



Economic Policy Program

Housing Commission

Reducing Taxpayer Exposure: Sharing Credit Risk with the Private Sector

In a housing finance system that includes a government guarantee, private capital that stands in the “first loss” position plays an important role in reducing the risk of taxpayer losses. “First loss” means the private sector stands ahead of the government in guaranteeing the timely payment of principal and interest on mortgage-backed securities (MBS) when borrowers default. On top of providing an important buffer, the presence of private capital brings to the table a third party that is motivated to ensure the loans backing the MBS are properly underwritten, originated, and serviced to minimize losses.

The buffer only works if the capital is there when it is needed, and the additional layer of oversight only works if the investors view their capital as truly being at risk. Therefore, the type of capital structure used and its sufficiency to cover losses matters. Constructing an investment that attracts private capital may impact the cost to borrowers, the underwriting standards that are used, the types of products that are offered, and the extent to which real-estate risk is scattered across financial markets. In addition, some instruments are better equipped than others to support the mortgage market during economic and housing downturns.

Not All Private Capital Is Alike

Risk-sharing with private investors can take a number of different forms—each with its own set of implications. The most common structures are:

- 1) **Insurance** provided by an insurance company;
- 2) **Credit-linked notes**, a type of insurance provided through the capital markets; and
- 3) **“Senior subordinate” securities**, in which payments to some of the investors have priority, while other investors are the first to absorb any shortfalls resulting from borrower defaults.



Insurance Provided by an Insurance Company

Insurance has been a part of the housing finance system for a long time. When applied at the loan level, insurance can cover losses on a loan-by-loan basis up to some limit or detachment point. Fannie Mae and Freddie Mac, for example, require borrowers to obtain private mortgage insurance when their mortgage loan exceeds 80 percent of the value of the property. In the event of a default, insurance covers losses up to as much as 35 percent of the loan amount.

Insurance can also be used at the MBS or bond level. In this case, coverage is determined on a pool basis and is not limited on a loan-by-loan basis. Bond-level insurance might be capped so that losses that exceed a specified threshold would then be left to a government guarantee to cover. Alternatively, if there is no cap, the government guarantee would only be triggered by the economic failure of the provider of the insurance.

Broad diversification allows for better pricing of risk and the issuance of new insurance even during economic downturns, when other sources of capital may dry up.

As a source of risk-bearing private capital, insurance companies have a number of advantages:

- **Insurance companies are well positioned to diversify their risk** by covering mortgages originated in different parts of the country and across multiple time periods. Broad diversification allows for better pricing of risk and the issuance of new insurance even during economic downturns, when other sources of capital may dry up.
- **Insurance regulators can establish net worth and reserve requirements as well as pricing and product mix.**¹ Moreover, insurance regulators can establish uniform pricing across geographies and broad segments of the population, helping to ensure a broad-based mortgage market.
- **Standardized insurance policies are compatible with the “to-be-announced,” or TBA, market,** which relies on standard documents and processes to attract investors and create a robust market for trading MBS.

On the other hand:

- **The protection provided by insurance companies may be undermined if they fail to set aside sufficient capital or reserves to cover all claims,** including failure to fulfill capital or reserve requirements established by the government entity administering the guarantee.
- **Investors may be vulnerable to an unexpected rescission of coverage based on technicalities that allow the company to deny claims.** While insurance companies are, and should be, motivated to scrutinize claims carefully, the disputes regarding coverage coming out of the subprime crisis have left all parties seeking to further clarify the bases for rescission.

Credit-Linked Notes

Credit-linked notes (CLNs) are a form of insurance provided through the capital markets. The amount raised from investors depends on the level of protection desired. If the pool of mortgages is worth \$100 million, for example, and the level of protection desired is 5 percent, then \$5 million will be raised through the sale of CLNs. This capital is then held in reserve and either used to cover losses or returned to investors upon maturity of the CLN. As a result, in the event of a default, payment is not dependent on reserves built up over time from premiums or regulatory supervision of net worth, as would be the case with an insurance company.

The terms under which the investors in the notes receive their principal back are determined in advance and documented in the offering statement for the CLN. Prior to the maturity of the CLN security, the insured entity makes regular payments to the investors, much as it would pay premiums to an insurance company. The premiums required by investors depend on the likelihood that the capital they invest will be paid out to cover losses and not returned to them.

The trigger for paying the insured party out of the CLN investors' capital is determined by the performance of a “reference pool.” The reference pool usually consists of the actual mortgages that are in the MBS or those that are

1. While insurance companies are subject to state regulation, the government entity offering the guarantee will be able to establish its own conditions before qualifying an insurance company as an acceptable provider of first-loss protection.

in a broader group of MBS that contain similar types of mortgages (e.g., all the securities that are issued by Fannie Mae and/or Freddie Mac during a certain period). In the event of losses in the reference pool, payments are made to cover any claims incurred, and investors in the CLNs lose part or all of their principal.

When standing ahead of a government guarantee, the level of protection CLNs provide to taxpayers depends on whether the criteria for making a payment is easily measurable (e.g., payments made when loans default, assuming losses equal a predetermined percentage of the loan value) and whether the payments correlate with shortfalls in payments by borrowers.

