency plays a different role in relation to different markets and instruments. In relation to Part II of the CP, membership is split on the issue of post-trade reporting and the crisis has exacerbated the differences in positions. The tight timeframe for this consultation has not enabled us to reconcile these differences. Nevertheless, we believe that a

_

¹ See http://europe.sifma.org/docs/EC%20TRACE%20Presentation%20Sept%2007.pdf

targeted, inclusive approach, working towards the broader goal of strengthening price information generally, will more effectively help to restore market confidence.

PART I: CORPORATE BONDS

Question 1: Do you believe the situation described above may be symptomatic of a market failure?

- 8. Our starting point is CESR's pre-crisis August 2007 conclusions that there was no evidence of market failures that would warrant mandatory pre- or post-trade transparency for wholesale European bond markets. We agreed with this conclusion and would note the following two important points that remain relevant to the transparency debate in Europe, irrespective of the crisis. First, pre-trade transparency remains a critical feature of price formation on European corporate debt markets. Its presence significantly reduces the relevance of post-trade transparency in the price discovery process. Pre-trade transparency has been much less of a feature of US debt markets. Second, valuation of existing institutional portfolios can be undertaken through the use of pricing services provided by a number of data providers, such as MARKIT, Bloomberg and others which can deliver prices more relevant to the size of the position being marked to market. Further, and as pointed out paragraph 49 of the CP, the IASB has concluded that transaction prices, particularly in inactive markets, are likely not to be determinative of fair value. Instead, and reflecting the current use made of transaction prices by the various pricing services available, they may contribute to the valuation process.
- 9. Since August 2007, and as documented in the CP, conditions in European corporate debt markets have altered in response to severe external shocks ultimately caused by market failures in more complex structured product markets. At the heart of these failures was the inability of market forces to create incentives for market players to undertake appropriate risk assessments prior to decision making to buy and sell in those markets, and to employ adequate risk management practices more generally.
- 10. These failures did not emanate from the European corporate bond markets, but dealers in these markets have had to manage the associated capital constraints and market volatility. It is important to remember that a dealer is simply a facilitator for allowing investors to trade quickly, rather than wait for a natural offsetting investor. In volatile and uncertain circumstances, where a dealer's own offsetting opportunities become more unpredictable with greater time lags, the most efficient response is to widen spreads and/or reduce the size of the quote. And if greater transparency makes a dealer's ability to unload a position even more difficult, he or she either widens the quote further, or, if offsetting opportunities are particularly unpredictable, as they are in less liquid markets, a dealer may exit the market.
- 11. The phenomena in the corporate debt market are observable, to varying degrees, across all market sectors, including the most transparent government, covered bond and equity markets. It is worth noting that the phenomena are also observable in the US corporate bond market which has mandatory post-trade transparency. Therefore, it is highly unlikely that the phenomena described by CESR are symptoms of market failure, for which increased post-trade transparency is the solution. Instead they are the normal phenomena experienced in periods of fundamental liquidity contraction that are particularly extreme in private markets (e.g., US 144A securities or the loan market). Moreover, and as set out in our answer to Question 15, mandatory post-trade transparency is adding to the liquidity stress in comparative US debt markets.
- 12. In conclusion, post-trade transparency is a 'red herring' in the current crisis. A decision to mandate transparency in EU corporate debt markets would amount to little more than an experiment on liquidity-stressed markets. It is likely both to exacerbate the impact of the crisis on

these markets and draw regulatory and market attention and resources away from dealing with the real market failures that have come to light since August 2007. Furthermore, it could potentially neutralise the effect of all initiatives undertaken by some of the EU governments to reinvigorate the market by offering asset purchase schemes, guarantee schemes and liquidity injections etc. and billions of € could be wasted

Question 2: Have you perceived a potential asymmetry of information between market participants?

- 13. In fixed income markets, different types of participants have access to different levels of price information. Broadly speaking, the larger institutional investors who have relationships with several dealers and are able to put them in competition (at least in normal market circumstances) have the greatest amount of price information. Dealers do not see each other's prices. Retail investors have the least information about prices. The existence of such information asymmetries is not a market failure per se. If information gathering is costly, or valuable knowledge arises as a consequence of undertaking a costly activity (e.g., taking an own account position) then differences in trading information may efficiently continue to exist if the person who might benefit from that information does not perceive the benefit as sufficient to compensate the person generating the information. Mandated transparency in the above situation, without appropriate compensation, will remove the incentive to generate information, which in this case may be the incentive to maintain the provision of quotes in particular markets.
- 14. This point is particularly pertinent when reflecting on the role of pricing services provided by a number of data vendors. Institutional investors pay for these services and consider them a cost of doing business. It is important to distinguish between an information asymmetry that reflects a business decision not to incur the cost of obtaining the information and an information asymmetry that reflects a market failure.
- 15. Another important consideration in answering this question, as hinted at above, is the wholesale / retail divide. The size of the retail secondary corporate bond market in Europe is very small and most retail investors will access the market via an intermediary who, under MiFID, has obligations to ensure that the investment is suitable to meet the investor's needs. Any information asymmetry between the retail investor and the market is irrelevant in these circumstances the potential market failure has been corrected both through the use of an intermediary and through regulatory suitability and best-execution obligations. Concerns that best-execution or suitability requirements have been breached are a matter for authorities' supervision and enforcement activities. However, recognising the fact that retail investors could benefit from further price information, the industry has developed initiatives to address that issue in a way that makes sense for retail investors who do not actively trade in fixed income markets, i.e., through the provision of price indications and education.
- 16. Judgements by intermediaries may include reasonable decisions that the transactional costs of accessing particular parts of the corporate debt market, including pricing information costs, outweigh the benefit to the retail investor of a particular trade, given the size of the trade. This is not a market failure but a normal part of the wholesale and retail divide in any financial and non-financial market. It is to be expected that transaction costs for retail trades will be significantly higher than those for wholesale trades. Paragraph 70 of the CP expresses shock that 'retail trades carry transaction costs about five times the size of those for institutional trades'. This is not a scandal, nor a sign of the market failure of abuse of a trade advantage. It simply reflects commission or equivalent payments. The same relationship exists between institutional and retail commissions in exchange traded equity products. Indeed, in every market, financial and non-financial, buying in bulk is cheaper per unit than buying just a few units.

17. There are, however, informational asymmetries, between the private loan market and the public bond market that are of particular concern to high yield bond investors. An investor holding both a loan and bonds of a single issuer is likely to have access to more information about the issuer than an investor holding only the bond. The US has addressed this dysfunction by moving toward an increasingly public loan market but Europe remains a very private market in loans. This merits addressing and would help to restore the health of the high yield market (which has seen zero new issuance since August 2007). It would also help to minimise the possibility of public trading on private information.

Question 3: In your view, what were the key reasons which have led to sharply reduced liquidity in secondary trading of European corporate bonds since 2007?

- 18. We believe that the sharply reduced liquidity in secondary trading of European corporate bonds can be directly ascribed to tightening credit conditions that have in turn been caused by the deteriorating macro and micro economic outlook
- 19. amid fears of a global recession. During 2008, rising macroeconomic uncertainty and falling asset prices added materially to expected losses and increased uncertainty about the value of banks' asset portfolios. Market participants have sought to protect their balance sheets through asset sales and tighter credit supply. This has resulted in a large number of sellers and no buyers leading to further asset price falls and increased market volatility. Accounting rules also exacerbated the crisis. As a result of market volatility, the level of risk (e.g., VAR) increased substantially, reducing nominal positions that market participants could take in order to stay within the same level of risk parameter, limiting trading activity. Dealers have also been constrained in that tighter credit supplies have resulted in a reduction of capital allocated towards market making for corporate securities. They have also had increasing difficulty hedging their portfolios through CDS. The dramatic change in the CDS basis, which was itself caused by a dramatic shift in systemic liquidity conditions, made it difficult, if not impossible, for dealers to hedge their credit at a time of rapidly changing credit conditions. Accordingly, many reasons have contributed to the reduction in liquidity during the market turmoil.

Question 4: Do you believe that additional post-trade transparency of European corporate bonds would have helped maintain liquidity in stressed market conditions? Can you please explain why?

- 20. No, additional post-trade transparency would not have helped to maintain liquidity because the reduction in liquidity was, in no part, caused by a lack of post-trade transparency. It is, however, possible that mandatory post-trade transparency would have exacerbated the reduction in liquidity indeed most market participants consulted by the EU Commission and CESR in the recent past believed that mandating post-trade price transparency would have a negative impact on liquidity. The vast majority still believe this to be the case and that it would therefore have further exacerbated the contraction in liquidity.
- 21. This is because, as the crisis has shown, liquidity is a function of capital and confidence rather than post-trade transparency. We would add that in an illiquid market, post-trade data may not be particularly helpful, especially if that data is dated and hence inaccurate. In such situations, it is more important for market participants to know at what price they could trade rather than the price of the last trade, especially if the last trade took place hours, days, weeks or even months previously. Stale post-trade prices cannot be used for either valuation or execution.

Question 5: In your view, what were the key reasons for the widening of the bid/offer spreads for European corporate bonds?

- 22. The main reason for the widening of bid/offer spreads for European corporate bonds is that dealers are increasingly risk averse due to tightening credit conditions and fears of a global recession. When the capital of market participants is constrained as risk is increased for the positions already held due to higher market volatility, trading activity is reduced to stay within the same level of risk parameter. To comply with this, one of the things market participants can do is to widen spreads and/or reduce the size of their quote. Thus, secondary market prices currently embody significant discounts for illiquidity and uncertainty. Additionally, credit markets are also currently pricing in a scenario in which around one-third of issuers would default.² We also note the Bank of England's October 2008 Financial Stability Report which indicates that the rise in UK spreads since April 2008 is largely due to increased compensation for credit risk for both expected defaults and downgrades and uncertainty about defaults and downgrades. Another reason for widening bid/offer spreads has been hedge fund redemptions and banks de-leveraging and removing credit from their balance sheets, which has resulted in an excessive supply of bonds. As dealers are forced to reduce their balance sheets in order to deleverage, they become liquidity takers rather than liquidity providers.
- 23. Since liquidity is also central to the success of the RFQ model on e-trading platforms, it is normal to see the less transparent settings on e-trading platforms (see Annex 7) as well as voice broking become more prominent to fill the gap and provide certainty of execution.
- 24. The narrowing of bid/offer spreads in a bull market and the reverse in a bear market should be viewed as a natural market phenomenon.

Question 6: Do you believe that greater post-trade transparency would have been helpful in limiting the widening of the bid/offer spreads we have observed for European corporate bonds?

25. Widening spreads are not necessarily indicative of a lack of liquidity and vice versa. When an investor is open about the size he wants and asks for either bid or offer, he is more likely to get a price for his size from an intermediary, regardless of how wide or narrow the bid/offer spread in the market is on that particular bond at that time. This means that there is liquidity even if bid/offer spreads are wide. The important issue for the investor is to get the trade executed. A tight bid/offer spread on its own is not helpful without liquidity to lead to a trade execution. Moreover, it is market practice for an investing client who wishes to execute a large block of trade to approach only one or a small number of market makers/dealers to achieve an efficient execution, even if the bond in question trades in a tight bid/offer spread. This is because no intermediary would be willing to show a tight bid/offer spread, regardless of the liquidity already available in the particular bond, if they knew that their competitors had also been contacted and were aware of potential positions from the trade that would need to be unwound after the trade. Accordingly, additional post-trade transparency would not have helped to keep spreads tight given these more fundamental concerns.

Question 7: Do you use CDS prices for pricing European corporate cash bonds? If so, what are the key benefits?

26. Market participants may use CDS as an input in the pricing of corporate bonds but this is not determinative because CDS and bonds are subject to separate and distinct supply and demand dynamics. The CDS price gives a market-neutral indicator of the pure default-risk credit spread over risk-free bonds. Individual bonds, by contrast are subject to specific liquidity considerations

7

² Quote from Paola Binns, manager of Royal London Asset Management's Ethical Bond fund, in an article in Newsweek which can be found at: http://www.investmentweek.co.uk/public/showPage.html?page=828861

which can affect the spread for those bonds relative to the risk-free rate. This makes CDS a useful input in the pricing of new issues and in the secondary market but it does not determine where the price of the bond is or should be, or vice versa. Bonds and CDS are not true equivalents and it would be misleading to treat them as such. The critical issue in bond issuance remains the willingness of investors to invest the full cash principal today. Given that a CDS does not require the transfer of the full principal amount at inception, it clearly has a different liquidity profile. It is reasonable, therefore, to expect that the CDS price would be informative but not dispositive since the relationship between two very different supply-demand dynamics would always need to be assessed.

- 27. CDS may have seemed to determine pricing in the loan market, with one publicized case in late 2008 involving a loan priced relative to the CDS spread. But the mere fact that the consideration for an advance is set relative to the current CDS premium does not preclude the price of the loan diverging from par in any secondary market in that loan. It is noteworthy, moreover, that the company in question had no debt of any sort outstanding up until that particular point, reducing the availability of alternative inputs. And even in such a situation, the CDS spread will not necessarily be used (other previously debt-free issuers have simply targeted a particular spread, rather than specifically linking to the CDS level). Lending banks may anticipate an ability to hedge some portion of credit exposure in the CDS market, as and when that may prove desirable, as part of their credit portfolio management. This does not, however, imply that the loans are priced from CDS, or vice versa.
- 28. The UK Debt Management Office has used CDS spreads for pricing backstop credit to a UK bank, again suggesting that CDS can perform a powerful role. However, the circumstances of this arrangement are arguably unusual since they anticipate a situation where 'normal' pricing of lending credit (by reference to loan/securities markets) may be problematic. It is also worth noting that the exact mechanism is to refer to an average of CDS prices over multiple days.
- 29. In secondary bond markets, it is clearly possible that the spread on a particular issue may diverge, not only from where the CDS spread was at the time of issue but also from where that CDS spread currently stands. As alluded to in the CP, a number of technical factors can drive this. [See below for an indicative list of factors, and real-world examples of basis.]. It is important to recognise that this is entirely consistent with the purpose of CDS (and derivatives more generally) in that the price of derivative must converge to that of the underlying at settlement point, but not necessarily beforehand.³ In the case of a CDS, settlement becomes relevant only once a defined 'Credit Event' has occurred.⁴
- 30. This phenomenon of basis is also apparent in the history of the asset-swap market (where a purchased bond is combined with an interest rate swap to create a 'synthetic floating rate note' that isolates a spread over a floating-rate cost of funds). This technique was widely used in the

it is in the process of becoming a pre-documented part of transactions.

8

³ Failure to recognize the inevitable necessity of this convergence sometimes leads commentators to erroneously assume that the price in the derivatives markets can, speculatively or otherwise, dictate the price of an underlying. The most prominent example of this mistake has been in relation to the price of oil and other essential commodities. Such ignorance raises worrying questions about the quality of the public debate about instruments whose sole purpose is to facilitate the transfer of price risk.

⁴ Originally, in CDS convergence upon a credit event was ensured in a very simple way, by providing for physical delivery. More recently, given the predominance (90% plus) of economically offsetting positions in CDS, the process has been refined to accommodate cash settlement, in order to obviate any 'delivery squeeze', by introducing a process of dealer poll modified for the effect of any residual physical settlement that does take place. At the time of writing, this 'auction' process (administered by ISDA) is run ad hoc upon a Credit Event; but

wholesale market, years before the advent of the credit default swap, to express a view on a particular credit versus the price for that credit implied by the bond market. The willingness of parties to enter asset swaps indicates the possibility of differences of view as to a) the pricing of particular bonds and b) the credit of the issuer per se.

- 31. Given that, even in 'normal' times, there are many reasons why a 'basis' can exist between the CDS premium and the bond spread, it would be surprising if it did not exist in more marked form for at least some of the time in the unusual circumstances (and particularly the relative transactional illiquidity) of the past 18 months. Having said which, it is also apparent that over the longer term (for instance, the time period in Graph 1, on page 12 of the CP) the movement in CDS has visibly been directionally consistent with that of bond prices. The logical conclusion from this is that CDS perform a useful function in relation to the price of credit risk but that, by its very nature, the CDS spread should not be expected to move in lock-step with bond spreads.
- 32. Factors that affect the CDS-bond basis: There are a number of technical factors that will lead to changes in the supply-demand balance within one sector (CDS or cash bonds) independently of the dynamics of the other. The table below summarises some such factors. In it, the 'basis' is defined as the CDS spread minus the spread on the bond (relative to the risk-free rate). So, where there is significant selling of protection in CDS, the spread may narrow; and where the bond is heavily in demand, the basis may widen.

