Economic Viewpoint

Desjardins Economic Studies
www.desjardins.com/economics

April 24, 2008

The subprime mortgage credit crisis: should the government intervene (again)?

A historical comparison with the Savings and Loan (*S&L*) scandal

The subprime mortgage credit crisis continues to get a lot of ink. According to the International Monetary Fund (IMF), the U.S. is facing its worst financial crisis since the 30s.

> [...] The global expansion is losing momentum in the face of what has become the largest financial crisis in the U.S. since the Great Depression. The financial shock that originated in the U.S. subprime mortgage market in August 2007 has spread quickly and in unanticipated ways, to inflict extensive damage on markets and institutions at the core of the financial system. [...]
>
> World Economic Outlook, April 2008.

Despite the Fed's aggressive actions, the problem of liquidities still prevails and the credit market remains tense. The situation is being made worse through the vicious cycle of falling house prices which are inciting a growing number of homeowners in trouble to hand over their keys, which in turn pumps up the inventory of homes and puts additional downward pressures on home values.

While this is indeed a concern, the current crisis is not without precedent, however. A certain symmetry can be drawn with the savings and loan (S&L) scandal, when almost half of the savings and loans[1] companies declared bankruptcy during the 1980s. The similarities are striking: a real estate correction, the scope of losses, poor risk management and increased leveraging. This has led to growing concern among some financial market stakeholders about whether government intervention is needed once again.

In our opinion, things should not devolve to that point. The Fed has taken some important steps over the past few months, by making aggressive rate cuts and enacting other less conventional methods to make sure the financial systems runs smoothly. Most especially, the funding of J. P. Morgan's purchase of Bear Stearns allowed the Fed to contain the contagion that could very well have led to fire sales. Furthermore, the ease with which banks raised capital implies that any amount of public funds used would be modest at best, if public funds were used at all.

With more bad news still to come, we are puzzled by the recent rebounds in the major stock markets, which no doubt illustrates that the worst of this crisis is likely behind us now. It appears as though the U.S. banking system is heading toward a turnaround period in its balance sheet. Under these conditions, however, the tightening of credit conditions could stall the economy's rebound.

---

[1] Savings and loans are community-based financial institutions with specific expertise in deposits and mortgage loans.

François Dupuis
Vice-President and Chief Economist

Yves St-Maurice
Director and Deputy Chief Economist

Mathieu D'Anjou
Senior Economist

Martin Lefebvre
Senior Economist

Hendrix Vachon
Economist

514-281-2336 *or* 1 866 866-7000, ext. 2336
E-mail: desjardins.economics@desjardins.com

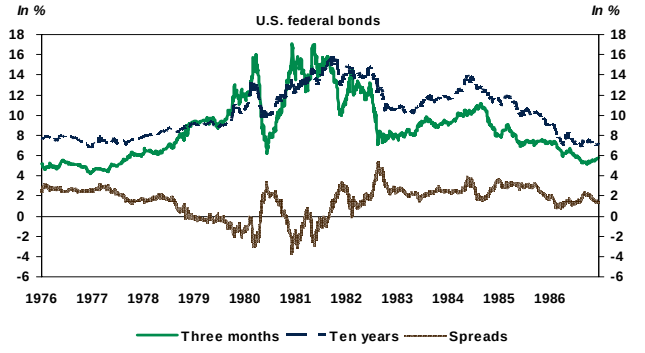
THE SAVINGS AND LOAN CRISIS

Understanding the breadth of the S&L debacle can help us forecast the end of the current turbulence. The sources that led almost 1,000 deposit-taking institutions to declare bankruptcy between 1986 and 1991 are wide ranging and complex. Those dark years in the U.S. banking system were a reflection of the deterioration of the economic and financial situation, increased risk-taking and a flagrant lack of supervision. Some aggravating factors that can explain this particular crisis include:

1. Rapid rise of short-term interest rates

S&Ls across the U.S. were still reeling by the end of the 1970s. To remedy the inflationist thrust led by rising energy costs, the U.S. Federal Reserve (Fed) pushed the target funds rate up sharply. Interest rates for 3-month Treasury bills went from a low point of 4.0% in 1976 to more than 16% by the end of 1980, while 10-year government maturity rates went from 6% to 13% during the same period (graph 1).

Graph 1 – The inversion of the yield curve was costly to S&L in the first part of the 80



Sources: Bloomberg and Desjardins, Economic Studies

For S&Ls, which held mainly fixed-rate long-term assets financed by short-duration liabilities[2], the inversion of the yield curve resulted in a balance sheet mismatch. Restricted to offering a maximum rate on deposits, S&Ls lost a huge number of investors to money market funds and several institutions became insolvent. With total net revenues of $781M in 1980, S&Ls suffered losses of $4.6B and $4.1B respectively in 1981 and 1982 (see table 1).

