ADDING VALUE

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SUMMARY:

Here is some vocabulary that is related to the recent mortgage meltdown:

ARM – adjustable rate mortgage
Commercial Paper – an unsecured promissory note with a fixed maturity of no more than 270 days
Line of Credit – a legal commitment undertaken by a bank to lend to a customer
Sub-Prime Loan – loan wherein the buyer does not qualify under standard practice
MBS – mortgage-backed securities
Negative Amortization – skip a payment and the amount is added on to the principal
Interest Only – pay only interest, no principal
Silent Seconds – allowed people to borrow more than 100% of the home's value at closing
Low Documentation – allowed borrowers to simply claim an income without verification
FICO Scores – statistical probability that you won't default on payments for the next two years based on payment history maintained by a credit bureau; this measures your propensity to pay, but not your ability to pay

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ADDING VALUE is mailed quarterly to our clients and friends. The intent of this publication is to share some of our more interesting views and research with our clients.

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Third Quarter Investment Review and Outlook – The U.S. Sub-Prime Mortgage Implosion

PROLOGUE - The Good Old Days

Once upon a time, it was a serious event to buy your first home. You struggled to save enough for the down payment of usually 20%, you (or your mortgage lender) carefully ran simulations to determine if you had adequate income to make the monthly payments on the amount financed, you carefully considered the downside effect of a job termination or illness on your ability to pay, and if this wasn't enough, your local banker (who was probably also your neighbor) kept you honest through pride alone to make those monthly mortgage payments for decades. (For a great scene on this old-time character, watch the movie "The Astronaut Farmer"!)

Traditionally, banks and S&L's writing these mortgages expected to carry most of them to maturity or until the houses were sold. Banks earned the difference between the monthly payments and what it cost to fund the loan. Most of the time mortgage rates were higher than a bank's borrowing cost, so the banks made money on the loans. Because of their great importance to the functioning of the economy, banks have been regulated longer and more heavily by the state and federal authorities than most other businesses. However, regulation limited the bank's available capital (after all, it could only loan out a percentage of the capital on hand) which made bankers careful to lend properly and prudently. *Banks were the pressure valve retarding unmitigated growth in home ownership.*

In today's economic reality, banks may be a little too conservative. Renters of modest means still wanted their piece of the American dream. Lenders and homebuilders, like all sales organizations, wanted to move as much product as possible. U.S. politicians liked the idea with great social merit—property ownership for all. Starting in 2002, the wishes of the renters, lenders and homebuilders began to come true.

ACT ONE-Birth of an Idea

In 2002, the U.S. was recovering from the double whammy of the massive stock crash and the World Trade Center attacks. It was uncertain if a recession was imminent. This economic situation led the Federal Reserve to dramatically slash short-term interest rates. Immediately, home mortgages became more affordable for low-income buyers. Marketing efforts intensified from the politicians, lenders and builders with the patriotic theme that home ownership was a given right and homes were the only true preserver of capital, given the *fickleness* of the stock market. Add to this environment of patriotic fervor, a series of mortgage financial innovations and the flood gates were opened.

In the late 1970's and early 1980's, Wall Street created a new security, called the mortgage-backed security. Originators of these securities could buy mortgages from banks, package them into a collection, or pool, and then sell shares in the pool to investors. A pool could be several thousand or only a few mortgages.

The cash flow consisted of the interest payments of the mortgages less any servicing costs. In many cases, originators obtained the guarantee of one of three federally sponsored agencies: GNMA (The Government National Mortgage Association "Ginnie Mae"), FNMA (The Federal National Mortgage Association "Fannie Mae") and the FHLMC (The Federal Home Loan Mortgage Association "Freddie Mac"). These securities came with a direct (GNMA) or an indirect guarantee of the U.S. government—not as high a quality as Treasury securities, but darn close. By selling their mortgages to Ginnie Mae, Fannie Mae or Freddie Mac, banks then had more cash to lend to other clients. But these agencies had to conform to certain government rules on the quality and size of the acceptable mortgages in the mortgage package, and consequently the banks also tried to conform to the standards.. For about 20 years, these government agencies maintained their mandate and allowed more people to own homes; the securities were slowly accepted by most institutional investors. The involvement of the three government agencies gave stability, credit support, and standardization to the market which was necessary to attract investors. They allowed home ownership to be expanded and deepened. Because the agencies guaranteed the timely payment of principal and interest for all securities issued, the securities were not rated by the rating agencies.