Narrowing	Widening
'Synthetic lending' (in context of illiquid bonds) – protection selling will bring CDS premium down	Debt tightly held – yield on bond will fall, relative to pure credit risk premium (ie, CDS)
High (supra-Libor) investor funding cost – selling CDS a cost-efficient way of going 'long' a particular credit	Relative difficulty of shorting corporate bonds – long bond positions will dominate pure credit risk premium
Counterparty risk on seller – seller will price CDS more keenly to compensate	Investors can make money on repo, ie, lend security – this increases incentive to hold bond, rather than write CDS
For bonds trading at premium to par, more at stake in buying bond than in selling CDS (where exposure is capped at par amount) – investor will write CDS protection	Asset swap spread can be negative; whereas CDS premium has lower bound of zero – long interest in a particular name can have a bigger positive effect on bond than CDS
	Existence of 'cheapest-to-deliver' option in CDS – marginal incentive to buy CDS Investors hedging out credit risk on convertibles
	(to focus on equity option) – purchase of CDS

33. The table below provides an illustration of how much this 'basis' can vary at a given point in time across bonds from different issuers (viz, from -1500 basis points negative for the VNU issue due 2016, to +440bp positive for the ENEL issue due 2024); and can even vary among bond issues by the same entity (viz, a difference of over 1000bp for the two VNU issues indicated). It is also possible for the 'sign' of the basis (ie, whether the basis is positive or negative) to vary for the same issuer, albeit for issues denominated in different currencies (viz, CHK, euro vs dollars). Note that, within this representative sample, there is no clear correlation between the size of the 'basis' and the level of the CDS premium. A higher CDS premium does not necessarily imply a higher basis (or a lower one). There is some, weak correlation between the cash bond price and the basis. (Thus the greatest negative basis [-1541] is seen for the bond with the lowest price in the sample [30], and the highest positive basis [440] for the bond with the highest price [103].) But there is no evidence of a strong relationship between cash price and CDS level.

Issue	Basis	CDS to maturity	Cash Price
ITV 11's	-366	950	80
KINGFI 10's	320	960	98
Man 12's	229	340	102
ENEL 24's	440	540	103
ENEL 17's	324	550	96.5
FIAT 17's	-94	1300	50
FIAT 13's	-334	1596	60
VNU 9% 14's	-450	950	72
VNU 11.125 16	-1541	875	30
KDG 14 \$\$	-468	425	97.5
KDG 14 EUR	-348	425	101
CHK EUR 17's	-100	750	74
CHK \$\$ 16's	55	750	82

Question 8: Which methods of bond price valuation do you use in the current market turmoil? Do you think that the CDS market is still a reliable indicator for bond price valuation?

34. This question presupposes a particular answer to question 7, namely that CDS spreads are (or have been) determinative of the price of bonds. As discussed above, the same methods of valuing bonds that applied before the existence of CDS continue to be relevant now (just as they remained relevant even after asset swaps started being transacted).

Question 9: The spreads between the CDS and corporate cash bonds have widened significantly in the first quarter of 2008. Did this widening of the spreads make it more difficult to price European corporate bonds? If so, do you think that additional post-trade transparency of corporate bond prices would have helped you to price European corporate bonds? How do you assess the situation since mid-September 2008?

- 35. This question presupposes a particular answer to question 7, namely that CDS spreads are (or have been) determinative of the price of bonds. It also confuses two separate issues: 1) the degree of utility of CDS in pricing bonds and 2) the appropriate level of transparency for those bonds.
- 36. The widening of spreads in March 2008, highlighted in the CP, was explained by the CDS market continuing to function, with a bearish view on credit being expressed. At the same time, secondary-market illiquidity in bonds became more acute and (consistent with this) new issuance dropped. Sales of bonds in those circumstances would have crystallised losses for many investors when they were trying to avoid doing so. Given the relative drop in liquidity (even in CDS), such views always had the potential to lead to relatively large price changes. Within the CDS sector, the rise in premia itself triggered some short-run hedging (linked to recalibration of correlation books and the market expectation that some significant portfolio trades would be unwound). In the following weeks, as credit views evolved, this differential reversed, with views again being expressed primarily in the relatively liquid CDS sector.
- 37. Later, in September 2008, the markets experienced a further sell-off on the bond side. A contributory factor may have been the unwinding of (negative) basis trades (i.e., simultaneous purchase of bond and CDS protection), including some such trades that had initially been put on by hedge funds and other proprietary trading entities, affected by the generalised risk aversion on the part of investors. Some of these entities were now effectively forced sellers of the bonds and sellers of protection (to reverse the bought-protection position in CDS), Also, following the

collapse of Lehman Brothers, funding of bond positions became harder, even on a collateralised basis, increasing the incentive for some investors to cut back holdings of bonds that they might otherwise have funded in the repurchase market.

Question 10: Do you expect that the relationship between the CDS market and the cash bonds market will return to what has been observed historically once market conditions stabilise? If not, can you please articulate the reasons?

38. Our views on the relationship between CDS and bonds are set out in the response to Question 7. We would add that the volatility of the basis in relation to any given entity is likely to drop, as markets return to normal. The existence of a basis, though, will not necessarily change.

Question 11: Have you experienced difficulties in valuing corporate bond holdings? If so, what were the main reasons?

- 39. Market participants have experienced difficulties in valuing corporate bonds but these difficulties are due to a lack of transactions and instability in the CDS market rather than a lack of post-trade transparency which would in any case have been of limited use and perhaps even been misleading in an illiquid market. In the later context, valuations are made as of a particular date and there are often simply insufficient traded bonds on any one particular date to produce meaningful price information for a trade that happens weeks or months later. This is particularly true in high yield bonds where liquidity was already extremely thin even pre-crisis (except in a few issues) and even more so today since there has not been any new issuance since August 2007.
- 40. Work is being undertaken by the industry to try and resolve some of these valuation problems. It is worth noting that MARKIT has recently introduced its new third stage pricing process, which will hopefully reduce to a few tens, the number of bonds in their 3000 bond universe for which matrix pricing is the only practical approach. The release of this new product has been well received by the investor community who have continuing difficulty with pricing.

Question 12: Would additional post-trade transparency in distressed market conditions help valuation?

- 41. We do not believe that additional post-trade transparency in distressed market conditions would necessarily help valuation. Trade prices can reflect one of three views: (1) fair value; (2) liquidation value; or (3) distress value. Trade prices in an illiquid market are inherently unreliable when attempting to assess the fair value of an instrument. Timing issues make valuation based on post-trade transparency problematic in illiquid markets. For example, there might be a time-lag between the most recent transaction in the same security and the fair value measurement date. Changes in market factors in the intervening period could also make reliance on the post-trade data risky and misleading. There are also concerns that post-trade prices in an illiquid market may not reflect the fair value of an instrument if the prices are forced transaction prices. Finally, value could be different if an investor wishes to hold an instrument to maturity (when he is likely to get a par value) or is forced to liquidate in a distressed market. If a trade is done elsewhere in a distressed market, even if he does not plan to sell now, he would be obliged to use the distressed price, which could be misleading, and would raise a host of other issues.
- 42. CESR has said that it has heard from buy-side industry experts that additional post-trade transparency could assist in valuing portfolios more accurately. We have also heard from some of our members that in relation to the repo market, post-trade transparency may assist in the valuation process. However, our buy-side members take the view that additional post-trade transparency should not be imposed at the expense of liquidity. Moreover, additional post-trade transparency is seen by the buy-side as being just one of a number of data points that can assist

in valuation. There are commercial services that provide quote and post trade data. For example, Xtrakter provides bid and offer quotes for more than 9000 international securities. These bid/offer quotes are then processed to provide an average bid and an average offer for each security. Xtrakter also provides end-of-day trade prices of available securities calculated from trades entered into TRAX (Xtrakter's trade matching and reporting system) by approximately 200 firms. The combination of quoted and trade prices is generated for up to 12,000 international securities. However, there are also a number of commercial services that are trying to develop solutions to valuation in conjunction with the industry. Accordingly, a number of methodologies for pricing have been developed, which the market is starting to use. We firmly believe that it will be methodologies of this kind that will be of greatest assistance to the market (and to liquidity levels) rather than attempts to improve current levels of post-trade transparency.

- 43. The CP states that "...timely, consistent, accurate and widely accessible data on bond prices is helpful for calculating new asset values, which bond funds typically calculate on a mark-to-market basis." Whilst academically accurate, this statement does not appear to factor in the difficulty in marking the bond prices to market due to the factors aforementioned. Whilst post-trade transparency would seem to be technically useful, the practicalities are such that it is not a comprehensive, and thus viable, solution to the lack of pricing visibility. Whilst post-trade transparency would seem useful, such data would be just one element amongst many that would have to be taken into consideration for valuation of illiquid assets (as per the IASB guidance and going forward, possibly the Basel Committee in the light of their recent consultation).
- 44. Given the current economic climate, valuation is a relevant and ongoing issue. While we welcome CESR's initiative in opening up the subject of valuation to debate, we question whether a consultation on post-trade transparency is the appropriate forum in which to fully discuss the issues. Rather, we think that CESR may be best placed to carry out a separate, in-depth consultation on valuation difficulties.

Question 13: Do you agree with the potential benefits and drawbacks described above? Please provide evidence supporting your opinion. Please explain how the potential drawbacks might be mitigated.

- 45. The CP argues that the benefits of improving transparency could include (a) retail investors and small/medium sized firms benefiting from better access to existing information sources; (b) an increase in the efficiency of the price discovery process opening the information to all kinds of investors; (c) a reduction in bid-ask spreads; (d) a reduction in search costs for investors and (e) the fostering of competition amongst dealers.
- 46. Commercially driven publication of quotes has been prevalent for many years. Currently there are numerous sources of real time and close to real time pre-trade information. Aggregators such as Bloomberg, and Thomson Tradeweb, lboxx and MarketAxess are very active in this market. Since 1986 ICMA/Xtrakter has published a composite closing quote for each bond for which at least one market maker has registered to trade. It also publishes a significant amount of trade data which is available overnight and for a fee to Xtrakter's subscribers, including brokers, advisers and fund managers. Additionally, the ICMA/Xtrakter bondmarketprices.com service provides much of the same data to retail investors for free. SIFMA's investinginbondseurope.org provides price information on an additional 3,000 bonds, also for free. Other web-based retail focused systems such as TLX in Italy and Bondscape in the UK provide further price information on thousands of bonds across hundreds of issuers. Accordingly, we would argue that there already exist market-led initiatives that provide retail investors with access to pre- and post-trade transparency. Where bonds are reported and published consistent with the ICMA Standard we cannot see that additional mandatory post-trade transparency could increase the benefit to retail investors.

- 47. One also needs to consider what exactly the benefit would be to investors of increased post-trade transparency. In this context, it is worth noting that Europe is subject to significantly greater preand post-trade transparency than was available in the US bond market at the time the Goldstein et al experiment was conducted. As the ECB has itself recently acknowledged, José Manuel González-Páramo (Member of the Executive Board of the ECB) at the Public Hearing on non-equities markets transparency organised by the European Commission in September 2007 stated "Indeed, the pre-trade transparency in some liquid cash and derivative market segments (in Europe) is so high, at least under normal market conditions, that it makes the real-time post-trade transparency obsolete for price discovery purposes. Furthermore, the credit derivative market nowadays offers far more efficient price discovery and hedging tools than when TRACE was established."
- 48. In relation to market efficiency, as is pointed out in the CP, there is a considerable body of academic evidence suggesting that more formal post-trade transparency could lead to a decline in liquidity as it would reduce incentives on liquidity providers to participate in corporate bond markets. In this context it is worth noting that most investors in bonds buy and hold to maturity. Trading activity is concentrated in the first days of issue. While an equity investor must deal almost exclusively in the secondary market to buy and sell a share, a bond investor can buy a bond and wait until redemption. Bonds therefore trade infrequently compared to equities. In a recent data sample, only about six non-government bonds (from a total of over 6,000 that traded on one day) experienced 200 or more trades a day and unlike equities those six bonds will differ week by week (see Annex 8).
- 49. One important consequence is that unlike equities there is no central or dominant pool of liquidity in bond markets, except in the most highly liquid markets, such as certain government bonds. Because most bonds do not trade frequently, there is never a constant source of buyers and sellers looking to trade sufficient to sustain a central pool of investor provided liquidity. Investors instead rely on the ability of dealers to assume the risk inherent in intermediating the timing differences between buyers and sellers. Dealers sell securities from and buy securities into their trading portfolios. Most of their trades are therefore done on an at-risk basis; i.e. they do not have both a buy and sell order at the time they enter into a transaction. Accordingly, mandatory post-trade transparency would make dealers more reluctant to participate in the market. It is also worth noting that in a recent article following up their 2005 report⁵ Bessembinder and Maxwell report buy and sell side concerns about the declining willingness of dealers to acquire and hold inventory in the TRACE environment and the "nearly unanimous view" that "trading is more difficult after TRACE" (see also our response to Q15-17 as well as Annex 6 for further details on the TRACE experience).
- 50. In response to the question of how potential drawbacks might be mitigated, it is worth quoting Professor Richard Portes: "The very existence of most financial markets depends on striking a balance between transparency, thought to promote competition, fairness and investor protection, and opacity, in the interest of encouraging ongoing participation of both end-customers and liquidity providers." A range of services that provide trade transparency targeted to both retail and wholesale already exists. To the extent that a deficiency is identified in a particular area, a tailored solution (to address the specific deficiency) would need to ensure that the right balance between transparency and liquidity is struck.

⁵ Optimal Market Transparency: evidence from the initiation of trade reporting on corporate bonds

⁶ Bessimbinder and Maxwell: Markets: Transparency and the Corporate Bond Market Journal of Economic Perspectives, Spring 2008

Question 14: Are there other main benefits or drawbacks of increased post-trade transparency in the bond markets which CESR needs to consider?

- 51. We recommend that CESR examine measures other than post-trade transparency to help restore market confidence. For example, corporate bond markets could benefit from greater periodic reporting. Issuers whose equity securities are admitted to trading on a regulated EU market are required under the Transparency Obligations Directive to publish periodic financial information. Debt issuers are currently partly exempt from this requirement and it may be worthwhile for CESR to consider whether to impose more harmonised periodic disclosure requirements.
- 52. High yield bond investors would like to see not only more timely and more complete periodic disclosure (currently this is only a contractual commitment that issuers do not always comply with), but they would also like disclosure of the terms of the issuer's senior debt, including covenant breaches, waivers and amendments. These events directly affect the default prospects of the high yield bonds and hence, their trading price. Investors holding both the bank debt and the bonds of an issuer create informational asymmetries in respect of those investors holding only bonds as discussed in paragraph 17 above. These issues are amplified in economically distressed times. Another critical challenge facing high yield investors is the absence of a central repository akin to SEC EDGAR which leaves issuers' websites (often password protected) as the only practical source of information. Existing investors may not be alerted that an issuer has posted to its website a periodic report (or announcement of an event of default), and prospective buyers of the bond will not be able to access the password-protected site. These issues are currently being addressed by the European High Yield Association.
- 53. Issues have also arisen with respect to the amount of disclosure required pursuant to the Prospectus Directive (PD). In particular, short form prospectuses are neither viable nor desirable until measures are taken to enhance the continuous disclosure regime and to make the disclosure more widely and consistently available. Article 11 of the PD affords a mechanism to incorporate by reference information that is made available under continuous disclosure obligations that flow from admission to trading on a regulated market. Use of incorporation by reference would almost certainly yield smaller prospectuses, but under the current regulatory regime related to continuous disclosure it would also result in an unacceptable reduction in the level and quality of disclosure available to an investor. In our view, this option will be viable only if the quality of information required to be disclosed is of a significantly higher standard, and is made much more easily accessible to investors (e.g., via an electronic repository), than is currently the case.
- 54. As described more fully in Part II of the CP as well as Annex 2, there are a significant number of industry-led transparency initiatives in train in the securitisation market. For example, the "RMBS Issuer Principles for Transparency and Disclosure" published February 19th, 2009 by the European Securitisation Forum, advocates better issuer disclosure. Similar disclosure for the corporate bond market may be helpful.
- 55. Accordingly, we feel that an examination by CESR of these important primary market issues would do more to help restore market confidence than a further examination of post-trade transparency.
- 56. Some firms have indicated that their only comment regarding existing post-trade transparency for corporate bonds is the uncertainty surrounding the percentage of the market in Europe that is captured by existing post-trade transparency. However, it is recognised that even a mandatory EU post-trade transparency system would still not capture every trade (e.g. a trade between a Ukrainian bank and a Swiss bank in a German bond might not be trade reported/captured).

57. This brings into sharp relief the crucial questions of "who" the intended audience would be for more comprehensive post-trade transparency and "why" such an audience would need greater levels of post-trade transparency. We do not believe that a one-size-fit all mandatory post-trade transparency will be effective in addressing the very granular issues we need to resolve. Moreover, a mandatory post-trade transparency system could generate considerable costs in both time and infrastructure that (especially given current market conditions) market participants may not have the capacity or resource to accommodate.

Question 15: What are your personal experiences with TRACE? Please specify whether you are directly trading in the US corporate bond markets on the buy or sell side.