2. Deregulation

To help S&Ls to get back on profitable footing, a set of deregulations was put forth in 1980 and 1982 (see box 1 for more details). In March 1980, under the Carter Administration, the powers entrusted to deposit-taking institutions (thrifts) were broadened[3], the maximum rate offered on deposits was increased and the limit on insured deposits was increased from $40,000 to $100,000. Then, two years later when interest rates once again started their ascent, the Reagan government implemented a policy to follow through on the redistribution of powers to federally chartered S&Ls to allow them to diversify their activities to boost profits. The deceleration of inflation and the lowering of interest rates were a gift to many S&Ls, which were, by and large, back in profit-making form from 1983 to 1985.

[2] The length (or duration) is the measure of a security's sensitivity to interest rate changes. A long-term security like a 30-year mortgage is more sensitive to a change in interest rates than a short-term security, like a one-year deposit.

[3] Depository Institutions Deregulation and Monetary Control Act (DIDMCA) allowed thrifts to grant consumer loans for up to 20% of assets, to issue credit cards and invest up to 20% of assets in commercial real estate loans.

Table 1
S&L[1] insured by the FSLIC[2]

	Number of S&Ls	Total assets	Net income	Tangible capital	Tangible capital/ total assets	No. insolvent S&Ls[1]*	FSLIC[2] reserves
	$B	$B	$B	$B	%	$B	$B
1980	3 993	604	0,8	32	5,3	43	6,5
1981	3 751	640	-4,6	25	4,0	112	6,2
1982	3 287	686	-4,1	4	0,5	415	6,3
1983	3 146	814	1,9	4	0,4	515	6,4
1984	3 136	976	1,0	3	0,3	395	5,6
1985	3 246	1 068	3,7	8	0,8	702	4,6
1986	3 220	1 162	0,1	14	1,2	672	-6,3
1987	3 147	1 249	-7,8	9	0,7	672	-13,7
1988	2 949	1 349	-13,4	22	1,6	508	-75,0
1989	2 878	1 252	-17,6	10	0,8	516	n.a.

n.a.: not available;[1] Savings and Loan; [2] Federal Savings and Loan Insurance Corporation; * Based on tangible-capital-to-assets ratio.
Source: Federal Deposit Insurance Corporation

Box 1
Statutory and regulatory changes linked to the Savings & Loan debacle

March, 1980 – *Depository Institutions Deregulation and Monetary Control Act* (DIDMCA) enacted. The law is a Carter Administration initiative aimed at eliminating many of the distinctions among different types of depository institutions and ultimately removing interest rate ceiling on deposit accounts. Authority for federal S&Ls to make ADC (acquisition, development, construction) loans is expanded. Deposit insurance limit raised to $100,000 from $40,000. This last provision is added without debate.

November, 1980 – *Federal Home Loan Bank Board* (FHLBB) reduces net worth requirement for insured S&Ls from 5 to 4 percent of total deposits. Bank Board also removes limits on the amounts of brokered deposits an S&L can hold.

August, 1981 – *Tax Reform Act* of 1981 enacted. Provides powerful tax incentives for real-estate investment by individuals. This legislation helps create a «boom» in real estate and contributes to over-building.

September, 1981 – *Federal Home Loan Bank Board* permits troubled S&Ls to issue «income capital certificates» that are purchased by FSLIC and included as capital. Rather than showing that an institution is insolvent, the certificates make it appear solvent.

January, 1982 – *Federal Home Loan Bank* reduces net worth requirement for insured S&Ls from 4 to 3 percent of total deposits.

April, 1982 – *Bank Board* eliminates restrictions on minimum numbers of S&Ls stock holders. Previously, it required at least 400 stock holders of which at least 125 had to be from «local community», with no individual owning more than 10% of stock and no «controlling group» more than 25%. Bank Board's new ownership regulation would allow a single owner.

December, 1982 – *Garn – St Germain Depository Institutions Act* of 1982 enacted. This Reagan Administration initiative is designed to complete the process of giving expanded powers to federally chartered S&Ls and enables them to diversify their activities with the view of increasing profits. Major provisions include: elimination of deposit interest rate ceilings; elimination of the previous statutory limit on loan to value ratio; and expansion of the asset powers of federal S&Ls by permitting up to 40% of assets in commercial mortgage, up to 30% of assets in consumer loans, up to 10% of assets in commercial loans, and up to 10% of assets in commercial leases.

August, 1985 – Only $4.6 billion in FSLIC insu rance fund. Chairman Gray tries to gain support for recapitalizing FSLIC on Capitol Hill. In 1986, *Government Accounting Office* (GAO) estimates the loss to the insurance fund to be around $20 billion.

August, 1986 – *Bank Board* raises net worth standard gradually to 6% with up to 2% points offset for reduced interest rate-risk.

1987 – Losses at Texas S&Ls comprise more than one-half of all S&L losses nationwide, and of the 20 largest losses, 14 are in Texas. Texas economy in major recession: crude oil prices fall by nearly 50%, office vacancy is over 30%, and real estate prices collapse.