Beginning with the turn of the 21st century under the flag of imminent recession and terrorist attacks, security innovation on Wall Street expanded yet again. Wall Street created credit default insurance, also known as credit default swaps (CDS), through which a hedge fund or an investment bank (the non-bank intermediaries) would guarantee the loans in any given mortgage security against default. Now, the role of the three government agencies could be bypassed. Although un-important initially, these intermediaries had no access to the Federal Reserve discount window, had no FDIC insurance, and the liabilities were not insured. These were small details in a boiling hot market. The combination of low interest rates, securitization, and credit insurance created a powerful feedback loop: easy money kept defaults low and low defaults made credit default insurance HUGELY profitable. Hedge funds discovered that they could borrow at historically low rates and write credit default swaps with massive profit spreads. And the coup de grace—the securitization "machine" could process low-quality debt as easily as high-quality debt! With some simple financial engineering, investment-grade bonds were created from a pool of sub-standard mortgages as if by magic. Suddenly the vast untapped world of low-income/bad credit homebuyers (i.e., the sub-prime market) was a source of raw material for the investment-grade bonds craved by institutions the world over. *In effect, securitization of sub-prime mortgage debt allowed the funneling of effectively unlimited global capital into the U. S. housing market.*

On the packaging side, such traditional players as Fannie Mae and Freddie Mac were crowded out by more aggressive investment banks, such as Bear Sterns and Merrill Lynch. Units of non-bank companies such as General Electric and H&R Block, British Bank HSBC, and high-velocity lenders such as New Century Financial, Accredited Home Lenders, and Countrywide began contracting with thousands of independent brokers to generate a tidal wave of product. To this new breed of player, deal flow was much more important than credit analysis. And the powers that be, namely, the U.S. government and politicians, were happy to ride the sub-prime gravy train. As Alan Greenspan said in 2005: "Innovation has brought about a multitude of new products, such as sub-prime loans and niche credit programs for immigrants…With these advances in technology, lenders have taken advantage of credit scoring models and other techniques for efficiently extending credit to a broader spectrum of consumers…Where once more marginal applicants would simply have been denied credit, lenders are now able to quite efficiently judge the risk posed by individual applicants and to price that risk appropriately. These improvements have led to rapid growth in sub-prime mortgage lending …fostering constructive innovation that is both responsive to market demand and beneficial to consumers." Well said Alan! Let's just substitute "IRRATIONAL EXUBERANCE" from the tech bubble with "CONSTRUCTIVE INNOVATION" from the housing bubble—either jingle has resulted in a **massive** implosion.

ACT TWO- An Old-Fashioned Bank Run

During the mid-1920's, Wall Street attracted a sizable number of investors, many of whom as John Kenneth Galbraith observed, were "displaying an inordinate desire to get rich quickly with minimum of physical effort." The market was white hot at the start of 1929. Speculators were buying shares on margin, putting as little as 10% of their own money down and borrowing the other 90%—a fine practice as long as share prices continued to increase. (Sound familiar?) We know the outcome of this historical period – the Great Depression and the ultimate enactment of the banking reforms of 1933 and 1935.

One of these reforms provided a mechanism for banks to borrow money for operations in the event of a severe market dislocation. It gave confidence to those people who deposited money with the bank that the money was safe and available anytime that it was needed and wanted. It was authorized by Congress as a way to prevent the old-fashioned "run on the bank." Fast forward to 2007. Note that the major players in the sub-prime mortgage scenario were **non-bank** intermediaries. *These institutions were not subject to a commercial bank's safety net.*

In order to fund the mortgages KKR Financial, Countrywide, American Home Mortgage and New Century, et. al., were handing out, these institutions used the commercial paper

("CP") market. The major buyers of commercial paper are institutions who want to invest short-term cash for up to 30-90 days, pension funds with short-term cash payouts, and money market funds who want a slightly higher yield on short-term cash than they can receive from their local bank. Now these institutions that buy the CP are prudent, knowing that CP doesn't carry FDIC insurance, they want assurance that the investments are of high quality. They do this in two ways: they check the rating assigned to the CP by the rating agencies and they choose only to buy (or are mandated to buy) the highest rated paper. In absolutely the worst scenario, they ask that the CP is backed by a line of credit at a commercial bank. In this instance, the rating agencies were glad to oblige, and based on models developed by their organizations, they were able to give high ratings to the security. The issuers of the commercial paper were also prudent. They sought and received lines of credit from banks as an additional source of capital in case something happened with their issuance of CP and they also wrote into the fine print of the CP contract that the commercial paper was "extendable" in case they suffered illiquidity. Commercial paper financed most of the bubble. So what's the beef? All parties, both buyers and sellers, followed the prudent, acceptable, intelligent, tested procedures for buying and selling securities.