- 58. Since the advent of the price transparency and TRACE discussion and implementation in the US, SIFMA members in the US, which include both buy and sell side firms actively trading on the US corporate bond markets, have been quite vocal on both the benefits and drawbacks to post trade transparency as it has been achieved through TRACE. We attached link to a September 2006 Bond Market Association (predecessor to SIFMA) response to the European Commission 12 June 2006 call for evidence on transparency in non-equity markets⁷ and attached as Annex 6 a summary of recent research on TRACE prepared by our research and policy team. Both these documents speak at greater length to our experience with the TRACE system. While minor enhancements to TRACE may have been made since these documents were prepared, the core message largely remains the same: post-trade transparency is a good thing but not at the expense of liquidity. We are very supportive of price transparency efforts as a whole but much consideration needs to be given as to how it is achieved. During these times of financial turmoil, the scarcity of market liquidity makes it even clearer, for example, that the lack of sufficient time delay in trade reporting has inhibited dealers from committing capital. It was specifically noted in our discussion that the "U.S. had been in a relatively benign environment over much of the TRACE history and when the credit cycle turns one would expect to see lower trade volumes and potentially situations where one trade can move or price the market". We are now at that time, and as can be noted from the September 2008 survey of our US Asset Managers' members (attached as Annex 4), their view on TRACE has not changed since the crisis started: TRACE remains a "nice to have", not a critical source of price information. We attach a link to a TRACE presentation provided by SIFMA at the EU Commission hearing on non-equity market transparency in Sept 2007⁸ which provides further investor feedback on TRACE.]
- 59. Annex 6 references several academic studies and articles on the impact of TRACE. We have entered a new economic era that may very well prove to offer new evidence on the effects of TRACE. Our early experience indicates that TRACE, as currently configured with relatively short reporting periods, may be exacerbating the illiquidity in many fixed income markets as dealers are increasingly unwilling to commit capital in their market making activities, thereby extending and increasing volatility.
- 60. Much of our experience and observations are already duly noted within the text of the CP. As is mentioned in our attachments, SIFMA's conclusions in 2006 still hold today, regarding in particular: the value of providing broader access to TRACE data for academic and private sector research and confirmation of data analysis; the potential and observed adverse effect on liquidity of immediate U.S. TRACE post-trade price dissemination on credit markets, in particular

¹ http://europe.sifma.org/docs/BMA%20US%20Response%202006%20FINAL.pdf

⁸ http://europe.sifma.org/docs/EC%20TRACE%20Presentation%20Sept%2007.pdf

infrequently traded, high-yield and distressed corporate bonds; and the importance of resolving methodological issues around the definition and measurement of market liquidity.

61. More recent TRACE studies in fact throw a number of important lights into the current debate on bond market post-trade transparency, in particular: bid-ask spreads and execution costs are not the only measure of liquidity, as they do not fully capture many important liquidity characteristics such as market depth and resilience; market participants on both sides (dealers and institutional investors), who for the first time were consulted on any TRACE study, complained that TRACE had made trading more difficult – whilst bid/offer spreads and cost of trading decreased, so did dealers' ability to commit capital (i.e., to provide liquidity, in particular for large trades) and to execute quickly, and so did the quality and quantity of services formerly provided by dealers to their clients (e.g., research); the question is being raised as to whether the costs of TRACE may exceed its benefits; enhancing the understanding of the determinants of liquidity is critical to evaluating trading and reporting systems and designing market structures.

Question 16: Do you see other benefits or drawbacks of the introduction of a TRACE-like post-trade transparency regime for OTC trades in corporate bonds in Europe?

62. TRACE was introduced in part to address a lack of pre-trade price transparency, while a very different situation is evident in Europe. The buy-side view of the benefits of a TRACE type system for Europe are nuanced as per their views on TRACE itself. The SIFMA Asset Managers Division survey, attached at Annex 4, indicates that 50% think the disadvantages outweigh benefits or would make no difference, while the other 50% think the benefits would outweigh disadvantages.

Question 17: Are you of the view that the more notable volume declines experienced for 144a securities, compared to securities which are covered by TRACE, is due to a lack of post-trade information? Please provide a rationale.

63. We do not believe there is any connection or inference to be made between post-trade transparency and volume declines in US 144A securities compared to securities which are covered by TRACE. Trading volumes in these securities are inextricably tied to the volume of new issuance especially given that the most significant volume is produced within the first few weeks post issuance. As can be seen from Annex 5, TRACE volumes have also dramatically declined, and at a much faster rate than their equivalents in Europe. A second and equally influential factor relates to the nature of the typical US 144A investor who is much more likely to have a "buy and hold" strategy" and only use secondary markets opportunistically. Given the widening of credit spreads and liquidity declines more generally, these investors have simply returned to their core "hold" strategy thereby dampening trading volume as portfolio turnover declines.

Question 18 and Question 19: Please provide information on your experience, if any, in terms of timing, content and access to information of the market-led solutions outlined above. What is your assessment of the effectiveness of the present self-regulatory initiatives? Please provide comments on the characteristics that market-led initiatives should, in your view, have.

64. As regards SIFMA's www.inbestinginbondseurope.org (IIB) website, the purpose of the site, consistent with both CESR and the EU Commission's findings in previous consultations on price transparency, is to increase transparency of EU fixed income markets for European retail investors. While providing free access to price information on around 3,000 bonds, the main focus of the site is to provide the necessary education that empowers retail investors to make sense of this additional transparency, in particular when it comes to reading and understanding price information. The site, which is available in 5 languages, was launched on 11 December 2008, so it is still too early to reflect on its usefulness and impact. We do however have statistics that are starting to give us a sense for it, all of which pointing to a positive initial view that the site

is fulfilling its intended purpose. The statistics reflect our tracking of the traffic in the 6 weeks following launch and are as follows:

- Although the site is still finding its audience (and has not been picked up by Google yet), there
 have already been 11,072 visits to the site. Almost 5 different pages on average have been
 viewed per visit.
- Ignoring the home page, the most visited page is "Bond Markets Defined", second is
 "Corporate Markets at a Glance", third is "Government Markets at a Glance", fourth is "News";
 and fifth is "Learn More" contents.
- The average time on the site overall is 4.5 minutes, which is well above average for a site of this nature. The amount of time spent on the "Corporate Markets at a Glance" is 3.17 minutes
 And the amount of time spend on the "Government Markets at a Glance" page is 5.4 minutes.
- English use is highest followed by French, German, Italian, and Spanish. The French spend an average of more than 7 minutes on site; Germans spend 6.5 minutes, while Italians spend 9.5 minutes.
- o 42% of visitors return to the site.
- 65. We are continuously monitoring usage of the site, are in the process of collecting feedback from users and already planning further improvements. We welcome the opportunity provided by CESR's CP to assist us in that process. We are also in communication with a number of CESR members in order to seek their support in raising awareness at the EU member state level about IIB.
- 66. ICMA published its Standard of Good Practice on Bond Market Transparency for Retail Investors in September 2007 (the "Standard") and launched the www.bondmarketprices.com website in December 2007. ICMA has recently completed a review of the Standard and the bondmarketprices.com service ("Xtrakter Service"). In respect of the Standard, the conclusions of the review are that the parameters for displaying bonds (i.e. the bond type, issuer type, maturity, minimum issue size, minimum credit rating, trade size and currency) are appropriate for a retail market. Additionally, the content of the information to be displayed with respect to qualifying bonds was also considered to be appropriate for a retail market.
- 67. The review noted the European Commission's criticism (repeated in the CP) set out in its article 65 review regarding the timeliness of prices. While one solution would be to display the last price at which the bond traded, ICMA considers that there is a danger in displaying out-of-date data. The aim of both the Standard and Xtrakter Service is to display prices of highly liquid bonds. Bonds which do not trade often may not be liquid, and displaying out-of-date prices may imply a level of liquidity that does not exist. Also, if prices are displayed in relation to trades that have taken place some time in the distant past, it could potentially mislead less sophisticated retail investors i.e. prices would not be realistic or up-to-date as identified in the Commission review.
- 68. ICMA continues to believe that end of day, high/low and median prices as well as the prior day's close represent the best format for retail investors particularly in view of the best execution requirements of MiFID. Real time or delayed real time prices are more likely to confuse the issue when a retail investor is negotiating a trade, and by comparing the trade price concluded with the day's high/low, median and close, an investor will more easily and consistently be able to assess the quality of execution. Between the SIFMA IIB website and the Xtrakter Service, retail investors

⁹ A copy of the review can be found at: http://www.icma-group.org/ICMAGroup/files/e0/e05637a5-1ab1-4c65-b86a-80e74375a3e7.pdf

- are likely to find a closing quote or a high, low and median price for almost any liquid bond which conforms to the reporting criteria of either the Xtrakter Service or the SIFMA IIB site.
- 69. The CP also comments that self-regulatory solutions are so far characterised by limited coverage in terms of issues and transactions covered. However, the Xtrakter Service is reporting the largest number of bond trades since the service was launched (approximately 1200 − 1500 reported trades per day in the €15,000 €1 million price range) partly because wholesale market trade size has dropped so significantly. The €1 million threshold was chosen to avoid disclosing large trades and the price distortions which they might entail, not because it represented a threshold between retail and wholesale trades. The minimum trade size of €15,000 serves retail well by reducing the instances of off-market prices caused by the inclusion of retail commission or mark-up in very small trades. Moreover, the minimum credit rating of A- will have been relatively safer for retail investors during the recent market crisis than lower thresholds. Issues below these thresholds will be relatively much less liquid now than they were before the crisis.
- 70. The CP also comments that self-regulatory solutions are so far characterised by limited coverage in terms of institutions which provide data. However, while the data displayed on the Xtrakter Service is from firms reporting trades to TRAX who are mainly based in the UK, market estimates indicate that two-thirds, by value, of all transactions in the European bond market have at least one leg of the trade going through London. Nevertheless, we do note that the ICMA Standard has not been adopted on a pan-European basis.
- 71. The CP also notes that the delivery mechanism needs to be well-advertised and easily accessible. The Xtrakter Service, as a free internet based service, is accessible to all investors both in Europe and globally. However, ICMA acknowledges that there is still considerable work to be done to improve the marketing and accessibility of the Xtrakter Service. More could also be done to make the Xtrakter Service more user-friendly. Xtrakter have recently launched a new version of the website with significant improvements regarding both functionality and ease of use and a new advertising campaign is being planned.

Question 20: Do you think that the introduction of additional post-trade information on prices could help restore market confidence and maintain market liquidity in times of future crisis?

72. As stated above, the ultimate objective to restore market confidence and liquidity should be prioritised. We set out in our responses to Q3 and Q5 our view on the primary reasons for the lack of liquidity and market confidence. While a number of tools can be used to improve market confidence and liquidity, 10 we do not believe that additional post-trade transparency is one of them. We feel that the drawbacks of additional post-trade transparency would far outweigh any possible benefits. Furthermore, the drawbacks would be even greater if additional post-trade transparency were to be introduced without carefully targeted measures in response to specific market failures.

Question 21: Do you believe that additional post-trade transparency of European corporate bond markets would contribute to liquidity in normal market conditions? Can you please explain why?

73. No. It is likely to be counter-productive, especially if measures are not well targeted and the beneficiaries of the additional transparency are not correctly identified. As stated in our response to Q13, liquidity in bond markets is highly dynamic and additional post-trade transparency would

¹⁰ for example, improved issuer disclosure as set out in our response to Q14 and improved pricing methodologies as set out in our responses to Q11 and Q12,

not increase liquidity in normal market conditions. On the contrary, we feel that additional post-trade transparency would serve to actually reduce liquidity and widen bid/offer spreads.

Question 22: To what extent can corporate bond markets be characterised as wholesale or retail markets? How would you distinguish between wholesale and retail markets? What are the differences across the EU?

- 74. For most of Europe, corporate bond markets are almost entirely wholesale markets. There are a few jurisdictions in Europe, such as Italy, where there is active retail participation in the market. On the other hand, in the UK and France, for example, corporate bond markets are characterised by a predominance of wholesale participants.
- 75. The retail markets can be characterised by a larger number of tickets. Wholesale markets, on the other hand, have larger volumes. One way to distinguish between retail and wholesale trades would be to use a €1million ticket size as a threshold. Trades which are less than €1million could be characterised as retail while trades which are more than €1million could be characterised as wholesale. The ICMA Standard for Retail Investors uses the €1million ticket size as a threshold.
- 76. Annex 8 contains data derived from Xtrakter's database and the TRAX trade matching and regulatory reporting system. It is worth noting that that on a randomly selected day less than 20% of trades by number were of a trade size less than €50,000.
- 77. Ultimately, measures should be suitable for, and targeted to those specific issues where improvement is considered necessary (because there is evidence of market failure), in order to balance risk and benefit.

Question 23: What would be the benefits and the downsides of a harmonised pan-European transparency regime for: a) the wholesale market; b) the retail market. Please provide arguments and fact-based data on the potential impact.

- 78. As stated in our response to Q22, the best approach would be to tailor any measures to specifically address identified market failures. In terms of the wholesale market, post-trade transparency has more risk of being counter-productive than being helpful. As stated in our response to Q13, liquidity in bond markets is highly dynamic and additional post-trade transparency would not serve to increase liquidity in normal market conditions. On the contrary, we feel that additional post-trade transparency could serve to reduce liquidity and widen bid/offer spreads. Other measures (some already taking place) such as wider issuer disclosure may be more productive. However, if CESR were to conclude that there was evidence of market failure arising from current levels of post-trade transparency, our preference would be for a pan-European solution rather than a series of national solutions to prevent regulatory arbitrage.
- 79. For the retail market, it is important to first identify what is needed in addition to existing market-led initiatives. A number of market-led initiatives have been launched recently in Scandinavia (OMX) and Italy (TLX)¹¹ in addition to the ICMA and SIFMA services. These services are being developed and improved in the light of market requirements and technological capability. If a deficiency is identified then we would suggest that CESR and the industry can jointly consider how best to address any market failure. It is important to emphasise that retail market participants have different priorities, and that they should be treated differently from wholesale.

-

¹¹ It is worth noting that TLX (an initiative of Unicredit/HVB and IMI) is an excellent initiative which goes beyond Italian regulations.

Question 24: Is the reduced reliability of the CDS market as an indicator/proxy for calculating the value/price in the cash market under certain market conditions an issue which calls for more post-trade transparency of cash corporate bonds?

80. As discussed above, there is no rigid, mechanical link between the CDS level and the price of bonds (other factors, therefore, remain determinative of the price of a given bond, whether at issuance or in the secondary market). The utility or otherwise of CDS as a proxy for cash bond prices has no bearing on the underlying question of how much transparency should apply to pure bond transactions. The question as to what level of transparency is appropriate within the bond market is a separate one, addressed in other questions.

Question 25: Do you think that transparency requirements could help address wider issues such as those relating to accurate valuations?

81. No. Price transparency does not necessarily make portfolio valuation easier or more objective. In extreme circumstances such as trading illiquid or outsized positions, price information would be misleading. Post trade transparency, based on transaction reporting data would not provide fair value in an illiquid market. In its consultation document, "Revisions to Basle II Market Risk Framework", published in January 2009, the Basle Committee of Banking Supervision says that in an illiquid market, observable data should be considered but may not be determinative. Valuation adjustments should be made as appropriate for marking to model.

Question 26: What would be the most cost-effective way of delivering additional transparency an industry-led solution, possibly based on a road map set by regulators, or mandatory regulatory post-trade transparency requirements? a) the retail market. b) the wholesale market; Please, provide a rationale.

- 82. We would like to better understand CESR's objectives and would like to work with CESR to find the ways to achieve those objectives. In terms of the wholesale market, we firmly believe that before considering whether to impose a "solution" one must first establish the nature of, and reasons for, the "market failure". In the light of the current market turmoil, while there is evidence of some failure in the markets, it is our view that this failure is not due to, nor has it been exacerbated by, insufficient post-trade transparency. Instead, the current difficulties in the market arise from other, wider issues such as tightening credit conditions amid fears of a global recession. Additional post-trade transparency will not serve to improve the situation and could, in fact damage the markets even further. We think that wider transparency initiatives, e.g., issuer and product transparency and more easily accessible data e.g., via a central data mechanism under the Transparency Obligations Directive and the Prospectus Directive and beyond may help.
- 83. In terms of the retail market, we continue to believe that if there is a deficiency in the market the right way to address it is first to identify and analyse the nature of the market failure. It may be that certain products are unsuitable for this category of investor, rather than the problem being a lack of post-trade transparency. It is also worth noting that it is highly risky to introduce a single measure that would impact the whole of the market (i.e., both the wholesale and the retail market) in order to address a purely retail market issue, if such exists.
- 84. We feel that for both markets, an industry–led solution to any such market failures would be the most cost effective as the industry itself can determine what implementation / infrastructure is cost efficient.

Question 27: Which should be in your view the key components of a post-trade transparency framework for corporate bonds? Please provide your view with respect to depth and breadth of information as well as to timeliness of data as described above.

85. With regard to the wholesale market we reiterate our view that a further post-trade transparency framework for corporate bonds is not likely to be the right tool. There may however be other measures that could do more to improve market confidence. As stated in the response to Q26, examples include broader and better issuer disclosure, perhaps under the Transparency Obligations Directive, similar to the transparency initiatives for securitisation markets, which if modified for the corporate bond market, could enhance general transparency without risking liquidity. With regard to the retail market, we are of the view that the key components are properly reflected in the ICMA Standard. Should additional post trade transparency be considered necessary, average price with appropriate time delay would need to be explored for each segment of the markets.