January, 1987 – *GAO* declares FSLIC fund insolvent bay at least $3.8 billion.

1989 – President Bush unveils bailout plan in February. In August, *Financial Institutions Reform Recovery and Enforcement Act* (FIRREA). FIRREA abolishes the Federal Home Loan Bank Board and FSLIC, switches S&L regulation to newly created Office of Thrift Supervision. Deposit insurance function shifted to the FDIC. A new entity, the Resolution Trust Corporation is created to resolve the insolvent S&Ls.

Source: Federal Deposit Insurance Company

3. Lack of supervision

Unfortunately, this deregulation was not accompanied by measures to adequately minimize the risks incurred. Hindsight more harm than good.

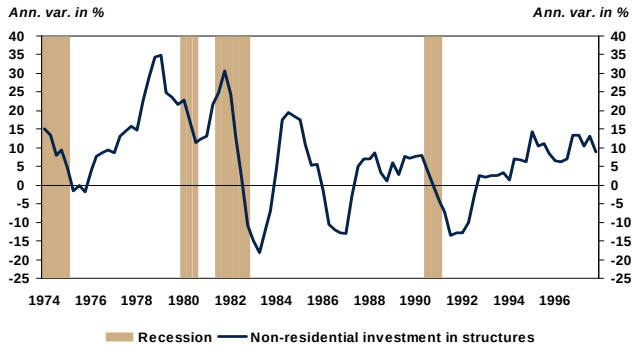
4. Increasing risk

Interest rate risk was quickly replaced by credit risk. Since deposits were insured by the Federal Savings and Loan Insurance Corporation (FSLIC), S&Ls were encouraged to participate in lucrative business sectors (with the related higher risk, with which they had limited experience), to straighten out their balance sheets. The new regulations in particular allowed S&Ls to invest in commercial real estate projects. In certain states, direct and almost unlimited investment in real estate, the stock market and in service-related companies was allowed. Some S&Ls opted for speculative investments and derivative products.

5. Regional and sectorial recessions

The situation was further aggravated by recessions in certain regions and sectors. In a direct link to the effervescence created by substantial rises in the price of oil, increasing employment, revenues and house values lead to a major migration to the Southwest of workers seeking employment and the resulting housing boom. When oil prices dropped significantly (from US$30 a barrel in 1985 to US$10 in 1986), the real estate bubble went bust (graph 2). Investors defaulted on their loans (granted in large part by S&Ls), and the value of goods taken as collateral began to fall too quickly to protect the value of the loans. S&Ls in agricultural regions experienced a similar fate, while the price of grain fell during the first half of the 1980s.

Graph 2 – The S&L crisis reflects the commercial real estate bust of the 80



Sources: Datastream and Desjardins, Economic Studies

In the end, while certain regions were dealing with financial downturns, the relative importance of the banking market in some of these states (in terms of resources and institutions) became a problem that impacted the country from coast to coast. As a result, profits evaporated in 1986 ($0.1B), and S&Ls became largely deficit-ridden from 1987 (-$7.8B) to 1989 (-$17.6B).

THE COSTS AND CONSEQUENCES OF THE S&L DEBACLE

Throughout the 80s, S&Ls suffered unprecedented losses on loans and investments, which lead to the insolvency of FISCL at the end of 1986. To respond to this situation, in 1987 Congress created the Financing Corporation (FICO) to raise capital for the FISCL by issuing long-term bonds. The contribution, however, was woefully insufficient to counter the glaring banking problems. From 1986 to 1989, under the FISCL, then from 1989 to 1995, under the Resolution Trust Corporation (RTC), its replacement, 1,043 institutions that held US$519B in assets were either dissolved or closed outright (table 2). This led to a massive restructuring within the industry: the number of institutions went from 3,234 to 1,645 during this period, a drop of almost 50%.

Table 2
Thrift failures

	FSLIC [1]		RTC [2]	
In $M	Number	Assets	Number	Assets
1986	54	16 264		
1987	48	11 270		
1988	185	96 760		
1989	9	725	318	134 520
1990			213	129 662
1991			144	78 899
1992			59	44 197
1993			9	6 148
1994			2	137
1995			2	435
Total	**296**	**125 019**	**747**	**393 998**

[1] Federal Savings and Loan Insurance Corporation; [2] Resolution Trust Corporation.
Source: Federal Deposit Insurance Corporation

The crisis only started to abate in 1989 with the implementation of the Financial Institutions Reform, Recovery, and Enforcement Act (FIRREA) under the Bush Administration (see box 1 for more details). The total cost to taxpayers was colossal and it launched an important debate on the moral hazards of the government stepping in to resolve the crisis. From 1986 to 1995, the shortfall was US$152.9B, 81% of which (US$123.8B) was shouldered by taxpayers (table 3).

