

## **MBS OASs Relative to Those of Competing Spread Sectors During Periods of Crisis**

The recent bout of spread widening that occurred earlier this month triggered a number of questions from investors regarding the performance of agency MBSs versus competing spread sectors during crisis periods. Unfortunately, when we looked back through our historical database for guidance, we realized that there was a paucity of crisis periods on which to base an analysis. Consequently, we do not believe that history allows any firm conclusions with respect to this question. However, the limited evidence available suggests that straight agency debt is a more consistent performer in crisis periods than agency MBSs.

*We compare the performance of MBSs to those of four competing spread sectors during periods of crisis.*

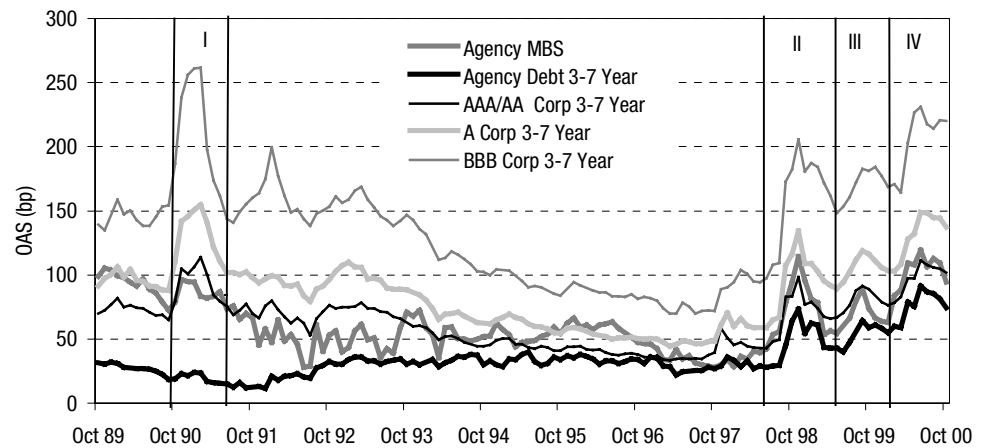
We based this conclusion on an analysis of SSB fixed-income index OASs over the past decade for agency MBSs and the three- to seven-year sectors of agency debt, triple-A/double-A rated corporates, single-A rated corporates, and triple-B rated corporates. We chose the three- to seven-year sectors of these competing spread sectors because their effective durations were generally comparable to those of the mortgage market. The OAS histories of these sectors are plotted in Figure 25. There were only two true crises during this period that appeared to have a large effect on the fixed-income markets: the Persian Gulf conflict in 1990–91 (labeled “I”) and the financial crisis of 1998 (labeled “II”). Given the dearth of true crises, we also analyzed two more recent bouts of spread widening (labeled “III” and “IV”).

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<sup>6</sup> See *Bond Market Roundup: Strategy*, Salomon Smith Barney, October 6, 1999.

<sup>7</sup> We thank the client who suggested this possibility.

**Figure 25. Selected Sectors — Historical OASs (Market-Implied Vols, Treasury Model Curve), Oct 89–Oct 00**



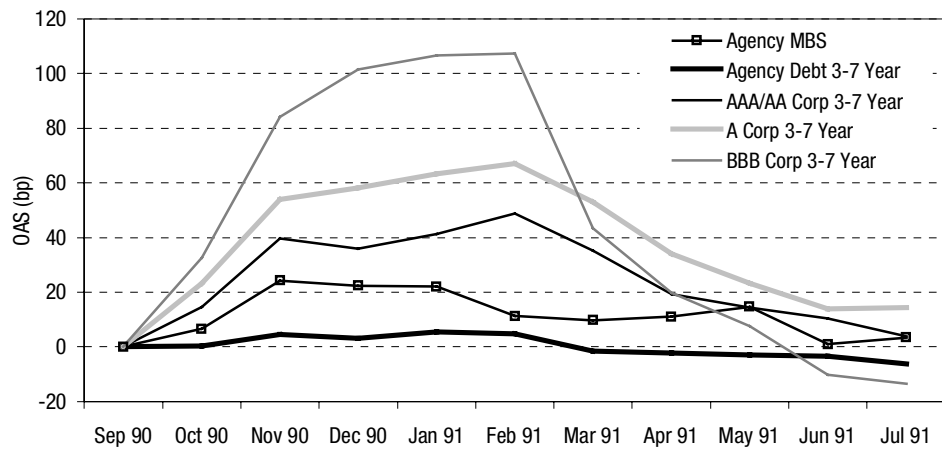
Source: Salomon Smith Barney.

Figures 26–29 compare the cumulative OAS changes for each sector over the selected periods. The spread relationships during the Persian Gulf crisis appear to indicate a classic flight to quality: agency debt and agency MBSs widened the least, and triple-B rated corporates the most. However, in each of the subsequent bouts of spread widening, agency MBSs did not fare as well. In the 1998 financial crisis, the peak OAS widening in agency MBSs was comparable to that of the single-A rated corporate sector. And, in the two most recent periods of spread widening, the peak widening in agency MBSs was comparable to that suffered by triple-B rated corporates. In contrast, straight agency debt was the most consistent performer in each period.