Question 28: Should the information on the volume be reported only below a certain size, what would be the threshold to avoid any risk of market impact?

86. Please see our response to Q27.

Question 29: Would you see some benefits in a step-by-step implementation, starting with the most liquid bonds, as employed when TRACE has been introduced?

87. We reiterate our comments and confirm that we see more risk than benefit in this approach. Industry is keen to offer ideas via a continuous discussion with CESR once CESR's objectives are confirmed.

PART II: STRUCTURED FINANCE PRODUCTS AND CREDIT DERIVATIVES

GENERAL COMMENTS

- 88. The December 2008 Report referenced in #1 of Annex 2 contains a slide (attached as Annex 3) which ranks market participants' priorities in terms of restoring confidence to the securitisation markets. Based on over 600 interviews and detailed surveys of securitisation market participants globally, the slide ranks improvements to disclosure and valuation practices as the two most important priorities, whilst trade price transparency comes at number 8 with a neutral ranking.
- 89. While both sell- and buy-side members of the European Securitisation Forum (ESF), a co-author of the Report, continue to agree on the paramount importance of strengthening disclosure and valuations processes, there seems to be a more fundamental difference of views on the need for more formalised post-trade price transparency today than perhaps there was at the time the surveys referenced above were conducted in the summer of last year. Whilst secondary trading transparency was not a concern for investors before the crisis when they were able to put a number of sell-side trading desks in strong competition, several of them now believe that in a market that has seen significantly reduced trading activity in the last 18 months, trading transparency would help if the market is to return. As a result, they would like to see trades in listed ABS and CDO securities disclosed as soon as practical, including ISIN, trade price, amount, and date of trade, but excluding information about the counter-parties to the trade. In their view, secondary liquidity could be improved by providing actual trading data points to the market. On the other hand, dealers generally observe that in a very specialised, non-commoditised and inherently illiquid market such as structured finance products (even pre-crisis), post-trade price dissemination to the market will significantly reduce incentives for risk-taking and will therefore reduce rather than improve secondary liquidity. In their view, in a market where only a small handful of dealers are able and willing to provide capital in complex securities, and where most participants know who those dealers are, the reporting of actual trade prices and amounts will compromise their proprietary positions. They point to the fact that there is necessarily a more limited amount of dealers involved in the design and pricing of structured products given the multi-

step, time and resource intensive process prior to bidding involved in analysing both asset and structure characteristics as well as possible derivatives hedges. Therefore, they believe, also drawing from their experience of the impact of TRACE in the US, in particular on the US high yield market, that mandating post-trade price reporting will produce the opposite effect to that hoped for in terms of liquidity. We have not been able to resolve these differences within the consultation deadline. Accordingly, we recommend that CESR form a structured products working group to determine what practical improvements can be made to strengthen the current business models for the provision of price information and how trade price information can be used for that purpose.

90. Of the 10 industry initiatives to improve transparency in the EU securitisation market listed in Annex 2, 9 have now been completed. Although none of these initiatives focuses specifically on the issue of post-trade transparency, we believe that the enhanced access to deal information, the standardisation of the way it is presented, the added granularity and the open access to new data providers' portals will improve market participants' ability to compare, and therefore value, transactions. Valuations are of considerable importance in this market when it comes to establishing the current price of a security that does not trade often or at all. We recognise the need for improvements in valuation processes. The December 2008 report referenced above contains a recommendation to expand and improve independent, 3rd-party sources of valuations and to improve infrastructure and contribution processes for specified types of securitisation and structured finance products. On post-trade price reporting the Report states on page 61: "Market participants believe that in the near-term post-trade reporting systems for securitisations (such as TRACE for corporate bonds) would not have a significant positive impact on market liquidity or provide enough information to meaningfully reduce the current difficulties in establishing valuations. Outside of agency RMBS, markets for securitised products have significantly less secondary trading, as measured by either volume or percentage of outstanding securities that trade, than the markets where post-trade reporting systems are typically instituted. As a result, very limited information would be available from post-trade reporting in the securitisation market, particularly in the current environment where secondary trading volumes are very low. Moreover, most securitisations are customised, non-standard products whose valuations are tied to unique collateral and structural characteristics of individual transactions, and to often varying assumptions about the likelihood, structure and timing of cashflows generated by underlying assets. Some market participants expressed concern that publicly reporting trades could actually have the unintended consequence of reducing liquidity in the near term. If trades were made public, counterparties might be less willing to sell distressed positions or put capital at risk to buy large positions in the necessary redistribution of the overhang of securities. In addition, empirical evidence of the effect of TRACE-like reporting mechanisms on the liquidity of institutional markets has been mixed. The market needs an improvement in the number of securitised products for which valuation information is widely available and an improvement in the quality and transparency of such information."

Question 30: Does this analysis represent your practical experience regarding information relevant and available for pricing of each of the products covered by this consultation paper?

91. As regards CDS, we agree with the description, except to note that there are services in the market (some offered *gratis* to customers) which gather and rank multiple dealer quotations to afford a user-friendly basis for comparison. Such 'parsing' and 'shredding' services are readily available to the institutional clients that make up the non-dealer part of the CDS market. Also available are intra-day broker information and end-of-day prices (e.g., from Markit, which covers its offerings in its own response).

- 92. Supervisors can also make use of centralised data sources (such as the Trade Information Warehouse operated by DTCC Deriv/SERV) for the size of net risk transfer via CDS. Individual firms' positions are also transparent to their supervisors, though centralised sources of information (including prospective central counterparties, or CCPs) could also be helpful in this respect.
- 93. Any change in regulation should take full account of these market-driven forms of transparency, which continue to evolve.
- 94. For European ABCP (ABECP) market access and up to the minute pricing information, investors can use TradeWeb and Bloomberg's ECPX. These applications allow access to offerings across the spectrum of issuers, maturities and currencies from a full range of dealers. On average, TradeWeb has displayed over 20,000 ECP postings per day. Of course, the market is still accessed over the phone through relationships with a wide range of dealers under competition.
- 95. In relation to the other structured products covered by the CP we broadly agree with CESR's description of the price information available in relation to the structured products covered by this CP, in particular regarding the pricing services provided by data vendors. CESR's description however does omit some significant developments in the form of data portals: as part of the aforementioned 10 Industry Initiatives to Increase Transparency, Lewtan Technologies has launched a data portal, which provides open access to market participants to receive prospectus and investor report information on a wide variety of EU securitisation transactions. A main objective of the portal is to improve access to data, so valuation providers can provide a greater quantity and more accurate valuations, particularly when secondary trading activity declines as has been the case since the beginning of the crisis.

Question 31: Are there other sources of information available which you use for pricing and valuation purposes? Can you provide details regarding the respective role of pricing services using proprietary models and consensus pricing services?

96. We include a table below which describes the current available major pricing sources for European structured finance products. There are various forms of commercial data aggregators, modelling services as well as credit rating agency valuation services covering structured finance. We suggest that these sources of information are contacted to discuss costs and benefits of post-trade transparency. There are a number of existing IT infrastructures that gather information from dealers in different ways and provide valuations at a price. It is generally necessary for market participants to subscribe to more than one information source to obtain sufficient information to monitor and value securities, as each source tends to cover specific asset classes, or jurisdiction. These information sources represent a valuable tool for valuations but it is up to the user to have in place appropriate procedures and risk controls to judge the data received based on specific assumptions. The ESF supports initiatives to improve accessibility, consistency and standardisation of information for structured finance market participants provided by all of these pricing sources

Pricing Source	Type of Pricing Source	Price Type (trade, indicative, evaluated, composite quotes, executable)	(real time, end day, weekly, monthly)	Market Coverage (average number of price provided for asset class and by tranches: senior – mezzanine - junior)
S&P Securities Evaluations;	Dealer contributed; cash flow analytics and data modeling	Evaluated	Daily, multiple	Approx. 1.4 million securities; European ABS, CMBS, RMBS US ABS, CMBS, RMBS, CLOs, CDOs
S&P ABSXchange	Cash flow analytics and data modeling	Client-defined model valuation	User driven / ad hoc	Cash flow analytics available for: European RMBS – 75% European CMBS – 70% European ABS – 60% European CDO/ CLO – 50%
Bloomberg	Dealer contributed; cash flow analytics and data modeling	Both indicative and composite quotes (when possible)	End of day	8753 European ABS/MBS securities w/ prices; 156 auto ABS; 3168 CDO; 735 CLO; 907 CMBS; 113 credit card ABS; 3655 RMBS. 2356 securities are AAA; 1145 are AA; 1190 are BBB; 2845 are BB and below.
Fitch Valuation Services (RapCD)	Cash flow analytics and data modeling	Evaluated	End of Day	Synthetic CDO and CDO ² . Currently 250 European CDO deals are tracked by the system, but new issues are added as often as needed based on client requirements.
Fitch Cashflow Analytics Platform	Cash flow analytics and data modeling	Evaluated	End of Day	Fitch Deal View provides loan level collateral and the ability to perform infinite scenarios on the collateral, a transparent bond model and cash flows with the ability to run infinite scenarios on the cash flows. Coverage

				includes US Prime, Sub Prime and Alt-A RMBS. No European RMBS deals are currently listed, though they will be within 2009.
Interactive Data	Dealer contributed; cash flow analytics and data modeling	Evaluated, indicative, and composite. Inputs include: benchmark yields, reported trades, broker/dealer quotes, issuer spreads, two-sided markets, benchmark securities, bids, offers, reference data including market research publications, TBA prices, new issue data, monthly payment information, and collateral performance.	Daily	1.2 million+ structured securities; European ABS, CMBS, RMBS US ABS, CMBS, MBS, RMBS
Lewtan Technologies	Cash flow analytics and data modeling	Evaluated	Daily, as new data inputs are added to Lewtan's databases	5000+ securities
Markit	Dealer contributed	Composite Prices, Spreads, and Av Lives (all cleaned averages) derived from dealers' books of record, indicative quotes, and client valuation contributions	end of day	~4,300 Composites in total after cleaning. Collateral Type: ~55% RMBS, ~15% CMBS, ~10% CDO/CLO, under 10% CC/Auto/Small Business, under 10% other. Ratings breakdown: 40% AAA, 15-20% for each AA, A, and BBB, 5% BB.
Moody's Analytics	Cash flow analytics and	Evaluated	Daily, as new	95% Cash CDOs for EMEA and US; European ABS,

	data modeling		data inputs are added to Moody's databases	RMBS, CDOs & CMBS; 75%+ US RMBS; 80% US CMBS
Intex	Cash flow analytics and data modeling	Evaluated	Updated proactively with cash-flow data every payperiod – usually quarterly for European structured finance, but in some cases monthly.	Nearly 100% of European ABS/MBS. This includes RMBS (all structures, all countries, including UK loan level data where available), ABS (autos, c/c etc.), CMBS, CDOs, CLNs (credit- linked notes).
Thomson Reuters	Dealer contributed; cash flow analytics and data modeling	Contributed, Composite, Evaluated	Real Time, End of Day	European ABS service launched 1/1/2009 – 3000 investment grade tranches, lower grade at customer request. Globally, Thomson Reuters prices 1.4MM fixed income securities daily.

97. The following table sets out additional sources of information for pricing and valuation of ABECP:

Products	Sources of price information for price discovery	Adequacy of prices available commercially	Post-trade reporting information available
ABECP	Either of TradeWeb and Bloomberg ECPX:	Adequate	Euroclear and Banque de France:
	real-time – dealer (composite) executable/indicative		weekly – evaluated traded prices
	(average over 20,000 postings per day on TradeWeb)		

98. In addition, the Federal Reserve publishes daily ABCP prices for the U.S. market, which can be helpful in assessing prices in Europe as many of the issuers are global. Euroclear, ¹² Banque de France, ¹³ and Fed¹⁴ prices are all on the web, free, include historical data, and do not require passwords.

Question 32: What do you think are the benefits and/or downsides of a post-trade transparency regime for ABS? Please support your arguments with evidence and explain how the possible downsides could be mitigated.

99. There are a number of benefits from post-trade transparency: (1) Post-trade transparency would provide information on the timing, amount and price of trade, with an appropriate delay, therefore providing more data points for valuation purposes; and (2) Post-trade transparency would provide additional information on actual market activity. However, there are also a number of downsides including: (1) A post-trade transparency regime is likely to reduce the willingness of dealers to commit capital if information about their identities and positions were made available in these illiquid markets, given the very small number of active market makers in structured products; (2) A post-trade transparency regime, if it was ill-targeted, would also make market participants other than dealers unwilling to trade, exacerbating illiquidity; and (3) In the short term, due to relatively low trading volumes of structured finance products in the current market environment, it is likely that there will be relatively few data points generated by the post-trade reporting

Question 33: Do you believe that post-trade transparency would be desirable for all types of ABS? If not, can you explain which types of instruments/tranches (eg. AAA RMBS) should be subject to post-trade transparency?

100. The deal structures and trading pattern today are not reflective of normal market conditions and it is unclear what will emerge, so it is impossible to have a firm opinion on the question. As evidenced by the last ESF Quarterly Securitisation Data Reports, most RMBS deals are issued under the European Central Bank (ECB) or the Bank of England (BoE) repo facilities to benefit from their liquidity facilities. This pattern is unique to the current liquidity stress, from which no conclusion can be drawn on what may later make sense in the context of this question. CESR should discuss this further with market participants. Care should be taken not to 1) jeopardise access by financial institutions to ECB and BoE liquidity; and 2) create an artificial two-tier market where low liquidity ABS could be priced conservatively on one side and on the other side too optimistically for higher liquidity ABS.

Question 34: Would it be meaningful to segment a post-trade transparency regime between "higher liquidity" ABS (i.e., commoditised products, standardised structures, higher credit quality and homogeneous collateral) from "low liquidity" ABS (i.e., bespoke products, non-

https://www.euroclear.com/site/public/EB/!ut/p/c1/04 SB8K8xLLM9MSSzPy8xBz9CP0os3gz08BgH3MPIwOLMB8LA6MQxwDLEH8XAwN3U6B8JJK8gW-AC1DeyMDTNCDY2N3JIIDucJB9-PWD5A1wAEcD PqD0OXRXGBgru nkZ-bql-

QG2GQ6anrCAAgsvTf/dl2/d1/L2dJQSEvUUt3QS9ZQnB3LzZfNjVRU0w3SDIwMFRNRjAyN1BWQkhRRzFLUDc!

¹²

http://www.banque-france.fr/gb/poli_mone/place/tcn/pub_stats.htm

http://www.federalreserve.gov/releases/cp/

standardised structures, lower credit quality, heterogeneous collateral)? In this case, could you explain what could be considered as low liquidity ABS?

101. While it may have made sense prior to the crisis to focus on the more liquid segment of the ABS market in Europe, i.e. AAA RMBS, trading activity has become inconsistent in certain cases based on reduced number of dealers in this market (e.g. Lehman Brothers, Bear Stearns). For example, a dealer has indicated that its average number of transactions¹⁵ for each month vary from 150 to 600 for a total of about 4000 trades in 2008.

Question 35: What post-trade information should be published? In addition to information about the price at which the transaction was executed, the volume and the time of the transaction, would there be any benefit in publishing information about portfolio composition, asset class, the initial interest (seller or buyer)? Is there any other information which would be relevant?

102. This is an important question that should be discussed in the CESR and industry working group.

Question 36: When should post-trade information be published? Should it be published immediately after a trade has been concluded? Please explain rationale.

103. This is an important question that should be discussed in the CESR and industry working group.

Question 37: Do you believe that a post-trade transparency regime should or could be implemented in connection with other regulatory interventions at the same time (e.g. relating to the quality of information of the underlying assets, standardisation of reporting)?

104. During the time in which CESR meets with market participants, industry efforts should continue to focus on disclosure of underlying asset pool information and standardisation of reporting templates, taking into account of the industry initiatives in this area referred to earlier. Improvements to post-trade transparency need to be properly thought through and adequately calibrated in order to avoid possible unintended consequences on liquidity.

Question 38: Would you like to make any other observations relevant for CESR work on the need for post-trade transparency for ABS?

105. No.

Question 39: Please indicate whether you represent an organisation which is involved in: originating ABS b) selling ABS c) buying ABS d) providing pricing information on ABS; or e) rating ABS

106. ESF members are involved with all aspects of the above.

Question 40: What do you think are the benefits and/or downsides of a post-trade transparency regime for CDOs? Please support your arguments with evidence and explain how the possible downsides could be mitigated.

¹⁵ Transactions are intended trades where a dealer acts as a broker and does not include repo operations with the ECB and BoE where ABS is used as collateral nor proprietary trading.

107. Please see response to Q32, since the issues are the same for CDOs as other securitisations. CDOs tend to be more complex than non-CDO products, although the pricing is developed from models rather than market quotations.

Question 41: Do you believe that post-trade transparency would be desirable for all types of CDOs? If not, can you explain which types of structures/tranches (e.g. cash CDOs vs. synthetic CDOs) should be subject to post-trade transparency?

108. Please see the response to Q33. In addition, most CDOs products are distributed to a small number of investors by a small number of dealers. This makes discovery of a risk position even easier to identify.