SUBPRIME CRISIS: HISTORY IS REPEATING ITSELF

Without rehashing the details of this current crisis[4], the similarities with the S&L scandal are striking not only in terms

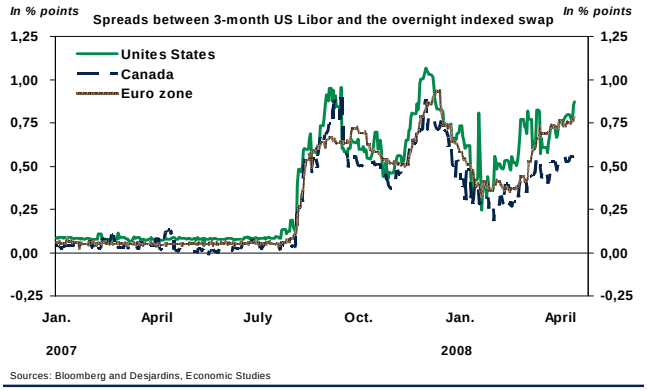
[4] See the Economic Viewpoint: Credit problems are creating major risk, March 17, 2008.

Table 3
Estimated S&L[1] resolution costs

In $B	Sector		Total
	Private	Public	
Direct cost			
FSLIC[2]*/FRF*[3] (1986-1995)	22,0	41,0	63,0
RTC[4] (1989-1995)	7,1	75,6	82,7
Estimated	**29,1**	**116,5**	**145,7**
Indirect cost		**7,3**	**7,3**
Total	**29,1**	**123,8**	**152,9**

[1] Savings and Loan; [2] Federal Savings and Loan Insurance Corporation; [3] FSLIC Resolution Fund; [4] Resolution Trust Corporation.
Sources: Federal Deposit Insurance Corporation

Graph 3 – Tension on money market remains elevated



Sources: Bloomberg and Desjardins, Economic Studies

of the sources (real estate correction), but also in the scope of the losses sustained (approximately 3% of the GDP). In short, the deterioration of subprime mortgage credit in the United States is a reflection of increased risk, lax compliance criteria and the regional deterioration of the labour market.

Faced with unprecedented increases in home prices and rising interest rates, the drop in property affordability propelled households to turn to subprime loans[5]. Mortgage lenders did not hesitate to promote this type of loan, since the risk was to be borne by banks. Banks bought these mortgage loans and pooled them into asset-backed securities. This method was facilitated by credit-rating agencies, which by laying out different credit tranches, granted higher rates to these structured products. All was well as long as home prices continued to rise. And then everything came to a screeching halt when the real estate bubble burst.

The financial turbulence began when defaults on subprime loans started to accelerate, thus hastening the drop in home prices. The sudden halt in the demand for asset-backed commercial paper resulted in an unprecedented loss of liquidity in the money market and the gaps in the 3-month interbank interest rates widened to levels that were much greater than target key interest rates (graph 3). Due to a renewed appreciation for risk and the darkening growth outlook, liquidity problems are still being felt.

LEVERAGING: STILL THE GUILTY PARTY

To date, the total reported losses are US$290B (table 4), and it is estimated that in the end total losses will top $400B[6]. A colossal sum to be sure, but it is nevertheless limited compared to the overall number of current residential mortgages (1.9%), or to the GDP (2.8%) or to the U.S. market capitalization (1.8%). Then why is the subprime crisis having such a negative impact on the financial system and the economy in the U.S.?

A recent study[7] showed that the impact has the potential to be significant since approximately half of the losses will be absorbed by institutions that are leveraged (deposit-taking institutions, investment banks, speculative funds, etc.). According to the statistics of the U.S. Federal Reserve, commercial banks in the United States leverage at a rate of approximately 9.5:1.[8] Investment banks use even greater debt leveraging: Bear Stearns (32.8:1), Morgan Stanley (32.6:1), Lehman Brothers (30.7:1), Merrill Lynch (27.8:1) and Goldman Sachs (26.2:1).[9]

The problem is that because of this leveraging, banks must reduce the amounts of loans granted by a multiple of generated losses to rebalance their balance sheets. If we assume a 10:1 leverage for the industry overall, and if we assume that institutions will be able to make up half of the losses incurred by raising capital, a $100B decline in capital could translate into a $1,000B contraction in consumer and business loans.

The study, with its more circumspect analysis, found that the credit contraction could reach $910B. This would slice about 1.3 percentage points from real GDP after four quarters. However, losses could be even more important. Since leveraging is procyclical, in other words, it occurs during periods of strong growth and is quickly reduced in a contraction; the current economic slowdown may be encouraging firms to reduce their reliance on debt (graph 4).

[5] Subprime loans granted to borrowers with tainted and incomplete files. The share of subprime loans jumped from 5.7% in 2006 to 13.5% in 2006.

[6] The IMF's estimate is somewhat more pessimistic: potential losses for banks with exposure to subprime loans and other similarly-structured products, and losses on consumer and business loans could reach US$440B to US$510B.