As a source of risk-bearing private capital, CLNs offer the following advantages:

- **Capital is raised up-front**, as noted above, and so it is available immediately to help cover any losses that may occur.
- **Investors in CLNs may diversify their risk** by buying CLNs with reference pools that have varying risk characteristics or that cover different periods of time.
- **CLNs could also be used by insurance companies to lay off some of their risk**, in addition to being used directly to cover losses on MBS.

On the other hand:

- **The amount of the protection provided is limited to the amount of capital raised in the sale of the CLN.**
- **Absent investor interest, the insurance provided by CLNs cannot be obtained**, and new MBS that require such insurance cannot be issued. In extreme circumstances, this could mean that the government would have to accept more—if not full—credit risk to allow the issuance of new MBS.
- **Without standardization, CLNs may be incompatible with the TBA market.** Differences among CLNs in the requirements they place on servicers or the types of loans that can be pooled in MBS could fragment the market. In order for the use of CLNs to be compatible with a robust TBA market, they need to be standardized—that is, abide by standard documents and processes. Such standardization could be specified by the government entity offering the guarantee.

Senior-Subordinate Securities

Senior-subordinate, or “A/B,” securities, in which the payments from borrowers go first to investors in the senior tranches, can also be a source of risk-bearing private capital. Any shortfall resulting from borrower defaults falls first on investors in the subordinate tranches. With this structure, the government guarantee only applies to the senior tranches.

This structure has the advantage of:

- **The government is protected from losses up until all of the value in the subordinate tranches has been wiped out.**
- **Investors can diversify their risk by buying the subordinate tranches of multiple MBS.**

On the other hand:

CLNs could also be used by insurance companies to lay off some of their risk, in addition to being used directly to cover losses on MBS.

- **Private investors may be reluctant to take on the risk inherent in these subordinate tranches and so prevent the use of this structure for new MBS.**
- **Without a government guarantee, it may not be possible to have a robust market for trading the subordinate tranches** and in particular for these securities to be traded in advance of their issuance. Forward trading through the TBA market is what allows lenders to price rate locks in advance of the closing of all the loans in the MBS.
- **Potential for limited availability of mortgages in times of economic stress** if no investors are willing to take on the credit risk inherent in the subordinate pieces at a reasonable price or at all.

Risk-Sharing: Other Ways that Private Capital May Impact the Price and Availability of Mortgages

Risk-sharing requires satisfying the needs of private investors whose concerns and priorities may not align with the desire to serve a broad range of borrowers. The inclusion of risk-sharing can increase the cost to borrowers, tighten underwriting standards, and increase volatility in the price and availability of mortgages, as well as scatter risk across capital markets.

Potential Investor Impact on the Cost to Borrowers

- **Compensating Investors for Taking Risk:** Investors require compensation for taking the risk of losses if borrowers fail to pay their mortgages. This compensation, whether in

Financial system regulators will need to monitor risks carefully and take early action to guard against systemic risks/contagion that can undermine the financial system.

the form of insurance premiums or higher costs of funds, will be passed on to borrowers in the form of higher mortgage rates. The more investors are able to quantify the risk and diversify their risk across geographies and time periods, the less compensation they will require.

Offsetting increases in investor compensation will be potential reductions in the premium that the government charges for its guarantee as a result of having less exposure to loss. Unless the offset matches the increased cost from the private capital, the cost to borrowers will rise.

- **Reduced standardization:** As noted earlier, the TBA market relies on standardized underwriting, servicing, and securitization. If the introduction of private capital reduces standardization, then the market for these MBS may become less liquid with a resulting increase in the cost of funding these mortgages.

Potential Investor Impact on Underwriting Standards and Product Mix

- **Underwriting Standards.** If the level of fees or rate of return that investors can charge is not sufficient to compensate for the perceived risk, investors may want to tighten underwriting standards to match the corresponding level of risk. In the extreme, investors may find that the underwriting standards that the government favors are simply more flexible than they are willing to tolerate. If investor tolerance for risk is less than the government's, it may be necessary to tighten underwriting standards simply to draw private investors into the market.

Potential Investor Impact on Volatility of Pricing and Availability of Capital

- **Continuous Reassessing of the Level of Risk.** Since private capital markets are constantly reassessing and re-pricing risk, they may cause higher variability in the cost of mortgages than would a regime based on regulated insurance companies. This reassessment of risk may also impact the underwriting standards that private investors require.
- **Periodic Withdrawal of Private Capital.** As we saw during the most recent financial crisis, private investors may pull back from many capital markets in times of economic stress.²

Scattering Risk Beyond the Mortgage Market

- **Contagion.** While sharing risk with private capital does reduce the risk borne by the government guarantee, it does not eliminate it altogether. Private-sector risk-sharing merely moves the risk out of the mortgage market to other parts of the financial system, such as insurance companies and hedge funds. Wherever this risk ends up, financial system regulators will need to monitor risks carefully and take early action to guard against systemic risks/contagion that can undermine the financial system.

2. In its February 2013 report, *Housing America's Future: New Directions for National Policy*, the Bipartisan Policy Center's Housing Commission recommends that a new government guarantor be given the authority to price and absorb first-loss credit risk for limited periods during times of severe economic stress, following notification of the Treasury Department, the Federal Reserve, and the chairs of appropriate congressional committees, in order to ensure the continued flow of mortgage credit.

This is one in a series of primers on key concepts in housing finance prepared by the Bipartisan Policy Center. Visit www.bipartisanpolicy.org/projects/housing to view the full series.