Question 42: Would it be meaningful to segment a post-trade transparency regime between "vanilla" CDOs (i.e. comparable to the ABS with standardised structures, higher credit quality and homogeneous collateral) from Structured Finance CDOs (i.e. bespoke products, non-standardised structures, lower credit quality, heterogeneous collateral)? In this case, could you explain what could be considered as less "vanilla" CDOs?

109. Please see the response to Q34. Since CDOs are generally more complex than non-CDO products and all require modeling, it would not be meaningful to distinguish between vanilla and non-vanilla transactions. The level of transparency should be dependent on the liquidity of each specific security.

Question 43: To what extent would post-trade transparency be helpful to reduce the bid and ask spread or price dispersion for a particular transaction/instrument?

110. It is not clear whether post-trade transparency will tighten or widen bid and ask spreads on CDOs for the reasons described above.

Question 44: What post-trade information should be published? In addition to information about the price at which the transaction was executed, the volume and the time of the transaction, would there be any benefit in reporting information about portfolio composition, asset class, the initial interest (seller or buyer)? Is there any other information which would be relevant?

111. Please see the response to Q35. The ESF has taken the lead to standardise the level of preand post-issuance disclosure, however given the heterogeneity of underlying portfolios this effort will take some time before having an impact.

Question 45: When should post-trade information be published? Should it be published immediately after a trade has been concluded? Please explain rationale.

112. Please see the response to Q36.

Question 46: When facing inactive markets, to what extent would a post-trade information regime be applicable? If not, could you detail the rationale for an alternative system when markets are no longer active?

113. By definition post-trade price information is non-existent when markets are inactive. Hence the paramount importance of focusing on strengthening valuations processes.

Question 47: To what extent can observable prices in the secondary market help to test or promote internal valuation models?

114. For illiquid markets and/or distressed markets, actual trade prices, volumes and dates are not necessarily an indication of where a dealer would make a market for a new transaction, since that decision is based on their risk position and market conditions at any given point in time. It is also important to consider the counterparty's reasons for selling, which might indicate that the trade is just a one-off due to distressed sale or it forms a more general trend. Valuation model results should be compared to all other available price transparency data points for reasonableness.

Question 48: Do you believe that a post-trade transparency regime should or could be implemented in connection with other regulatory interventions at the same time (e.g. relating to the quality of information of the underlying assets, standardisation of reporting)?

115. Please see the response to Q37.

Question 49: Would you like to make any other observations relevant for CESR work on the need for post-trade transparency for CDOs?

116. CDOs are expected to return to market even later than securitisations, and certain CDO sectors may not return at all. We would recommend that CESR consider suitable transparency measures for both ABS and CDO.

Question 50: Please indicate whether you represent an organisation which is involved in: a) originating CDOs b) selling CDOs c) buying CDOs d) providing pricing information on CDOs; or e) rating CDOs

117. ESF members are involved with all of the above aspects.

Question 51: What do you think are the benefits and/or downsides of a post-trade transparency regime for ABCPs? Please support your arguments with evidence and explain how the possible downsides could be mitigated.

118. ABECP benefits from strong price transparency, the details of which are laid out in our response to Q31. Neither investors, issuers, nor dealers want trade-by-trade price disclosure. Individual trade disclosure could immediately spotlight positions and activities of individual participants. Individual trades are negotiated and pricing is impacted not only by interest rate levels and credit but also by exact maturity date, size, and demand for issuance by specific names. Participants making price accommodations for specific trades would not want this to affect all their activity. Investors and issuers already have sufficient macro pricing information to factor into their specific trades. Historically, price transparency in the CP market has been so clear that often dealers earn no bid/offer spread at all. As such, firm staffing levels and even presence in the market comes and goes. More price transparency will not aid liquidity.

Question 52: Do you believe that post-trade transparency would be desirable for all ABCPs, whatever their structures or maturities? If not, can you explain which types of structures should be subject to post-trade transparency?

119. Adequate information is published at present.

Question 53: What post-trade information should be published?

120. Adequate information is published at present.

Question 54: Would you like to make any other observations relevant for CESR work on the need for post-trade transparency for European ABCPs?

- 121. ABCP is a short term cash instrument, so investors cannot buy paper with the goal of selling to realise capital gains. Investors buy to hold, simply to try to match cash flows. ABECP has never been nor will be a trading market and even pre-crisis only about 2% of paper reached secondary markets. Secondary paper is less interesting to investors as the end date is already fixed and cannot be tailored to their needs. Overwhelmingly, buyers of secondary paper have been dealers, who often end up holding secondary paper to maturity.
- 122. In terms of pricing, investors are focused on discovering a fair price when they buy. As per our response to Question 51, investors have tremendous access to trade prices. This is a market for sophisticated wholesale investors who have sufficient power to put dealers under competition to obtain market information and the best prices.
- 123. In all of the meetings, papers, conferences, and studies on ABCP since the crisis began, it is difficult to find any mention of price transparency as an important issue. Efforts to further price transparency do not address the fundamental concerns of the market. Investors have pulled back from ABCP because of concerns with 1) program structure and 2) credit. More price data would not bring back bids or liquidity.
- 124. It is important to note that it remains true that no investor has suffered defaulted ECP or USCP issued by a multi-seller conduit. Multi-seller programs have been more resistant to turmoil because of strong bank sponsorship, funding costs passed through to underlying customers, limited exposure to sub-prime and CDO of ABS, and additional backstop liquidity and credit enhancement when required. Globally, investors remain committed to and continue to buy multi-seller ABCP programs where they are comfortable with the credit of the bank sponsor and liquidity providers. The drop in global ABCP outstanding is attributed to investor pullback from "market value", extendible, and structured finance assets structures.
- 125. The Structured Investment Vehicle model with inadequate backstop liquidity is no longer used. Investors will only re-consider securities arbitrage conduits when and if they are comfortable with underlying structured finance assets.
- 126. It is important to note that ABECP (and indeed all ECP) legal documentation has performed as planned and met all demands throughout the worst financial crisis in living memory. ECP has been designed from the beginning to integrate European money markets. ECP has offered a pan-European documentation model for more than twenty years. There have been no scandals or accusations of improper ECP dealing since market inception in the mid-eighties. ECP was exempted from the Prospectus Directive (as was all debt with an original maturity of under 365 days), following scrutiny by the European Commission, European Parliament and CESR.
- 127. The information memorandum is the disclosure document prepared by the issuer and its counsel and is reviewed by the dealers on the programme. The document summarises terms of ECP and programme capability; includes form of Notes; contains issuer description; defines terms for placement globally; incorporates selling restrictions by country; makes clear any non-standard elements; and places emphasis on representations/warranties and enforceability. The respective dealer agreement sets out the basis on which notes are being placed with investors with emphasis on representations and warranties, conditions precedent to issue and enforceability. On 27 October 2005, ICMA released a standard information memorandum and a dealer agreement which were developed by an ICMA working group in cooperation with three prominent international law firms, using the experience of the most prominent ECP practitioners, and are regarded as a market standard of best practice.
- 128. The ECP market insists on thorough legal review by independent law firms and appropriate legal opinions. This ensures that all relevant legal issues are properly addressed and that

investors are buying valid and binding obligations which are capable of being properly enforced. This is vital in pan-European and indeed global trading. ECP documentation is not based on a check-list, rules based, approach as found in certain domestic markets. Such an approach can be used by some issuers to shortcut proper legal review, believing that "checklist" requirements are enough, and minimise the role of the dealer in the formation of documents. In these domestic markets, dealers are often told to accept documentation on a "take it or leave it" basis, and often find out about important changes after the fact. ECP dealers have expertise in the market through longstanding and constant involvement that is fully leveraged to create and maintain documents that best protect investors. This is consistent with how the vast majority of major securities markets operate around the world.

129. In addition to the responses to the specific questions posed in the CP, we felt it could be useful to draw your attention to some points in the ABCP related text of the consultation paper that we feel might be better phrased. Deletions are shown using strikethrough text while additions are underlined.

CP Para 145: Asset-backed commercial paper (ABCP) is a form of commercial paper that is collateralised by other financial assets. ABCP are typically short term investments that mature between 90 and 180 days. Most programs allow for issuance of ABCP with maturities between 1 and 336 days, but usually issuance is for between 30 and 90 days. These instruments are constantly rolled over and issued by so-called conduits (including Structured Investment Vehicles). They are designed to be used for In some structures ABCP provides short-term financing needs for longer-term securities.

CP Para 146: The basic framework of an ABCP conduit is summarized in the figure 3 below. The originating company sells assets, usually receivables, to a bankruptcy remote conduit. The conduit is often established by a commercial bank and purchases the receivables assets with commercial paper issued to institutional investors, usually money-market funds. The bank is referred to as the conduit's sponsor (or administrator) and in exchange for fees it may serves two a number of valuable roles:

- structuring the program;
- arranging and provides conduit investors with liquidity providing a liquidity backstop for conduit investors;
- <u>arranging and provides a providing credit enhancement of assets;</u>
- recommending assets and arranging for purchase;
- issuing and repaying ABCP; and
- monitoring and servicing assets.

CP Para 151: Over the past several years, ABCP securities arbitrage conduits and SIVs have been important purchasers of senior tranches in the Credit Risk Transfer (CRT) markets. They funded their investments in long-term CRT securities with short-term funding in the commercial paper and medium-term note markets. In this way they securities arbitrage conduits and SIVs exposed themselves to maturity mismatch and like banks, conduits and SIVs they - and by extension the CRT market itself - were vulnerable to a run by debt holders.

CP Para 152: The ABCP market has been heavily hit by the 2007-2008 financial turmoil. When pressures stemming from the US subprime mortgage markets spilled over to structured finance products in August 2007, issuers of ABCP started to increasingly experience

problems in finding investors willing to purchase these securities. The problem was that the exposure of <u>some</u> ABCP programs to mortgage related financial instruments had grown very fast. As a result, investors completely lost confidence in ABCP when the subprime tensions mounted.

CP CHART 5: <u>This data is misleading as it ignores US CDs, Euro CDs, and London CDs.</u> <u>Estimates of these markets are US CDs \$2 trillion, Euro CDs \$700 bn, and London CDs \$500 bn.</u>

Question 55: Please indicate whether you represent an organisation which is involved in: a) originating ABCP b) selling ABCP c) buying ABCP d) providing pricing information on ABCP; or e) rating ABCP

130. The responses herein that relate to ABCP reflect views shared by those members of the Euro Commercial Paper (ECP) Committee of the International Capital Market Association (ICMA) with particular interest in European ABCP (ABECP). The ECP market is a professional short-term debt market which offers opportunities for issuers to raise working capital and other short-term funding as well as for institutional investors to make varied and reliable short-term investments. ICMA's ECP Committee represents the main dealers in the ECP market.

Question 56: What do you think are the benefits and/or downsides of a post-trade transparency regime for CDS? Please support your arguments with evidence and explain how the possible downsides could be mitigated.

- 131. It would be a) an unnecessary cost, and b) damaging for market liquidity. The market has developed sources of information, both pre- and post- trade, without regulatory intervention, to support informed decisions by participants. (See our response to Q30 for more on this, including the shredding/parsing services; intra-day broker prices; 'Trade Information Warehouse'; and end-of-day price validation services; all of which are available in addition to the forms of information acknowledged by the CP itself.) Crucially for a clear understanding of the policy issue, such developments have *followed* liquidity, rather than led it. The best regulatory approach would therefore be to acknowledge and support existing arrangements.
- 132. As evidenced by the volume figures reported by ISDA and the Bank for International Settlements, the CDS market, while experiencing some reduction in liquidity relative to other time periods (when all financial markets were more liquid than they currently are), has remained 'open' throughout the past 18 months, and to a much greater extent than that for 'funded' instruments. In so doing it has performed a valuable price discovery function for pure credit.
- 133. (The CDS market's ability to function is of course supported by the containment and mitigation of [the supposedly crippling effects of] counterparty risk, provided by bilateral close-out netting and collateralisation, which reduce counterparty exposures by more than 80%, to well under \$4 trillion dollars in aggregate. The market has also efficiently settled several credit events, taking full advantage of the economic offsets in the market to ensure that settlement flows are less than 10% of the notional amounts, reflecting the true level of net risk transfer, itself now the subject of regular reporting by DTCC DerivServ. The CDS markets have continued to operate, in spite of a highly misinformed level of commentary on this and other aspects of its mechanics. Moreover, central data support supervisory information as to whether risk is being taken by individual participants.)

¹⁶ See http://www.dtcc.com/products/derivserv/data_table_i.php?id=table6 (and the adjacent Table 7) for net risk transfer in CDS markets.

134. These facts clearly belie any notion of market failure.

Question 57: Do you believe that post-trade transparency would be applicable to all types of CDS? If so, can you explain the rationale for which types of CDS (e.g. single name CDS) should be excluded from post-trade transparency?

135. This question appears to presuppose the answer to Q56. It is clear that some types of credit derivative are more liquid than others and that on-the-run indices are generally the most liquid of all; and it is here that the greatest amount of information has spontaneously emerged.

Question 58: What post-trade information should be published? CDS spread, notional amount, reference entity, maturity?

136. This question appears to presuppose the answer to Q56. Any further moves on this should be the subject of detailed discussion with industry.

Question 59: When should trade information be published? Should it be published immediately after a trade has been concluded? Please explain rationale.

137. This question appears to presuppose the answer to Q56. From our answer to Question 56, it will be apparent that we are concerned about the damaging effect on intermediaries – and consequently on market liquidity – of exposure of positions. This is why it is important to build on existing forms of information supply (which are not generally real-time but end-of-day).

Question 60: Do you believe that a post-trade transparency regime should or could be implemented in connection with other regulatory interventions at the same time (e.g. relating to the quality of information on the underlying assets, standardisation of reporting)?

138. This question appears to presuppose the answer to Q56. It is, however, worth noting that the introduction of any justifiable regime "relating to the quality of information on underlying assets" would require planning and work, making it all the more important to assess the rationale for any post-trade transparency regime that was disruptive of existing arrangements while not meeting any identified need.

Question 61: Would you like to make any other observations relevant for CESR work on the need for post-trade transparency for CDS?

139. No.

ANNEX [] - INDUSTRY INITIATIVES IN RESPONSE TO MARKET TURMOIL

This section summarises some of the main areas where the industry is working with supervisors to remedy defects that recent events have revealed.

A. Industry initiatives to improve the securitisation market

(i) Global Joint Initiative : "Restoring Confidence In the Securitisation Markets"

In December 2008, the Australian Securitisation Forum (AusSF), the American Securitisation Forum (ASF), the European Securitisation Forum (ESF) and SIFMA published (http://www.sifma.org/news/news.aspx?id=9462) a report containing a number of practical, action-oriented recommendations to restore confidence in the securitisation markets globally. Based on over 600 interviews and detailed surveys of securitisation market participants, the report identifies four priorities for immediate action by the industry. These are (I) improve disclosure of information on underlying assets for residential mortgage-backed securities (RMBS); (2) enhance transparency with regard to underwriting and origination practices; (3) restore the credibility of CRAs; and (4) improve confidence in valuations, methodologies and assumptions. The full recommendations are:

To increase and enhance initial and on-going underlying pool information on US non-agency and European RMBS into a more easily accessible and more standardised format. Purpose: to improve data quantity, granularity, accessibility, comparability; improved valuations.

To establish core industry-wide market standards of due diligence disclosure and quality assurance practices for RMBS. Purpose: to improve reliability of information; strengthen originator incentives.

To strengthen and standardise representations and warranties as well as repurchase procedures for RMBS. Purpose: to provide greater alignment of originator and investor interests.

To expand and improve independent, 3rd-party sources of valuations; improve infrastructure and contribution processes for specified types of securitisation and structured finance products. Purpose: to provide greater number of securities valued; more robust, more transparent valuation processes.

To improve transparency, reliability, and understanding of CRAs and their ratings. Adopt July 2008 SIFMA Global CRA Task Force Recommendations (http://www.sifma.org/capital_markets/docs/SIFMA-CRA-Recommendations.pdf). Purpose: to restore market confidence in CRAs.

To establish Global Securitisation Markets Group to report publicly on the state of the market, changes in market practices, and potential stress scenarios. Purpose: to enhance public-private sector partnership at global level; more proactive guarding against future crises.

To establish educational program aimed at directors and executives with oversight over securitised and structured credit groups, as well as at investors with significant exposure to these products. Purpose: to enhance understanding of securitisation products and markets; to guard more actively against future crises.