[7] David GREENLAW, Jan HATZIUS, Anil K. KASHYAP and Hyun Song SHIN, Leveraged losses: Lessons from the Mortgage Market Meltdown, US Monetary Policy Forum Conference Draft, February 29, 2008.

[8] In February 2008, total assets were $10,993.9B with liabilities of $9,838.5B. The capital-asset ratio = ($10,993.9B$ - $9,838.5B)/10,993.9B = 10.5%, which corresponds to leveraging of 9.5:1.

[9] Mark GONGLOFF, Crunch Proves a Test of Faith for Street Strong, *The Wall Street Journal*, March 17, 2008.

Table 4
Subprime: Bank losses

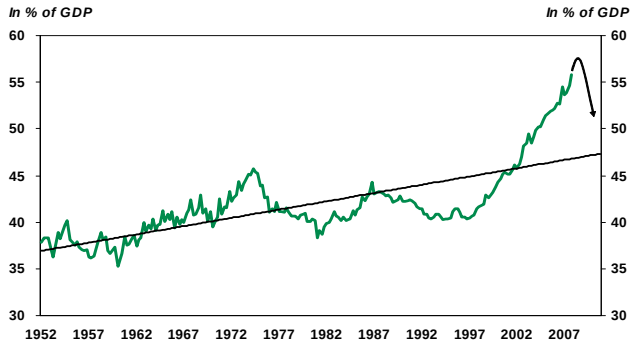
In $B	Writedown	Loss	Total
Citigroup	35,3	5,6	40,9
USB	38,0		38,0
Merrill Lynch	31,7		31,7
Bank of America	9,2	5,7	14,9
Morgan Stanley	12,6		12,6
HSBC	3,0	9,4	12,4
JPMorgan Chase	5,5	4,2	9,7
IkB Deutsche	9,1		9,1
Washington Mutual	0,3	8,0	8,3
Deutsche Bank	7,5		7,5
Wachovia	4,9	2,4	7,3
Credit Agricole	6,6		6,6
Credit Suisse	6,3		6,3
Mizuho Financial Group	5,5		5,5
Canadian Imperial (CIBC)	4,1		4,1
Societe Generale	3,9		3,9
Bayerische Landesbank	3,7		3,7
Wells Fargo	0,9	2,7	3,6
E*Trade	2,5	0,9	3,4
Lehman Brothers	3,3		3,3
WestLB	3,3		3,3
Barclays	3,2		3,2
Bear Stearns	3,2		3,2
Royal Bank of Scotland	3,1		3,1
National City	0,5	2,6	3,1
Goldman Sachs	3,0		3,0
Dresdner	2,8		2,8
ABN Amro	2,5		2,5
Fortis	2,4		2,4
HSH Nordbank	2,4		2,4
Natixis	1,9		1,9
BNP Paribas	1,4	0,3	1,7
DZ Bank	1,5		1,5
Bank of China	1,3		1,3
Caisse d'Epargne	1,3		1,3
LB Baden-Wuerttemberg	1,3		1,3
Nomura Holdings	1,0		1,0
Sumitomo Mitsui	1,0		1,0
Gulf International	1,0		1,0
European banks not listed above (1)	8,4		8,4
Asian banks not listed above (1)	5,0	0,4	5,4
Canadian banks excluding CIBC	2,5	0,1	2,6
Total	**247,6**	**42,3**	**289,9**

(1) Whose losses are smaller than $1B.
Source: Bloomberg

CONTRACTION OF BANKING CREDIT = ECONOMIC SLOWDOWN

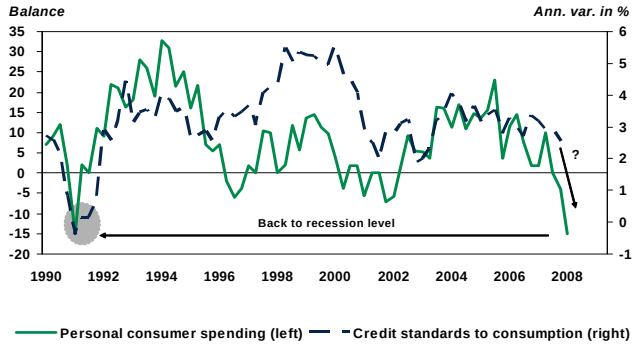
Losses on mortgage loans and underlying securities, and contraction in available credit to households and enterprises, are a serious menace to economic growth (graph 5). Given the elevated uncertainty regarding risk exposure, financial institutions have tightened their credit standards and have got out of any type of risky loans, preferring to keep their capital in case of potential losses.

Graph 4 – Are financial institutions about to deleverage?



