OPINION

Why Toxic Assets Are So Hard to Clean Up

By Kenneth E. Scott And John B. Taylor

espite trillions of dollars of new government programs, one of the original causes of the financial crisis—the toxic assets on bank balance sheets—still persists and remains a serious impediment to economic recovery. Why are these toxic assets so difficult to deal with? We believe their sheer complexity is the core problem and that only increased transparency will unleash the market mechanisms needed to clean them up.

The bulk of toxic assets are based on residential mortgage-backed securities (RMBS), in which thousands of mortgages were gathered into mortgage pools. The returns on these

Securitization was maddeningly complex.

Mandated transparency is the only solution.

pools were then sliced into a hierarchy of "tranches" that were sold to investors as separate classes of securities. The most senior tranches, rated AAA, received the lowest returns, and then they went down the line to lower ratings and finally to the unrated "equity" tranches at the bottom.

But the process didn't stop there. Some of the tranches from one mortgage pool were combined with tranches from other mortgage pools, resulting in Collateralized Mortgage Obligations (CMO). Other tranches were combined with tranches from completely different types of pools, based on commercial mortgages, auto loans, student loans, credit card receivables, small business loans, and even corporate loans that had been combined into Collateralized Loan Obligations (CLO). The result was a

highly heterogeneous mixture of debt securities called Collateralized Debt Obligations (CDO). The tranches of the CDOs could then be combined with other CDOs, resulting in CDO².

Each time these tranches were mixed together with other tranches in a new pool. the securities became more complex. Assume a hypothetical CDO² held 100 CLOs, each holding 250 corporate loansthen we would need information on 25,000 underlying loans to determine the value of the security. But assume the CDO² held 100 CDOs each holding 100 RMBS comprising a mere 2.000 mortgages-the number now rises to 20 million!

Complexity is not the only problem. Many of the underlying morfgages were highly risky, involving little or no down payments and initial rates so low they could never amortize the loan. About 80% of the \$2.5 trillion subprime mortgages made since 2000 went into securitization pools. When the housing bubble burst and house prices started declining, borrowers began to default, the lower tranches were hit with losses, and higher tranches became more risky and declined in value.

risky and declined in value.

To better understand the magnitude of the problem and to find solutions, we examined the details of several CDOs using data obtained from SecondMarket, a firm specializing in illiquid assets. One example is a \$1 billion CDO² created by a large bank in 2005. It had 173 investments in tranches issued by other pools: 130 CDOs, and also 43 CLOs each composed of hundreds of corporate loans. It issued \$975 million of four AAA tranches, and three subordinate tranches of \$55 million. The AAA

With so much complexity, and uncertainty about future performance, it is not surprising that the securities are difficult to price and that trading

dried up. Without market prices, valuation on the books of banks is suspect and counterparties are reluctant to deal with each other.

The policy response to this problem has been circuitous. The Federal Reserve originally saw the problem as a lack of liquidity in the banking system, and beginning in late 2007 flooded the market with liquidity through new lending facilities. It had very limited success, as banks were still disinclined to buy or trade such securities or take them as collateral. Credit spreads remained

higher than normal. In

September 2008 credit spreads skyrocketed and credit markets froze. By then it was clear that the problem was not liquidity, but rather the insolvency risks of counterparties with large holdings of toxic assets on their books.

The federal government then decided to buy the toxic assets. The Troubled Asset Relief Program (TARP) was enacted in October 2008 with \$700 billion in funding. But that was not how the TARP funds were used. The Treasury concluded that the valuation problem seemed insurmountable, so it attacked the risk issue by bolstering bank capital, buying preferred stock.

But those toxic assets are still there. The latest disposal scheme is the Public-Private Investment Program (PPIP). The concept is that private asset managers would create investment funds of half private and half Treasury (TARP) capital, which would bid on packages of toxic assets that banks offered for sale. The responsibility for valuation is thus shifted to the private sector. But the

pricing difficulty remains and this program too may amount to little.

Monday, July 20, 2009

The fundamental problem has remained untouched: insufficient information to permit estimated prices that both buyers and sellers find credible. Why is the information so hard to obtain? While the original MBS pools were often Securities and Exchange Commission (SEC) registered public offerings with considerable detail. CDOs were sold in private placements with confidentiality agreements. Moreover, the nature of the securitization process has made it extremely difficult to determine and follow losses and increasing risk from one tranche and pool to another, and to reach the information about the original borrowers that is needed to estimate future cash flows and price.

his account makes it clear why transparency is so important. To deal with the problem, issuers of asset-backed securities should provide extensive detail in a uniform format about the composition of the original pools and their subsequent structure and performance, whether they were sold as SEC-registered offerings or private placements. By creating a centralized database with this information, the pricing process for the toxic assets becomes possible. Making such a database a reality will restart private securitization markets and will do more for the recovery of the economy than yet another redesign of administrative agency structures. If issuers are not forthcoming, then they should be required to file the information publicly with the SEC.

Mr. Scott is a professor of securities and corporate law at Stanford University and a research fellow at the Hoover Institution. Mr. Taylor, an economics professor at Stanford and senior fellow at the Hoover Institution, is the author of "Getting Off Track: How Government Actions and Interventions Caused, Prolonged and Worsened the Financial Crisis" (Hoover Press, 2009).



tranches were bought by banks and

the subordinate tranches mostly by

this CDO2 were in tranches from an-

other billion-dollar CDO-created by

another bank earlier in 2005-which

tranches and 40 CDOs. Two of these

155 MBS tranches were from a \$1 bil-

lion RMBS pool created in 2004 by a

large investment bank, composed of

almost 7.000 mortgage loans (90%

subprime). That RMBS issued \$865

million of AAA notes, about half of

which were purchased by Fannie Mae

and Freddie Mac and the rest by a va-

riety of banks, insurance companies.

pension funds and money managers.

About 1.800 of the 7.000 mortgages

delinquency rate of about 20%.

still remain in the pool, with a current

was composed mainly of 155 MBS

Two of the 173 investments held by

hedge funds.