(ii) Ten industry initiatives to increase transparency in the EU securitisation market

In response to the October 2007 ECOFIN Roadmap, a number of associations (CMSA, EACB, EAPB, EBF, ESBG, ESF, ICMA, LIBA, SIFMA) committed in July 2008 to deliver to the European Commission ten initiatives to improve transparency in the EU securitisation market,; most of which are now complete - see http://www.europeansecuritisation.com/dynamic.aspx?id=1518 on ESF's Website for further details and updates). These initiatives are:

- (I) Increase Transparency in Reporting of Securitisation Exposures under CRD Pillar 3. Purpose: To promote sound implementation of securitisation related CRD disclosure requirements. Status: complete.
- (2) Organise Comprehensive, Frequent and Relevant Statistical Data: New Quarterly Securitisation Data Report. Purpose: To provide transparency to policymakers for monitoring securitisation markets. Status: Complete, ongoing new Quarterly Securitisation Data Report includes data on issuance, outstanding, ratings changes, spreads, prices and investor types and locations.
- (3) Develop and Monitor Implementation of Asset Backed Commercial Paper Issuer Disclosure Code of Conduct/Principles. Purpose: To encourage consistent, relevant and regular reporting to investors in the ABCP market. Status: complete.
- (4) Develop and Monitor Implementation of Term Securitisation Issuer Transparency & Disclosure Principles. Purpose: To encourage consistent, transparent information flow in Residential Mortgage Backed Securities, Commercial Mortgage Backed Securities, Collateral Debt Obligation, consumer Asset Backed Securities, insurance securitisation and other asset classes. Status: RMBS Issuer Transparency & Disclosure Principles complete. Other asset classes to follow.
- (5) **Open Access to Transaction Information.** Purpose: To facilitate access upfront and ongoing on EEA-listed public term transactions, via removal of password protection on issuer websites, or making information available from unrestricted sources. Status: complete (covered via Initiative 4 above).

- (6) **Develop Industry Data Portals**. Purpose: To allow central online access to prospectuses and investor reports at low/no cost. Status: ongoing In June 2008, two data providers launched such portals, providing open access to over 1,000 EEA-listed securitisation prospectuses and investor reports; additional providers are developing similar initiatives.
- (7) Centralise access to RMBS and CDO Issuer/Manager Directories on ESF Website. Purpose: To centralise online access to European originators, issuers, and managers of securitised products. Status: Complete, ongoing ESF website provides a regularly updated directory of all known EU RMBS issuer and CDO manager websites.
- (8) Improve Standardisation and Digitisation of Reporting Templates. Purpose: To develop standardised issuance and surveillance report formats so that comparable, more granular information is provided to each CRA and investors. Status: Complete for RMBS and CMBS (as part of initiative 4). CDOs to follow.
- (9) **Standardise Definitions.** Purpose: To develop standard core definitions for EU securitisation and map regional variations. . Status: in progress
- (10) **Develop Investor Credit Assessment and Valuation Principle.** Purpose: To ensure investors have sound processes to independently assess the credit of a transaction. and do not solely rely on ratings. Status: Complete for asset managers ("Asset Management Industry guidelines to Address Over-Reliance Upon Ratings" issued); outstanding for bank investors.

(iii) Other industry initiatives in the securitisation markets

In the US, ASF has launched Project RESTART in the middle of 2008 to develop detailed market standards for securitised products, including a proposed standardisation and expansion of existing issuer disclosure for RMBS, to enable investors more easily to compare loans and transactions across all issuers and analyse and evaluate RMBS transactions on the basis of the features and performance of the underlying mortgage loans. For further details on this initiative, see http://www.americansecuritization.com/story.aspx?id=2655

B. Industry initiatives relating to Credit Derivatives

Ongoing work to 'hardwire' the cash settlement mechanism into ISDA documentation. This mechanism has allowed successful cash settlement in fourteen credit events including, most recently, the Fannie Mae, Freddie Mac and Lehman Brothers credit events. 'Hardwiring', as referred to in the FSF report on the financial crisis, is designed to ensure operational clarity on this legally well established process. Until hardwiring is complete, the settlement process will continue to be activated as required, case by case. The hardwiring process will be concluded in March 2009.

The following table (which we analyse on page 7 above) shows DTCC Deriv/SERV statistics (all figures in US\$ billion) for:

(a) Default events (Single-name CDS)

	A. Gross turnover	B. Required payment	Ratio (B/A)
Ecuador	4.0	0.3	7.5%
FHMLC + FNMA +			
Tembec*	99.0	0.4	0.4%
Glitnir + Kaupthing +			
Landsbanki*	71.0	4.7	6.6%
Lehman Brothers	72.0	5.2	7.2%
Tribune	14.8	0.9	6.1%
AGGREGATE	260.8	11.5	4.4%
* Various CDS settled on sai	me day		

(b) CDS exposures

	A. Gross turnover	B. Maximum pay-out	Ratio (B/A)	
(i) CDS Market Top 1000				
10th February 2009	14,387	1,416	9.8%	
3rd February 2009	14,248	1,411	9.9%	
(ii) Indices				
10th February 2009	13,750	1,174	8.5%	
3rd February 2009	13,247	1,181	8.9%	

Continuing success, working with international regulators, in **addressing operational goals** faced by the industry, in particular with regard to timeliness of trade confirmation, electronic confirmation, finality around novation, the movement of collateral, and the use of trade compressions to reduce notional volumes outstanding (particularly for CDS).

Increased transparency, through the publication of data from the DTCC Trade Information Warehouse.

Progress, in cooperation with international regulators, towards use of a central counterparty (CCP) for clearing of credit default swaps: CDS on indices and single name CDS will be centrally cleared from early 2009. Large parts of the interest rate swaps market are already centrally cleared. Market participants are continuing to assist the efforts of central clearing service providers, through dialogue and feedback, on the technical challenges to be surmounted in establishing efficient, sound clearing houses.

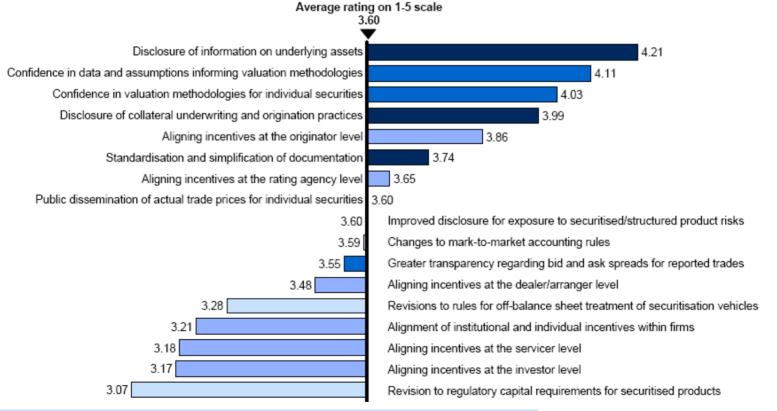
Priority Challenges to Restoring Confidence



Stakeholders view disclosure and valuation as most critical to restarting the market

Disclosure
Valuations/pricing
Incentives
Accounting/capital

Relative importance of factor to restoring confidence in the securitisation markets in the near-term Average relative rating received



SOURCE: SIFMA/ASF/ESF/AusSF Report: Restoring Confidence in the Securitisation Markets

SIFMA TRACE Buy-Side Survey Results

September 2008

Prepared by:



Mathew Greenwald & Associates 4201 Connecticut Avenue, NW Suite 620 Washington, DC 20008

Methodology

In order to gather information about member views of the effectiveness of TRACE, a total of 13 interviews were conducted with members of SIFMA's Asset Management Group. Information was gathered through a combination of telephone and online interviews conducted by both National Research, Greenwald & Associate's in-house telephone interviewing subsidiary, and by SIFMA staff members, who were able to follow-up with non-responders.

Because of the small number of members interviewed, medians and base sizes (n size) were used to conduct the analysis of the data. Base or "n" sizes represent the number of responses received for a particular question. Also, due to the small number of respondents and a significant amount of variance in the results, range, mean and standard deviation from the mean should be considered when interpreting the results.

Key Findings

There is some indication that TRACE is a "nice-to-have" instrument, even if it is not critical to operations. It appears members appreciate all sources of information, though relative to others, TRACE is not seen as very important. Furthermore, it seems that few members feel that TRACE has had a noticeable impact on their overall portfolios or various aspects of their investment-grade and below-investment-grade business. Key findings from this survey reveal that:

- At least half report that they access information from TRACE at least once a day for both their investment-grade and below-investment grade bonds;
- Moreover, six of 12 members feel that in introducing a TRACE-like system in Europe the benefits would outweigh the disadvantages. Two suggest that the disadvantages would outweigh the benefits, while the remainder say they are either uncertain or it would make no difference;
- However, TRACE's impact on members' total portfolios both under current conditions and under previously normal conditions is negligible;
- Dealer prices quoted either on the telephone or on bid-offer lists are seen as the
 most important source of information for conducting secondary market price
 discovery research for both investment-grade and below-investment-grade bonds;
 TRACE is clearly seen as less important;
- TRACE may have had a slightly negative impact on dealers' willingness or ability to commit capital or provide liquidity to the markets;
- Overall, seven of 13 respondents feel that TRACE has not affected dealer services, such as research dissemination, and it does not appear that TRACE has impacted the growth of other non-TRACE reportable corporate credit instruments.

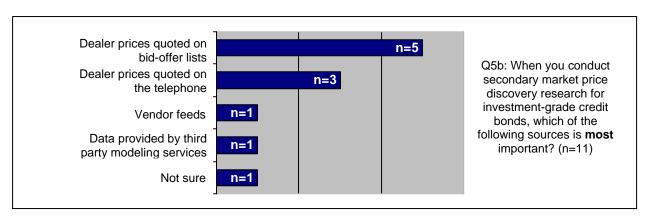
Research on Investment-Grade Bonds

Eight of the members surveyed indicate that they use TRACE to look at information about their investment-grade bonds at least once daily. In fact, six suggest they access this information multiple times per day. On the other hand, three report that they use TRACE monthly or less often.

Asked to rate the importance of six sources of information for secondary market price discovery, dealer prices that are quoted either over the telephone or on bid-offer lists receive the highest median and mean scores. This indicates that they are important sources used in secondary market price discovery research for investment-grade bonds. TRACE receives the lowest importance score, a median of 7.00 with a range of responses from 1 to 10.

Q5a: When you conduct secondary market price discovery research for <u>investment-grade credit bonds</u> , how important are the following sources? On a 1 (not at all important)						
to 10 (extremely important) scale				Std.	n	
	Median	Range	Mean	dev.	size	
Dealer prices quoted on the telephone	8.00	6-10	8.15	1.14	13	
Dealer prices quoted on bid-offer lists	8.00	7-10	8.08	.95	13	
Electronic trading systems	8.00	3-10	7.58	1.93	12	
Vendor feeds, like Bloomberg or Reuters	8.00	1-10	6.83	3.46	12	
Data provided by third party modeling	7.50	1-10	6.00	3.22	12	
services						
NASD – TRACE	7.00	1-10	6.46	2.85	13	

Similarly, five of 11 members cite dealer prices quoted on bid-offer lists as the most important of these sources. None suggest TRACE is most important.



With a median of 8.0 on a 1 (not at all important) to 10 (extremely important) scale, price discovery in advance of a trade rises to the top of a list of important reasons why members access price information from TRACE. This is also cited most often as the most important reason. Market color, with a median of 7.0, also rates fairly well as an important reason to use TRACE.

Q7a: Still thinking about investment-grade credit bonds, how important are the following reasons for why you access price information from TRACE? On a 1 (not at all important) to 10 (extremely important) scale Std. n Median Range Mean dev. size Price discovery in advance of trade 8.00 1-10 6.92 3.09 13 Market color 7.00 1-10 6.46 2.47 13 Portfolio valuation or market-to-market 6.00 1-10 5.82 3.12 11 Compliance or best execution review 12 5.00 1-10 5.33 2.90

With regard to investment-grade bonds under *current conditions*, the results suggest that most feel TRACE has had no impact on their ability to manage their portfolio in specified areas, such as frequent versus infrequent trades and small versus large trades. Likewise, with a median of 3.0 (indicating "no impact" or neutral on a 5-point scale), it seems TRACE has had no impact on members' total portfolios.

Q11a: Thinking again about investment-grade bonds, what effect has TRACE had on your ability to manage your portfolio in each of the following areas? On a 5-point scale where 1=extremely negative, 3=no impact, and 5=extremely positive						
		_		Std.	n	
	Median	Range	Mean	dev.	size	
Frequent trades under current conditions	3.00	2-5	3.27	.90	11	
Small trades, below \$1 million, under	3.00	2-5	3.27	1.01	11	
current conditions						
Large trades, above \$10 million, under	3.00	1-5	3.27	1.10	11	
current conditions						
Infrequent trades under current conditions	3.00	1-5	3.00	1.18	11	
Total portfolio under current conditions	3.00	1-5	2.91	1.04	11	

Asked about TRACE's impact on specific areas of members' investment-grade bond portfolios under *previously normal conditions*, there is a very slight indication that TRACE may have had a somewhat positive impact on infrequent trades, and on small and large trades. Still, the net impact on overall portfolios under *previously normal conditions* appears to be neutral.

Q11a: Thinking again about <u>investment-grade bonds</u> , what effect has TRACE had on your ability to manage your portfolio in each of the following areas? On a 5-point scale							
where 1=extremely negative, 3=no impact, and 5=extremely positive							
	Madian	D	NA	Std.	n		
	Median	Range	Mean	dev.	size		
Small trades, below \$1 million, under	4.00	2-5	3.55	1.04	11		
previously normal conditions							
Infrequent trades under previously normal	4.00	2-5	3.45	.93	11		
conditions							
Large trades, above \$10 million, under	4.00	2-5	3.45	1.13	11		
previously normal conditions							
Frequent trades under previously normal	3.00	2-5	3.27	1.01	11		
conditions		,					
Total portfolio under previously normal	3.00	1-5	3.18	1.25	11		
conditions							

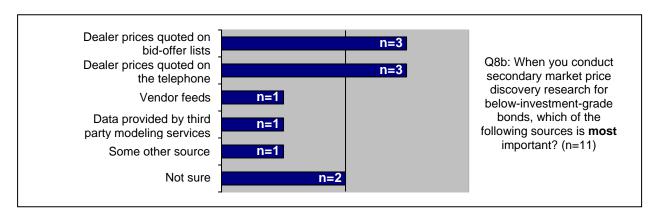
Research on Below-Investment-Grade Bonds

Roughly half of respondents indicate that they also look at information available from TRACE regarding their below-investment-grade bonds at least daily. Two, however, note that they view this information on TRACE less than once per month.

Varying somewhat from the viewpoints expressed regarding secondary price research for investment-grade bonds, TRACE receives the highest median importance score as a source for secondary market price research for below-investment-grade bonds. Although the median score is 9.0, the responses range from 1 to 10 on a scale where 1 means "not at all important" and 10 means "extremely important." In fact, dealer prices quoted both on the telephone and on bid-offer lists follow closely behind, and based on the means and standard deviations in addition to medians, may actually be equally, if not more important, than TRACE.

Q8a: When you conduct secondary market price discovery research for below-investment-grade credit bonds, how important are the following sources? On a 1 (not at						
all important) to 10 (extremely important) scale Std. n						
	Median	Range	Mean	dev.	size	
NASD – TRACE	9.00	1-10	7.11	3.48	9	
Dealer prices quoted on bid-offer lists	8.50	7-10	8.40	1.17	10	
Dealer prices quoted on the telephone	8.00	6-10	8.00	1.25	10	
Vendor feeds, like Bloomberg or Reuters	8.00	2-10	6.50	2.84	10	
Data provided by third party modeling	7.00	1-8	5.60	2.91	10	
services						
Electronic trading systems	4.50	2-9	5.13	2.85	8	

Despite its high median score, none mention TRACE as the most important source for secondary market price research for below-investment-grade bonds. Quoted dealer prices are seen as the most important source for such research. Three members each cite dealer prices quoted either over the telephone or on bid-offer lists as most important.



Market color and price discovery rate highest as important reasons why some members use TRACE to access information about their below-investment-grade bonds. Still, these two reasons receive relatively moderate median importance scores of 7.5 on a 1 to 10 scale. Six of 12 members say price discovery in advance of a trade is the single most important reason to use TRACE, while only one calls market color the most important.

Q10a: Again thinking about below-investment-grade credit bonds, how important are the following reasons for why you access price information from TRACE? On a 1 (not at all important) to 10 (extremely important) scale Std. n Median Range Mean dev. size Market color 7.50 1-10 6.63 2.72 Price discovery in advance of trade 7.50 1-10 6.50 3.66 8

6.00

5.00

3-8

1-10

5.57

5.00

2.23

3.16

7

7

It appears that under *current conditions*, the overall impact of TRACE on specific areas of members' below-investment-grade bond portfolios has been neutral. With a straight-line median of 3.0, the results suggest that TRACE has had no impact on small versus large trades, frequent versus infrequent trades, or on portfolios in total.