Sources: Datastream and Desjardins, Economic Studies

Graph 5 – Credit to consumption



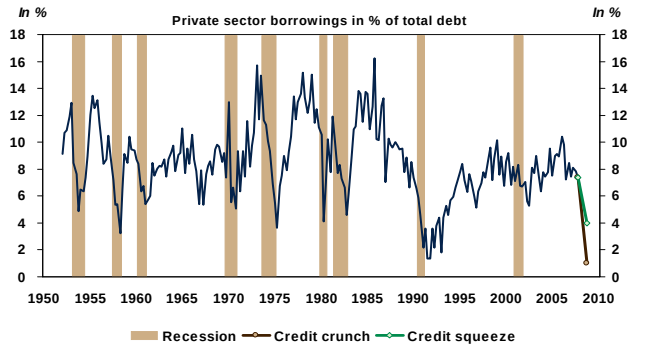
* Net percentage of banks willing to make more loans.
Sources: Federal Reserve Board and Desjardins, Economic Studies

The slowdown in employment and salaries could have repercussions on the correction in home prices, which could continue. In the end, this could translate into a marked reduction in debt leveraging by banks, a situation that would lead the U.S. toward an extended period of weak growth.

The IMF estimates that the credit squeeze could slash credit growth by roughly 4 percentage points in the U.S.[10]. In a more pessimistic if not catastrophic scenario, a credit crunch, could have twice the impact and would mirror the S&L debacle (graph 6). Such a scenario could occur in the eventuality where institutions cannot determine the risk they're taking by lending to other institutions. In that case, even worthy borrowers would find it difficult to obtain credit.

[10] Global Financial Stability Report, April 2008.

Graph 6 – A credit crunch could translate into an important contraction of private sector households



Sourc : Desjardins, Economic Studies

THE FED TO THE RESCUE!

The major difference with previous credit crunches is in the unprecedented response of government authorities. On one side, the Bush Administration set up the Economic Stimulus Act of 2008. The plan, estimated at US$168M, should add about 0.7 percentage points to real GDP growth in 2008.[11] On the other hand, while critics were harsh when Ben Bernanke hesitated to act when the crisis began in August 2007, the scope of adjustments made thereafter quickly demonstrated that the Fed was determined to make sure the U.S. financial system was running smoothly.

Since September 2007, interest rates have been cut by 300 basis points, from 5.25% to 2.25%, and the door is clearly open for more cuts as needed. But the Fed quickly understood that the liquidity problem triggered by the dysfunction of the mortgage-backed securities market would not be solved by simply cutting interest rates. Other less conventional measures have been implemented in the past few months (table 5). In addition to lowering the discount rate, the Fed has confirmed its role as a last-resort lender by allowing major traders to use this option. Using term loans, the Fed has provided banks

[11]See the Economic Viewpoint titled United States: Are home prices set to bottom out? March 12, 2008.

Table 5
Forms of Fed lending to financial institutions

	*Open market operations**	*Discount Window*	*Term Auction Facility (TAF)*	*Primary Dealer Credit Facility (PDCF)*	*Term Securities Lending Facility (TSLF)*
Admissibility	Primary dealers	Depositary institutions	Depositary institutions	Primary dealers	Primary dealers
Term of loan	Overnight to 28 days	Overnight to 90 days	28 days	1 day	28 days
Type of loan	Funds	Funds	Funds	Funds	Treasuries
Interest rate	Fed funds rate	Discount rate	Auction bid rate	Discount rate	Auction bid rate
Frequency	Daily	As requested	Every other week	As requested	Weekly
Accepted collateral	Treasuries, agencies, agency mortgage-backed securities	Treasuries, agencies, agency mortgage-backed securities, other securities	Treasuries, agencies, agency mortgage-backed securities, other securities	Treasuries, agencies, agency mortgage-backed securities, investment grade debt securities	Treasuries, agencies, agency mortgage-backed securities, investment grade debt securities, other securities
Creation	Existing, modified March 7, 2008	Existing, modified August 17, 2008	December 12, 2007	March 16, 2008	March 11, 2008

* Repos, reverse repos, outright buying and selling of treasuries.
Sources: Federal Reserve of New York and Desjardins, Economic Studies

and major traders with the liquidities they need to meet their requirements, and has broadened the range of securities to be held as guarantees (agency-backed MBS securities, quality corporate bonds, etc.).

The turning point was probably when the Fed financed the rescue of Bear Stearns by J.P. Morgan. The Fed clearly wants to avoid the debate on moral hazards, but contagion caused by the bankruptcy of a major U.S. investment bank could have put the entire U.S. financial system in peril:

