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ECONOMIC WATCH

Regulatory rumble over derivatives

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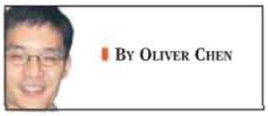

BY OLIVER CHEN

THE fragility of the global financial system has been shown up by the current crisis. Regulators around the world have been scrambling to change regulatory frameworks so as to avoid similar crises in the future. The question arises: Are the proposed changes sufficient or do they go too far?

In March, US Treasury Secretary Tim Geithner introduced his proposals for regulatory reform, focusing particularly on the containment of system-wide, or systemic, risks. Part of the reforms he suggested included an outline for regulating the over-the-counter (OTC) derivatives market. Last month, Mr Geithner expanded on his proposals.

A financial derivative is any contract that specifies future cash flows between the counterparties to the contract. The size and direction of the cash flows can be dependent on asset prices or exchange rates, a company's default, or even the losses caused by hurricanes that hit Florida in a particular month. Derivatives are used for hedging or speculation by both financial and non-financial entities.

For example, a farmer may use derivatives to guarantee a certain price for his crops, or an airline may use derivatives to ensure the price it pays for any future purchase of jet fuel is not above a certain level. Derivatives, in this fashion, can perform a vital function by reducing risks.

However, one possible risk that derivatives can create is if counterparty A, owing an amount to counterparty B, has to declare bankruptcy because it cannot afford to pay that amount. Since B can recover from A only a fraction of the value of the derivative or nothing at all, B would have to write down or even write off the value of the derivative.

A systemic risk can occur if counterparty A owed large amounts to many counterparties. This was the situation confronting the United States government when AIG was at risk of defaulting. It had sold credit protection contracts on many firms in the form of credit default swaps.

When the recent credit crunch occurred, the default of Lehman Brothers and the worsening credit quality of other firms eroded AIG's capital so that it faced imminent default. Had it defaulted, all of its counterparties would have lost their credit protection and faced significant write-downs.

There are different ways of mitigating counterparty risk in a derivatives trade. Very common derivatives like futures, call and put options are typically traded on an organised exchange. Exchange participants can post prices they are willing to buy or sell the derivative at, and the transacted prices are posted. The exchange also ensures that all participants have sufficient margin.

Despite this, if an exchange participant does default, then the exchange would take over the defaulting participant's positions. Thus, derivative contracts are always honoured on an exchange and participants are indifferent as to who the counterparties are in the contracts.

By contrast, OTC derivatives are negotiated between two counterparties. There is no requirement for transacted prices to be posted or even for each trade to be reported. The counterparties are each responsible for ensuring that the other party will be able to honour the terms of the derivative.

Between exchange-traded derivatives and OTC derivatives there is trading through a clearing house. Here, two parties negotiate a contract, but then enter the contract with a clearing house. There need not be price transparency, but the two parties have no exposure to each other, only to the clearing house. The clearing house has no net exposure and ensures that all counterparties have sufficient collateral.

Up till last year, there was an exponential growth in the OTC derivatives market. Bank for International Settlements data show that in December last year, 90 per cent of all derivatives by notional value were transacted over the counter. The loose regulation of these derivatives allowed some financial institutions to hold outsized positions. When the financial crisis occurred, some of these positions quickly lost value.

In order to avoid similar situations in the future, Mr Geithner's reform proposals include tighter regulation of the OTC derivatives market:

One, all standardised OTC derivatives would be required to be cleared through regulated central counterparties (CCP).

Two, trading in customised derivatives not cleared by a CCP must be reported to a regulated trade repository.

And three, all firms that take large positions will be closely regulated, especially in terms of capital requirements and reporting requirements.

The CCP will act like a clearing house and impose margin requirements and other risk controls. While the Geithner proposal does not offer a concrete definition of "standardised derivative", there is a clause that disallows the customisation of an otherwise standard derivative for the sole purpose of avoiding a CCP. In effect, what precisely is a "standardised derivative" would be determined in the same way a US supreme court judge once said he would know what constitutes pornography: "I know it when I see it."

Trades in customised derivatives would be required to be reported to a trade repository, and the trade repository would be required to make available information concerning individual counterparties to federal regulators. To maintain anonymity and avoid revealing trading strategies, only aggregate data on open positions and trading volume will be made public.

Some market observers would have preferred if Mr Geithner had required all derivatives to be traded on exchanges. However, exchanges would not be able to list all the derivatives that market participants would want. Derivatives traded on an exchange require some degree of standardisation for obvious reasons. A standardised product without a broad appeal will not generate a sufficient number of trades to create a quality price.

As an example of when exchange-listed derivatives would not be sufficient, suppose an exporter wishing to avoid foreign exchange risk on a receivable enters a currency forward. If currency forwards are exchange traded, then maturities would likely be available only at monthly frequencies. If the nearest maturity date of the forward does not match the date of the receivable, then the exporter would be exposed to foreign exchange risk in the interim.

In this situation, it would make more sense for the exporter to find a specific counterparty willing to enter into the other side of the forward contract and then clear the contract through a CCP.

Also there are some highly specialised derivatives. For example, a manufacturer who wishes to hedge its power consumption would enter an electricity derivative. Since electricity cannot be transported over vast distances, any electricity derivative would be specific to a region. A CCP would not be able to handle this degree of specialisation.

Even if it were possible to shift all derivative trades to an exchange, this would just shift the credit risk control function to the exchange. Additionally, it may not always be desirable to eliminate counterparty risk from a derivative transaction. An entity may be willing to accept a certain amount of counterparty risk in order to make a transaction possible. For example, this might occur if one party is not able to post collateral, but the other party deems that the risk is acceptable.

To contain systemic risk, the proposed reporting requirements should be sufficient for the federal regulator to gather the needed information. The difficulty resides in being able to process and make sense of all that information.

Mr Geithner's proposals attempt to strike a balance between flexibility and stability. A flexible system would allow market participants to efficiently hedge their risks. But a regulatory and oversight framework must be in place to monitor any market abuse and maintain stability. It is clear that the existing financial system is skewed too far in favour of flexibility and lacks a regulatory framework to ensure stability.

The proposals are a good preliminary step. What remains to be seen is whether they would be sufficient to allow regulators to monitor a large, complex financial system, and effectively police any abuse.

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