Compliance or best execution review

Portfolio valuation or market-to-market

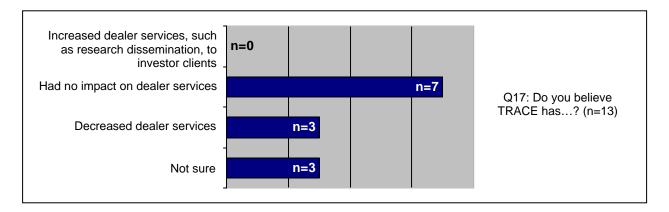
Q11b: Now thinking about <u>below-investment-grade bonds</u> , what effect has TRACE had on your ability to manage your portfolio in each of the following areas? On a 5-point scale where 1=extremely negative, 3=no impact, and 5=extremely positive						
				Std.	n	
	Median	Range	Mean	dev.	size	
Frequent trades under current conditions	3.00	2-4	3.25	.71	8	
Infrequent trades under current conditions	3.00	2-4	3.25	.71	8	
Small trades, below \$1 million, under	3.00	2-4	3.13	.64	8	
current conditions						
Large trades, above \$10 million, under	3.00	1-4	2.88	.99	8	
current conditions						
Total portfolio under current conditions	3.00	1-3	2.63	.74	8	

Similarly, the results suggest that TRACE has had a negligible impact on total portfolios under *previously normal conditions*. With median and mean scores consistently around 3.0 ("no impact" or neutral on 5-point scale), it appears TRACE yielded no differences in small versus large trades and frequent versus infrequent trades under *previously normal conditions*.

Q11b: Now thinking about <u>below-investment-grade bonds</u> , what effect has TRACE had on your ability to manage your portfolio in each of the following areas? On a 5-point scale where 1=extremely negative, 3=no impact, and 5=extremely positive						
				Std.	n	
	Median	Range	Mean	dev.	size	
Infrequent trades under previously normal conditions	3.50	3-4	3.50	.53	8	
Small trades, below \$1 million, under previously normal conditions	3.00	3-4	3.38	.52	8	
Frequent trades under previously normal conditions	3.00	2-4	3.13	.83	8	
Large trades, above \$10 million, under previously normal conditions	3.00	1-4	3.00	1.07	8	
Total portfolio under previously normal conditions	3.00	1-4	2.63	1.06	8	

Overall Impact of TRACE

Overall, seven of the 13 members surveyed feel that TRACE has had no impact on the amount of services offered by dealers to investor clients. In fact, three suggest that services, such as research dissemination, have decreased. Given this overall viewpoint, it is not surprising that TRACE does not appear to have impacted more targeted areas of members' business.



Under both current and previously normal conditions, the data indicates that TRACE has not had any affect on price volatility. The median and mean scores are consistently at or around the 3.0 mark ("no impact" or neutral on a 5-point scale).

Q12: Do you feel that TRACE has resulted in more or less price volatility? On a 5-point scale where 1=much less price volatility, 3=no impact, and 5=much greater price volatility						
				Std.	n	
	Median	Range	Mean	dev.	size	
Investment-grade bonds under current conditions	3.00	1-5	3.45	1.21	11	
Below-investment-grade bonds under	3.00	1-5	3.14	1.21	7	
current conditions						
Investment-grade bonds under previously	3.00	2-4	2.91	.70	11	
normal conditions						
Below-investment-grade bonds under previously normal conditions	3.00	2-4	2.86	.69	7	

Similarly, TRACE does not seem to have impacted bid and ask spreads under either current or previously normal conditions. With a median of 4.0, it may seem as though TRACE has made bid and ask spreads for investment-grade bonds under current conditions somewhat wider. However, taking into account the mean and standard deviation for this data point, it is safer to assume this item follows trend, and in actuality, TRACE has likely had no impact.

Q13: How has TRACE impacted bid and ask spreads for your? On a 5-point scale where 1=significantly tighter, 3=no impact, and 5=significantly wider						
				Std.	n	
	Median	Range	Mean	dev.	size	
Investment-grade bonds under current conditions	4.00	2-5	3.33	1.12	9	
Below-investment-grade bonds under current conditions	3.00	2-4	3.14	.90	7	
Below-investment-grade bonds under previously normal conditions	3.00	2-4	2.86	.90	7	
Investment-grade bonds under previously normal conditions	3.00	2-4	2.80	.79	10	

Likewise, the results suggest that TRACE has not affected the amount of time required to complete trades for investment-grade bonds or below-investment-grade bonds under either current or previously normal market conditions.

Q15: How has TRACE impacted the length of time required to complete a trade for						
your? On a 5-point scale where 1=greatly reduced, 3=no impact, and 5=greatly increased						
				Std.	n	
	Median	Range	Mean	dev.	size	
Investment-grade bonds under current conditions	3.50	2-5	3.50	1.00	12	
Investment-grade bonds under previously normal conditions	3.50	2-5	3.50	1.00	12	
Below-investment-grade bonds under current conditions	3.00	2-5	3.44	.88	9	
Below-investment-grade bonds under previously normal conditions	3.00	2-5	3.33	.87	9	

TRACE may have had a slight impact on dealers' willingness or ability to commit capital or provide liquidity to the markets. Under both current and previously normal conditions, it seems members believe that dealers are somewhat less willing to commit capital or provide liquidity for investment-grade and below-investment-grade bonds.

Q14: How has TRACE impacted dealers' willingness or ability to commit capital or

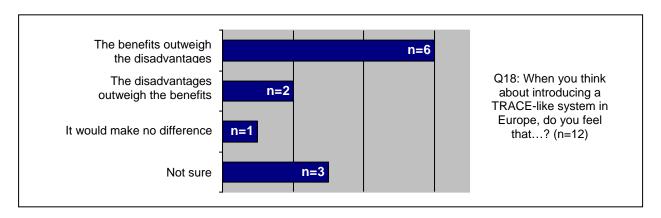
provide liquidity to the markets when it comes to your? On a 5-point scale where 1=much less willing, 3=no impact, and 5=much more willing						
	Median	Range	Mean	Std. dev.	n size	
Investment-grade bonds under previously normal conditions	2.50	1-4	2.42	.90	12	
Below-investment-grade bonds under previously normal conditions	2.00	1-4	2.33	1.00	9	
Investment-grade bonds under current conditions	2.00	1-3	2.00	.85	12	
Below-investment-grade bonds under current conditions	2.00	1-3	2.00	.87	9	

It does not appear that TRACE has impacted the growth of other non-TRACE reportable corporate credit instruments. For CDs and leveraged loans, the median score is 1.0 on a scale from 1 (no impact at all) to 10 (significant impact). With a score of 3.0, TRACE may have had a very slight affect on 144(a) issues; however, the mean and standard deviation indicate that this break in trend may be just a statistical coincidence.

Q16: To what degree do you feel TRACE may have impacted the growth of the following non-TRACE reportable corporate credit instruments? On a 1 (no impact at all) to 10 (significant impact) scale					
	Median	Range	Mean	Std. dev.	n size
144(a) issues	3.00	1-7	3.44	2.55	9
CDs	1.00	1-8	2.29	2.56	7
Leveraged loans	1.00	1-3	1.43	.79	7

Introducing TRACE in Europe

Despite indications that TRACE has not impacted specific areas of members' business, six out of twelve suggest that in introducing a TRACE-like system in Europe the benefits would outweigh the disadvantages. Just two feel the disadvantages would trump the benefits, while three say they are uncertain.



Corporate Bond Portfolio Information

At the beginning of the questionnaire, respondents were asked to provide specific information about their company's bond portfolios.

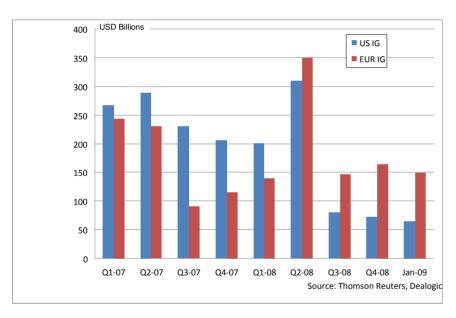
- Respondents report a median of \$132 billion in fixed income assets under management (n=10).
- A median of \$57.5 billion in investment-grade assets under management was reported by eight respondents.
- Members say their firm has a median of \$4 billion in below-investment-grade corporate bond assets under management (n=12).
- Four members report that the total dollar volume of annual fixed income trading at their firm is a median of \$550 billion.

- Respondents report their firm's total dollar volume of annual investment-grade trading at a median of \$23 billion (n=4).
- The total dollar volume of annual below-investment-grade trading is a median of \$27.5 billion (n=4).
- Members report a median of 500 investment-grade issues held at their firms (n=7), 40% of which are held long-term, meaning 5 years or longer (median; n=9).
- A median of 30 below-investment-grade issues are held by these firms (n=9), 25% are held for 5 years or longer (median; n=9).

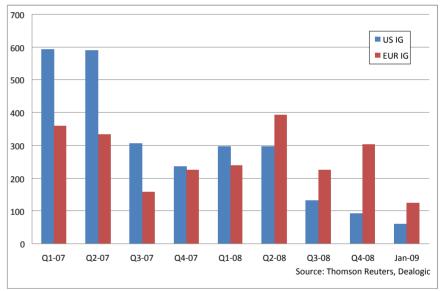
EU vs US Investment Grade Issuance 07-08



Issuance Volumes



Number of issues



SIFMA Summary of Recent Research on U.S. TRACE and its Effect on Corporate Bond Markets – 20 June, 2008

The introduction of the FINRA Transparency Reporting and Compliance Engine (TRACE) has spawned a good deal of research as TRACE was phased in. The objective of that research was to examine the effect of TRACE with respect to U.S. corporate bond market transparency and liquidity. In September 2006, as part of its response to a European Commission call for comments on the extension of MiFID price transparency provisions to non-equity markets, SIFMA evaluated the initial set of TRACE studies, raising questions about research methodology, data access and the analytical and policy implications of the research conclusions. In the last year, further academic studies have been produced on the impact of TRACE on U.S. corporate bond markets.

This paper is divided in 3 parts:

- 1. Analysis, critique and summary conclusions of recent TRACE studies.
- 2. Summary of issues raised on earlier TRACE studies (as developed in SIFMA's 2006 submission to the EU Commission).
- 3. Conclusions lessons from recent TRACE studies for today's price transparency debate

Recent TRACE Research

Four studies relating to TRACE have been released in the last year.

1. "Where did all the Information Go? Trade in the Corporate Bond Market", by Tavy Rouen and Xing Zhou, Rutgers Business School, Rutgers University Current Draft; April 2008

Research Finding Summary: The study concludes that there is evidence of bond market efficiency. While retail trades were found to display quick reactions to firm specific information, institutional trades demonstrated the shortest time horizons or quickest reaction to company news. Speed of adjustment tests indicate that corporate bond trades often fully incorporate all information in earnings surprises before significant stock reactions occur. The authors concluded that the corporate bond market serves an important venue for information-based trading, particularly when equity market liquidity is low. Interestingly, even BBB-rated investment grade bonds react swiftly to information, seemingly anticipating future downgrades.

<u>Summary analysis</u>: The study looked at institutional and retail investor responses to issuer specific events, using TRACE data in the research. The finding was that the response rate to events is quicker in the dominant institutional investor sector. Age, maturity, complexity and credit quality also affect trading reactions. TRACE was found to shorten the response time for retail investors. The authors concluded that fewer number of bond market transactions compared to the equity market is not a comment on inefficiency but that investors review relevant and material information and then typically act on that information in large block trades. The study covered the period from January 1, 2003 through December 31, 2006.

The researchers also concluded that the corporate bond market is not necessarily slower than the equity market in processing information but serves as an important venue for information based trading especially when stock market liquidity is low. In fact, bonds may incorporate information during periods of earnings "surprises" more quickly than the equity markets.

There are at least two valid concerns or criticisms of the research approach. Firstly, retail trades were defined as \$500,000 or less. That definition strikes us as too broad and, in fact, broader than the metric used by FIRNA of \$100,000 to define retail trades. It has been SIFMA's long held view that the \$100,000 definition has been an arbitrary retail trade definition and that it would be better to define retail based on the characteristics of the investor, whether in fact it is an individual or an institution conducting the trade. Based on the study's definition, retail trades represent 86% of the trades and 10% by volume. By contrast, the \$100,000 FINRA definition has encompassed slightly over half the volume and less than 5% of trading volume.

The second comment relates to the research time period which ended in 2006 when the corporate bond markets were nearing peak performance and benefiting from strong liquidity and ample investor demand. It would be useful to extend the research to the current period, the credit crunch period of diminished liquidity. Given the time frame, the results and conclusions are less relevant to the current part of the cycle or market environment

2. "Liquidity of Corporate Bonds", Jack Bao, Jun Pan and Jiang Wong, 22 March 2008

Research Summary Finding: Illiquidity in corporate bonds is found to be significant and more severe than implied in the "bid-ask spread bounce." The authors developed a new liquidity measure and compared it to bond characteristics. They spoke of greater variability of liquidity in market crises which was especially evident in the subprime crisis.

<u>Summary analysis</u>: The FINRA/TRACE studies generally used and recommended the bid-ask spread as the measure of liquidity. In the 2006 review of the TRACE research, SIFMA's articulated view was that spreads were but one liquidity measure and the issue of defining liquidity remained an open topic. This research found that the bid-ask spread may not be the optimal measure of liquidity.

This analysis uses TRACE data from April 2003 through the end of 2007, and the bonds in the data set were generally larger issues, investment grade and relatively actively traded. The data cover a sample of TRACE Phase I and Phase II bonds which were generally investment grade and the more liquid bonds. The bulk of the high yield and less liquid bonds did not become part of TRACE until Phase III. To be part of the research data set, a bond must have traded in at least 75 percent of the business days and have been TRACE eligible for at least a year. The average bond issuance size was \$700 million, the typical or representative bond was investment grade, and the average number of trades in a month was 174. Thus, the data analysis excluded a number of more illiquid and high-yield bonds.

This study concluded that there is limited understanding of corporate bond liquidity due in part to the lack of clarity on a definition of liquidity. Without a clear definition, it is difficult to reach broad definitive conclusions of what influences market efficiency. While bid-ask spreads have been widely used and are considered a direct measure, the authors found that bid-ask spreads do not fully capture many important liquidity characteristics such as market depth and resilience. The authors cite the advantage of using theoretical pricing models to directly measure the influence of liquidity on prices but such an approach runs the risk of mis-specification. The study develops a transitory or "negative serial correlation" price change liquidity measure which was found to be statistically significant.

The authors found that their measure captures the price impact of illiquidity "above and beyond the effect of a simple bid-ask spread bounce." Simply put, the measure was found to be related to the bid-ask spread measure but goes beyond information contained in quoted bid-ask spreads.

The study finds high levels of correlation between illiquidity and market conditions, especially during times of market crisis. That is, the market become less liquid as volatility rises during crises, specifically, at the time of the Ford and GM downgrade to "speculative grade." While liquidity was found to improve from 2003 through 2007, liquidity diminished during the latter part of 2007, or the onset of the credit crunch. The shift in the liquidity measure was much more dramatic in late 2007 with the subprime turmoil than at the time of the Ford-GM downgrades. Moreover, the liquidity reduction was found to be greater for large trades than small trades. Similar, liquidity was found to diminish more as the credit spread widens and when the equity and bond markets "underperform."

Generally, the authors finding of the general decrease in illiquidity since 2003 (i.e. during the "post-TRACE' period) is based on a data set comprised of relatively liquid bonds. Illiquidity was found to rise in times of market stress. In August of 2007 when the subprime crisis hit the market, the illiquidity measure jumped dramatically, nearly a four standard deviation event.

3. "Transparency and the Corporate Bond Market" Hendrik Bessembinder and William Maxwell, Journal of Economic Perspectives October 2007

Research Finding Summary: The authors interviewed a number of market participants representative of both dealers and investors and provided observations of TRACE from the market participant perspective. The authors concluded that it is unclear as to the appropriate level of bond market transparency. The observations included the comment that there is a TRACE trade-off between potentially lower trading execution costs and higher dealer costs, a disincentive for dealers to commit capital and maintain an inventory for customer trading and reduction in dealer research services to clients.

<u>Summary analysis</u>: The important contribution of this research was to interview and discuss the effect of TRACE and post-trade transparency with market participants. The authors define transparency as applied to securities markets is the amount and timeliness of information provided to the investing public about market conditions. Post-trade transparency refers to the dissemination of information such as price and volume for completed trades.

The authors cite research findings that post-trade transparency has lowered trading costs and increased the capacity to verify information by smaller investors and investment funds. The authors also note that trading execution costs are not the only measure of market quality and liquidity. The increase in transparency reduces willingness of dealers to hold inventory on an agency basis for customer trades. Transparency makes it easier to determine when a trader is holding a large inventory and forecast upcoming dealer trades to balance the portfolio. That information in turn leads to adverse price movements to the dealer, and dealers become less willing to hold inventory. The same observation was relevant for large positions held by institutional investors. Market participants commented that, pre-TRACE, a large block could be transacted in one trade as dealers held a sizable inventory. Now trades may have to be broken up and done through several dealers. Furthermore, trades now could be delayed in order to find

counterparties. Another comment cited in the research article was that liquidity was reduced as dealers hold fewer products and have to locate bonds to trade. As a related point, market participants commented that dealers were less willing to commit capital.¹

Market participants also reported a movement away from TRACE reported and regulated corporate bond trading business lines and into alternative less regulated asset classes such as corporate credit default swaps (CDS) and loans to generate positive "alpha." Similarly, the expansion of 144(a) bond issuance has emerged, perhaps as part of a strategy to reduce trade reporting. The interviews elicited an observation of more capital invested in CDS relative to cash corporate bonds, a reversal of earlier trends, and the emergence of synthetic corporate bonds (combining CDS and Treasuries) as a substitute for cash bonds.