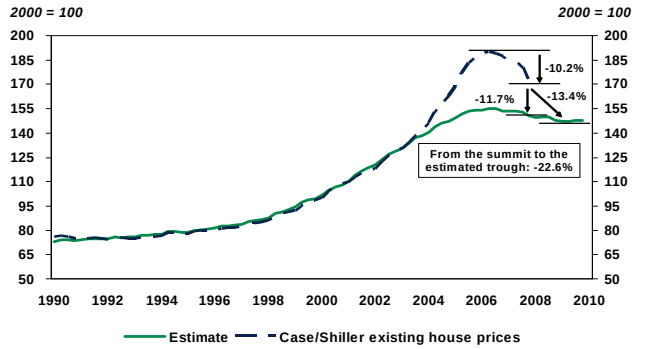
> [...] Our financial system is extremely complex and interconnected, and Bear Stearns participated extensively in a range of critical markets. With financial conditions fragile, the sudden failure of Bear Stearns likely would have led to a chaotic unwinding of positions in those markets and could have severely shaken confidence. The company's failure could also have cast doubt on the financial positions of some of Bear Stearns' thousands of counterparties and perhaps of companies with similar businesses. Given the current exceptional pressures on the global economy and financial system, the damage caused by a default by Bear Stearns could have been severe and extremely difficult to contain. Moreover, the adverse effects would not have been confined to the financial system but would have been felt broadly in the real economy through its effects on asset values and credit availability.[...]
>
> Ben Bernanke, April 2, 2008.

Counterparty risks fell quickly (graph 7). The U.S. stock markets rallied and the S&P 500 index gained almost 7.5% in the four weeks that followed, after having hit bottom on the morning of March 17.

IS THE END OF THE CRISIS IN SIGHT?

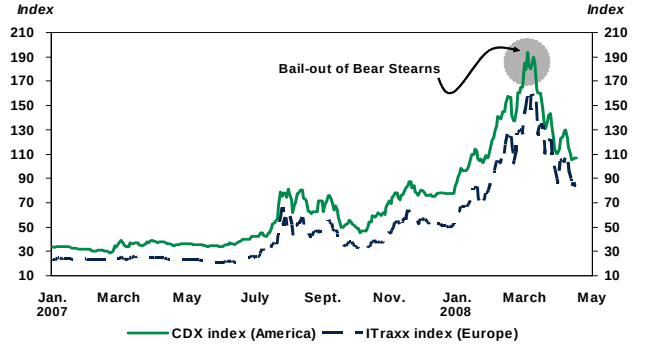
The greenback's depreciation coupled with the Fed's monetary easing and cuts to the federal government's long-term interest rates should support economic activity despite the widening of the credit spread. However, these adjustments do not take into account the drastic tightening of credit conditions in banks and the weakening of the structured products market, a major source of increased credit over the past few years. The actions put forth by the Fed limited the problems related to the crisis (solvency and liquidities) instead of tackling its root cause (plummeting home prices). In this case, a simple model of home prices in the U.S., based on interest rates and household revenues, suggests that a further decline in the range of 10 to 15% is still needed for home prices to recover their balance (graph 8)[12].

Graph 8 – The housing correction as further to go



Sources: Standard & Poor's and Desjardins, Economic Studies

Graph 7 – Default insurance costs have receded since Bear Stearns' salvage



Sources: Bloomberg and Desjardins, Economic Studies

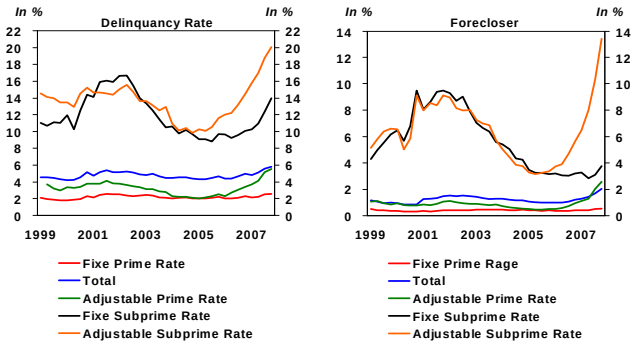
Prices could, however, fall even lower. The problem is that the situation has been exacerbated by the vicious cycle where the correction in home prices is encouraging an increasing number of homeowners in trouble to simply hand in their keys, which only increases the inventory of homes on the market and applies more downward pressures on home values. Since more and more households have negative equity in their homes[13], the default rates for subprime loans granted in 2007 could post even worse results than in 2005 and 2006 (graph 9).

MUST THE GOVERNMENT INTERVENE (AGAIN)?

While we have a much better understanding of the crisis and its ramifications, it appears that this crisis will end only once home prices will have hit bottom. Under these conditions, it is increasingly possible that the public sector will intervene. In the end, only a buy back of mortgage loans in trouble at a discount, and guaranteed by the Federal Housing Administration, may stop home prices from falling and stabilize the credit market.

[12] In December 2006, First American CoreLogic estimated the number of households with negative equity in their homes at 7%. With the recent drop in home prices, this rate is likely to be between 10 and 15%.