*We conclude that agency debt has been a more consistent performer than agency MBSs.*

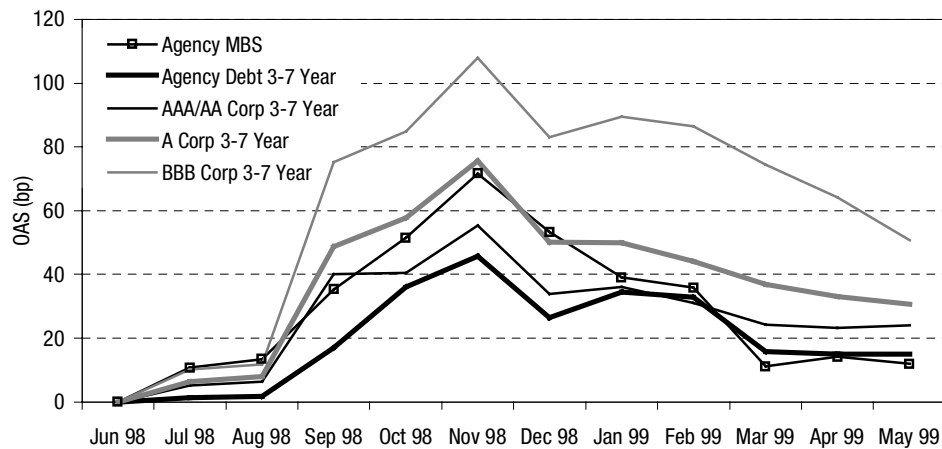
Of course, if we thought hard enough, we could come up with excuses for the poor showing of MBSs in each of these periods. For example, the conventional wisdom is that the weak performance of mortgages during the financial crisis of 1998 was caused by a fear that collapsing hedge funds might dump large volumes of MBSs into a very thin market. Given the much smaller footprint of leveraged money in the market today, it seems less likely that this will happen again. However, even after mulling over the possible excuses for MBSs — and after considering the paucity of the data — it appears difficult to avoid the conclusion that for investors looking to protect their portfolios in periods of spread widening, straight agency debt has been a more consistent performer than agency MBSs.

**Figure 26. Selected Sectors — Cumulative OAS Changes (Market-Implied Vols, Treasury Model Curve), Sep 90–Jul 91**



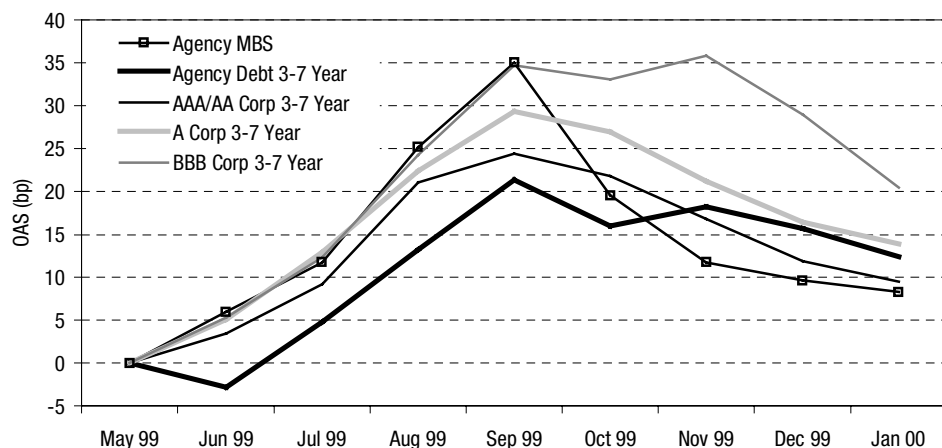
Source: Salomon Smith Barney.

**Figure 27. Selected Sectors — Cumulative OAS Changes (Market-Implied Vols, Treasury Model Curve), Jun 98–May 99**



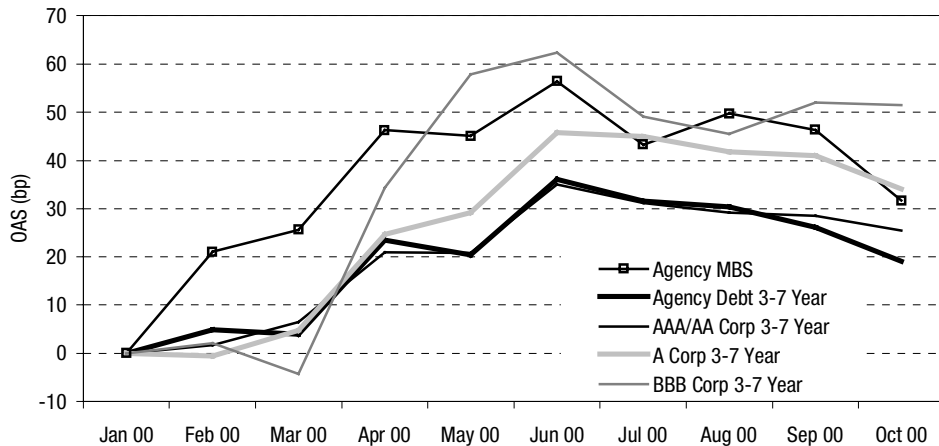
Source: Salomon Smith Barney.

**Figure 28. Selected Sectors — Cumulative OAS Changes (Market-Implied Vols, Treasury Model Curve), May 99–Jan 00**



Source: Salomon Smith Barney.

**Figure 29. Selected Sectors — Cumulative OAS Changes (Market-Implied Vols, Treasury Model Curve), Jan 00–Oct 00**



Source: Salomon Smith Barney.