A final observation in the article is that TRACE implementation has coincided with tighter bid-ask spreads². One effect has been for dealers to reduce costs, including reduction of research expenditures and services or, alternatively, retaining research for proprietary trading rather than distribution to customers.

The conclusion of the article is that it is worth considering whether the costs of TRACE may exceed its benefits³ and what is the appropriate level of transparency. Optimal bond (with fewer larger trades) transparency may be different than equity. For example, the TRACE trade-off is potentially lower costs weighed against more trading going private, reduced access to research services and expenditures on facilitating trading services for customers.

4. "Determinants of Corporate Bond Trading: A Comprehensive Analysis" by Edith Hotchkiss, Boston College and Gergana Jostova, George Washington University, June 21, 2007

Research Finding Summary: TRACE benefitted investors from the increased transparency, through substantial reductions in the bid-ask spreads that they pay to bond dealers to complete trades. Conversely, bond dealers have experienced reductions in employment and compensation, and dealers' trading activities have moved toward alternate securities, including syndicated bank loans and credit default swaps. The primary complaint against TRACE, which is heard both from dealer firms and from their customers (the bond traders at investment houses and insurance companies), is that trading is more difficult as dealers are reluctant to carry inventory and no longer share the results of their research. In essence, the cost of trading corporate bonds decreased, but so did the quality and quantity of the services formerly provided by bond dealers. The debate regarding optimal transparency of the corporate bond markets continues.

<u>Summary analysis</u>: The research involved a comprehensive study of 17,000 investment grade and high yield bonds over a 60 month period from 1995 to 1999, using insurance industry data from the National Association of Insurance Commissioners (NAIC) database. The authors identified the insurance industry as a significant corporate bond investor at 18,400 trades a day. The study defines liquidity as the ability to trade quickly and at a low price. The literature looks at three types of measurement: bid-ask spread, impact on large trades and trading volume. The

_

¹ The article cited SIFMA data that trading volume increased in 2006. It should be noted that TRACE trading volume collected by SIFMA indicated declining volumes in 2007-08 on a year-over-year basis.

² It should be noted that a similar reduction in bid-ask spreads was observed in Europe

³ Page 21

NAIC data only enabled measure of bid-ask spreads, although as cited earlier, there are valid arguments for alternative definitions, including trading volume. In addition to the NAIC data, Lehman data base is used for bond prices and FISD (Fixed Income Securities Database) data is used to identify bond characteristics and CRSP (Center for Research in Securities Prices, University of Chicago) for stock information and issuers with public equity outstanding. The bond universe is divided between investment grade and high-yield and regressions are run against the hypothesized determinants or variables affecting liquidity.

The study looked at potential determinants of liquidity, issue size (easier for dealers to manage a larger issue), age of bond, interest rate risk, credit risk, price volatility and issuers holding public vs. private equity., equity trading volume, market conditions and long term interest rates, imbedded options and industry of the issuer.

The results were evaluated for the probability of a bond trade, which was the working definition of liquidity in the study. Bond age and size of the bond issue were found to be the most significant factors affecting liquidity. The study also generally found that high-yield bonds (based on S&P rating) are less likely to trade. High-yield (investment-grade) bond trade probability increases (decreases) with a credit quality deterioration. Finally, there is significant autocorrelation (the probability of trading in the previous period) in the likelihood of a trade.

The results found that only 20% of the bonds trade in a month based on the insurance industry data. One of the key conclusions is that enhancing the understanding of the determinants of liquidity is critical to evaluating trading and reporting systems and designing market structures.

Summary of SIFMA 2006 Analysis of Earlier TRACE Research

The principal academic research studies at that time on the effect of TRACE on the U.S. corporate bond market were commissioned by FINRA's Bond Transaction Reporting Committee, and staff economist research at the U.S. SEC. Those studies were:

- "Corporate Bond Market Transparency and Transaction Costs" Amy K. Edwards, Lawrence E. Harris and Michael S. Piwowar, September 21, 2004
- "Transparency and Liquidity: A Controlled Experiment on Corporate Bonds", Michael Goldstein, Edith S. Hotchkiss and Erik R. Sirri, March 20, 2006, updated from November 1, 2004
- "High-Yield Active and Inactive Bonds and Transparency" by Michael Goldstein and Edith Hotchkiss, June 24, 2005
- "Additional Report on Active and Inactive High-Yield Bonds", by Michael Goldstein and Edith Hotchkiss September 8, 2005

SIFMA raised a number of concerns at the time regarding such studies, namely:

1. Methodologies Need to Be Refined Before the Research Can Be Used as a Guide to Policymaking

The studies applied quantitative statistical analysis to the TRACE data and drew conclusions based on the statistical results. They generally concluded that increased price dissemination (post-trade price transparency) would result in either lower transaction costs (tighter bid-ask spreads) or at worst, that spreads were unaffected and declined with transaction size. As

discussed below, there are significant methodological issues to be addressed. In addition, the studies were generally conducted during a time (2003-2005) of relatively benign and improving credit conditions, reduced volatility and credit spread tightening, or historically tight spreads from the higher credit risk conditions a few years earlier. Consequently, before these conclusions can be accepted as a basis for policy development, the methodologies should be further refined and the results confirmed. In certain cases, the findings appear to be contradictory or at least difficult to explain, thus requiring further investigation. Even if one accepts the statistical results, the studies still make unsubstantiated logical leaps to reach the conclusion that greater transparency leads to greater liquidity.

2. Most TRACE Studies Do Not Analyze in any Detail the Effect of Post-Trade Price Dissemination on Liquidity as Defined by Trading Volume

Most of the studies defined and measured liquidity by bid-ask spreads rather than the more direct measure, trade volume, and indeed spreads are the common measure of liquidity found in academic literature. In particular, the studies that focused on the high-yield sector measured "liquidity" by bid-ask spreads. This market is most vulnerable to reduced liquidity in a price transparency mandated environment, and thus a trade volume analysis in the TRACE price dissemination environment would have been quite useful and relevant.

Only one of the studies reviewed examined trade volume, and it found that volume declined during the TRACE price dissemination phase-in period studied. However, the study concluded that the volume differential could not be attributed to TRACE on a statistically significant basis. Furthermore, the study only looked at BBB rated bonds, a small portion of the corporate bond universe.

3. Weak Link Between Statistical Findings and Conclusions

The studies' conclusions in many cases do not necessarily follow from the statistical evidence presented and their assertions are open to question. For example, based on the statistical findings, the FINRA paper in 2005 suggests that dealers have a greater incentive, make a greater effort and offer better prices to dispose of less liquid bonds. The case can easily be made that dealers have less incentive to make markets and invest capital or put their capital at risk in less liquid bonds under a post-trade price dissemination regime.

4. Available Data Show Declining Trade Volume During TRACE Implementation Period

Contrary to the research studies' implication that liquidity would increase with increased post-trade transparency, there is evidence that suggests post-trade transparency may have resulted in a decline in liquidity as measured by transaction volumes during the TRACE implementation period. For example, the Federal Reserve Bank of New York's data on primary dealer corporate bond trading volume shows that trading volume, as a percentage of outstanding corporate bonds, has generally declined during the TRACE implementation period.⁵ MarketAxess' estimate of

⁵ The New York Fed's trade volume data series defines corporate bonds broadly to include non-agency or private label REMICs.

⁴ The one possible exception was the last of the FINRA studies that included the period of the Ford and GM downgrades to high yield status but, even in this case, the corporate bond markets rebounded following those episodes.

quarterly publicly disseminated TRACE trading volume also shows a decline over the TRACE implementation period from 2003-2005⁶. However, the MarketAxess data analysis is subject to the limitation that FINRA currently does not publicly disseminate the exact size of large trades, even on a delayed basis. Investment grade corporate trades above \$5 million are reported as "\$5 million +" and high-yield trades above \$1 million are reported as "\$1 million +".

5. Academic and Private Sector Researchers Do Not Have Access to Exact Trade Size Data Critical to Price Transparency and Liquidity Analysis; Recent FINRA Proposal Could Remedy the Problem; Numerous Policy Benefits to Wide Availability of TRACE Trade Size Data

To date, only FINRA and SEC sponsored research have had access to all information reported to TRACE, including exact trade size. Such information has not been available for academic and private sector research. The FINRA has requested comments, due in August 2006, on a proposal to provide public access to TRACE data that was not previously disseminated or otherwise publicly available, including the exact size of trades (e.g., investment grade trades above the \$5 million and high-yield trades above \$1 million thresholds). SIFMA supports dissemination of such information on a delayed basis. Unfortunately, the FINRA proposal is still at the SEC awaiting approval.

FINRA's release of the full data size would have a number of public benefits:

- It would enable objective third-party review, analysis and interpretation of the TRACE data for policy development.
- It would allow confirmation of the FINRA/SEC research results and the investigation of methodological issues, some of which were identified by the authors themselves. Most of the studies focused on segments of the market but not the entire TRACE data set.
- It would allow observers to investigate the generally asserted but unproven link between transparency and liquidity.
- It would nullify the need to make assumptions about trading activity, especially trade size, an inadequate basis for analysis and policy making.
- A number of the studies have focused on the high-yield sector. There are other relevant and necessary market segments with important policy implications, the most obvious being illiquid issues, whether investment grade or high yield.
- The U.S. TRACE experience is a valuable source of information.

Conclusion: Lessons from recent TRACE studies for today's price transparency debate

SIFMA's general conclusions in 2006 still hold today, regarding in particular:

- the value of providing broader access to TRACE data for academic and private sector research and confirmation of data analysis,
- the potential and observed adverse effect on liquidity of immediate U.S. TRACE posttrade price dissemination on credit markets, in particular infrequently traded, high-yield and distressed corporate bonds; and
- the importance of resolving methodological issues around the definition and measurement of market liquidity.

-

⁶ MarketAxess, A Primer on CDS Electronic Trading, January 11, 2006, Page 8.

The recent TRACE studies throw a number of important lights into today's debate on bond market post-trade price transparency, in particular:

- Bid-ask spreads and execution costs are not the only measure of liquidity, as they do not fully capture many important liquidity characteristics such as market depth and resilience.
- Market participants on both sides (dealers and institutional investors), who for the first time were consulted on any TRACE study, complained that TRACE had made trading more difficult whilst b/o spreads and cost of trading decreased, so did dealers' ability to commit capital (ie to provide liquidity, in particular for large trades) and to execute quickly, and so did the quality and quantity of services formerly provided by dealers to their clients (eg research).
- The question is being raised as to whether the costs of TRACE may exceed its benefits.
- Enhancing the understanding of the determinants of liquidity is critical to evaluating trading and reporting systems and designing market structures.

Main Findings from the Fixed Income E-Trading Survey

(Full presentation available at: http://www.sifma.org/research/surveys/pdf/SIFMA-FI-buysidesurvey09.pdf)

Overall Trading Volumes

- E-trading volumes in fixed income decreased since the crisis set in: this is the first time such decrease in electronic trading is observed, but growth is expected in 2009
- Over half of buy-side trade more than 40% of their volumes electronically (60% last year); Strong decline in numbers of those trading more than 85% of their volumes electronically

Trading by Products

- Top 3 products traded electronically
 - o Tickets: Futures (83%); EU Govt bonds (72%); US Treasuries (55%)
 - o Volumes: Futures (85%); US Treasuries & EU Govt Bonds (38%)
- o Bottom 3 products
 - o Tickets: CDS (0%); Interest rate Swaps (11%); ABS (16%)
 - Volume: CDS (0%); ABS (3%); IRS (7%)
- Anticipated highest rate of growth for 09
 - o Tickets: ABS (to 25%): IRS (to 16%); Repo (to 46%);
 - Volume: ABS (to 6%); ECP (to 17%); IRS (to 11%)

Buy-Side Preferred Method of Execution by products in 2009 (2008 % in brackets)

 As shown by the table below, the severe market liquidity contraction is causing a move away from the traditionally preferred more transparent openly negotiated RFQ model of execution, towards greater use of single dealer platforms and multi-dealer inventory where greater price certainty can be achieved

	Single dealer streaming	Multi Dealer Inventory	Multi-Dealer Request for Quote	Exchange
EU Govt bonds	12% (2.4%)	40% (9.5%)	40% (78.6%)	8% (9.5%)
Sov/Agency/Supra /Covered	9.1% (3%)	45.59% (22%)	45.5% (67%)	0% (8%)
Credit: High Yield	15.6% (7.9%)	42.2% (34.9%)	42.2% (50.8%)	0% (6.3%)
Credit: Inv Grade	12.5% (5.8%)	42.5% (33%)	42.5% (55.3%)	2.5% (5.8%)
Emerging Market	14.3% (5.9%)	42.9% (31.4%)	42.9% (52.9%)	0% (9.8%)
Repo	35.7% (9.3%)	28.6% (16.3%)	28.6% (58.1%)	7.1% (16.3%)
IRS	50% (15%)	21.4% (15%)	21.4% (58.3%)	7.1% (11.7%)
CDS	15% (9.6%)	30% (13.5%)	30% (57.7%)	25% (19.2%)
ABS	37.5% (11.1%)	31.3 (40%)	31.3% (-40%)	0% (8.9%)
ECP	31.3% (11.9%)	31.3% (38.1%)	31.3% (40.5%)	6.3% (9.5%)
Futures	19.5% (22.8%)	2.4% (2.2%)	2.4% (10.9%)	75.6% (64.1%)

Reasons for Choosing to Trade Electronically

- Best Execution and Price Transparency main factors for both investors (45% & 26% respectively) and sell-side (28% & 38% respectively)
- Ticket Size becomes a more important factor for the investors in 2008

Reasons for Choosing an Electronic Platform

- Depth of liquidity the most important factor for both buy-side (37%) and sell-side (39%)
- Second most important factor for buy-side is speed of execution (23%), and for sell-side range of products (21%)

Reasons for Buy-Side to Choose a Dealer - by product

- o Government and corporate bonds: Pricing Consistency is most important factor
- Derivatives and structured products: time to price and pricing consistency 2 most and equally important factors

Quality of Price Discovery since the crisis according to the buy-side – by product

- Neutral impact in government bonds and derivatives products
- o Deteriorated in corporate bonds and structured products

Market agrees on Duration of Market Volatility

- o Big shift by both buy and sell-side over 80% foresee long run of volatility
- o Last year there was an equal split believing that it was either temporary or prolonged

Secondary market trading in debt securities in the EU

Total number of bonds

The universe of bonds, including government issues, contained in the Xtrakter database as at January 30, 2009 was as follows:

Bond type	International	Domestic	Total
Straight issues	154,830	27,313	182,143
FRNs	121,497	15,420	136,917
Convertible	2,155	1,309	3,464
Total	278,482	44,042	322,524

Number of Reporting Dealers (Market Makers)

Members of the ICMA Council of Reporting Dealers elect to report their indicative bid/offered quotations on those international securities where they are prepared to deal with other members of the Council. As at January 28, 2009 CRD members contributed quotations on a total of 8,648 issues (consisting of 7,076 Straights, 1,401 FRNs and 171 Convertibles) as follows:

Number of dealers per issue	Number of issues
one	2,477
2-4	3,927
5-7	1,991
8 +	253

Number of trades per day

On January 21, 2009, which appeared to be a fairly typical day, a total of 6,125 bonds (using single counting and excluding all repos) were traded generating a total of 31,720 trades. Further analysis produced the following results:

Number of trades	Number of issues
one	2,099
2-3	2,130
4-9	1,255
10-49	580
50-99	48
100-199	7
200-299	2
300-499	1
500 +	3

Dispersion of trades by size

Again this analysis was made on the trade data of January 21, 2009 and split into the three major currencies together with the aggregate of the remaining currencies. EUR, USD and GBP reflect the denominated currency values whereas all the trade sizes for the other currency sectors were translated into EUR at current exchange rates.

Trade size	EUR	USD	GBP	Other
5m +	2,537	1,433	472	395
2-4.999m	1,718	1,263	285	330
1-1.999m	1,773	1,389	333	227
0.5-0.999m	1,514	662	308	265
0.25-0.499m	1,460	670	387	268
0.1-0.249m	2,755	1,399	582	304
0.05-0.099m	2,122	508	426	270
Below 0.05m	2,957	857	1,080	771
Total	16,836	8,181	3,873	2,830
				_
Average trade size	3,161,600	3,517,894	1,962,042	3,040,982
Median trade size	300,000	900,000	190,000	284,188

Analysis by number of trades with percentages in brackets.

2,957 (17.6%)	<	EUR 50k	<	13,879	(82.4%)
857 (10.5%)	<	USD 50k	<	7,324	(89.5%)
1,080 (27.9%)	<	GBP 50k	<	2,793	(72.1%)

Bond trades in 30-day period

During the 30-day online period from December 23, 2008 to February 23, 2009 a total of 26,323 separate bond issues were traded, which total may be classified as follows:

Currency	Number of issues
USD	9,012
EUR	8,599
JPY	2,699
GBP	2,046
CHF	637
AUD	583
HKD	562
ZAR	412
CAD	324
NZD	179
SEK	139
TRY	138
Legacy	56
All other	937