Graph 9 – Delinquencies and foreclosures continue to rise, especially in subprime



Sources: Mortgage Bankers Association and Desjardins, Economic Studies

It became clear new regulations would be on order when the Fed intervened to finance the purchase of Bear Stearns – when the Fed signalled that it would not allow a major investment firm to go under. In the end, if taxpayers bear the brunt of this expense, the government will tighten the risk limits banks can take on. Some will be quick to blame the Fed for allowing its key rate to remain at 1% for too long. Banks will now have to think twice about taking on too much risk in situations that look like a bubble. If banks cannot heal the wounds inflicted by their own risky behaviour, they must be discouraged from taking miscalculated risks.

That said, because of the moral hazards this entails, the government will become directly involved in buying back mortgage loans in trouble only when all other options have been exhausted. In theory, for public intervention to be optimal, the government must make allowances for the capacity of banks to raise capital and the cost of closing banks.

For the time being, lending institutions are proving quite capable when it comes to raising capital. From the end of November to 16 April, more than US$162B of capital was obtained, with about one third from Sovereign Wealth Funds (table 6). With more than half of the needs currently being met by the private sector, banks may very well see their own way through this impasse, especially given the accentuation of the yield curve as a result of the Fed's aggressive rate cuts that will allow banks to recover their profit margins. Then again, banks always have the option of selling assets or lowering their dividend payments.

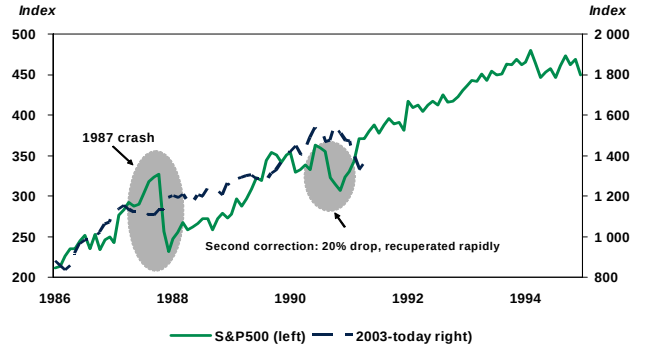
CONCLUSION

The worst of this crisis is in all likelihood now behind us. What remains to be seen is whether the credit squeeze will land us in a long-term or short-term recession. Looking back at the S&L scandal, which lasted over several years and led to a credit crisis, we may have to wait until late 2009 for the economy to rebound in any sustainable way.

In our opinion, this situation calls for more rate cuts than presently priced in by the markets. True, persisting high energy prices constitute a challenge to monetary authorities. However, the global context remains deflationist (slowing growth, rising production capacities, job losses, wage drops…) and priority should still be aimed at economic recovery and a well functioning financial system. Therefore, somewhat like in the early 90, we do not expect interest rates to increase anytime soon.

This doesn't mean that financial markets will stop functioning. In spite of the economic difficulties that occurred in the 80 and 90, stock markets were able to get the best out of it (graph 10).

Graph 10 – Stock market performance was not so bad during the S&L crisis S&P 500



Sources: Datastream and Desjardins, Economic Studies

Martin Lefebvre
Senior Economist

Table 6
Private sector capital infusion

	Total	Breakdown by investor	
In $B			
Citigroup	30,4	6,9	Government of Singapore Investment Corp.
		5,6	Kuwait Investment Authority, Alwaleed bin Talal, Capital Research, Capital World, Sandy Weill, public investors
		7,5	Abu Dhabi Investment Authority
		10,4	Public investors
UBS	28,0	11,0	Government of Singapore Investment Corp.
		2,0	Unidentified Middle Eastern investor
		15,0	Public investors
IKB Deutsche	13,4		German government, Banking associations
Bank of America	13,0		Public investors
Merrill Lynch	12,8	6,6	Korea Investment Corp., Kuwait Investment Authority, Mizuho Financial Group
		5,0	Temasek Holdings
		1,2	Davis Selected Advisors
Wachovia	10,5	3,5	Unidentified U.S. investors
		7,0	Public investors
WaMu	10,0	3,0	Public investors
		2,0	TPG Inc.
		5,0	Institutional investors
Societe General	8,8		Public investors
WestLB	7,9		State of North Rhine Westphalia, savings banks associations, regional governments
Barclays*	7,7	3,0	China Development Bank
		2,0	Temasek Holdings
		2,8	Public investors
Morgan Stanley	5,0		China Investment Corp.
Lehman Brothers	4,0		Public investors
Canadian Imperial (CIBC)	2,9	1,5	Li Ka-Shing, Manulife Financial, Caisse de dépôt et placement du Québec, OMERS
		1,4	Public investors
HSBC	2,0		Public investors
National City	1,9		Public investors
E*Trade	1,8		Blackrock Inc., Citadel, other investors
Credit Suisse	1,4		Public investors
Gulf Int'l	1,0		Government of Bahrain, Kuwait, Oman, Qatar, Saudi Arabia, UAE
Total	**162,5**		

* China Development Bank's and Temasek's investments in Barclays Plc were prior to an unsuccessful bid to buy ABN Amro Holding NV last year.
Source: Bloomberg