The beef is that the underwriting standards had become so wacky that the models used to rate the securities gave only a spurious representation of accuracy. As stated by Bob Rodiguez, the manager of *FPA Capital* and *FPA New Income*, "Given the deterioration in underwriting standards, models predicated on prior experience have little value when compared to the data of the last two or three years. In essence, one is assuming a normal distribution curve, while you have data that comes from a highly skewed distribution." To give some examples of the sub-prime mortgages granted under the deteriorating underwriting standards, there was the graduate student with an annual income of $20,000 who qualified for a $600,000 mortgage, immigrant strawberry pickers earning a combined $600 a week who borrowed $720,000, the California trailer park where each lot was worth more than $1 million, and of course, this bubble's form of day traders: the regular folk who quit their day jobs to speculate in condos. Newspapers including *The New York Times*, *The Wall Street Journal*, etc. continue to find even more examples of the egregiousness of the lending practices. This mess has been detailed quite extensively.

In a report recently issued by *First American Financial*, the following changes in underwriting standards between 1998 and 2006 have been documented, with the major changes occurring in the last two to three years:

- ARM percentage of originations rose from 0.7% to 69.5%
- Negative amortizations rose from 0% to 42.2%
- Interest only rose from 0.1% to 35.6%
- Silent seconds rose from 0.1% to 38.7%
- Low documentation rose from 57% to 79.8%
- FICO scores were essentially unchanged at an average of 706

So the rumblings in the sub-prime market, which started in February 2007, reached an earthquake vibration during the month of August 2007 as the players collectively decided that the problems may be more deep-seated and the underwriting deterioration worse than originally believed. Suddenly, all the complacent buyers of the "non-bank" commercial paper decided that they were not going to continue buying the product. The non-banks relied on the continued purchase of the CP to support their operations. When the music stopped, the non-banks realized that they did not have the safety net. They first tried to "extend" the CP according to the contract; you can imagine the surprise of the buyers who didn't read the fine print. Second, they drew down on their contracts for their credit lines. Suddenly, their borrowing costs skyrocketed. None of these events portends well for market volatility. Now RISK became the four-letter word that everyone had forgotten. We were in the middle of an old-fashioned "non-bank" run with all the attendant hysteria.

ACT THREE-Contagion of Fear

Federal Reserve Chairman Bernanke said in a speech on May 17, 2007 that: "We believe the effects of the troubles in the sub-prime sector on the broader housing market will likely be limited, and we do not expect significant spillovers from the sub-prime market to the rest of the economy or to the financial system." This optimistic assessment did not diminish or negate the events that occurred during the week of August 13, 2007. The markets needed to be reminded worldwide that big brother would help. So on Friday, August 17, the Fed cut the discount rate. It is widely expected that another 50 basis point cut will occur on September 18. Some stability was restored to the markets.

Meanwhile, HSBC's U. S. sub-prime unit took a breathtaking $8.8 billion loss on its portfolio. H&R Block's sub-prime unit has been sold. Countrywide Financial received a $2 billion cash infusion from Bank of America. New Century and American Home Mortgage are bankrupt. Surviving players are reviewing their lending standards.

In addition, it is not at all clear that we should be as optimistic as cheerleader Bernanke would want us to believe. Consider the following:

- Gary Shilling's firm estimates that home prices would have to correct between 22% and 28% to return to the equivalent of the median asking rent or to the trend line of the CPI. He believes that about 2 million too many houses are currently "out there."
- Robert Shiller of Yale believes that the real quality–adjusted existing house price index would have to correct nearly 45% to bring it back into alignment.

- Northern Trust Global Economic Research computes that the median dollar volume of single-family homes sales as a percentage of nominal GDP has averaged historically 8.4% versus 16.3% at the 2005 peak.
- A recent paper by Joshua Rosner and Joseph Mason believe that misapplied bond ratings could cause market disruptions in mortgage-backed securities and collateralized debt obligation, so that the senior levels of these structures are not as safe and secure as the rating companies have said. U. S. banks have invested as much as 10% of their assets in CDO's, as reported by the Office of the Comptroller of the Currency.
- The sub-prime meltdown so far isn't related to rate resets. More than $700 million of interest rate resets don't even occur until 2008.

EPILOGUE

The most interesting thing about the U.S. sub-prime mortgage implosion is its familiarity. Perhaps it represents capitalism at its best/worst. A financial product gets invented. Each participant in the securitization/origination process takes their ounce of payment, no one worries about the underlying credit quality since the loan will be sold, the regulators don't do anything about it, and whoever is selling it push the product until it breaks. Rating agencies take the position "any user of the information contained herein should not rely on any credit rating or other opinion contained herein in making any investment decision." As Bob Rodriguez of *FPA New Income* opines: "A rolling loan gathers no loss."

Buying securities in the capital markets, by definition, causes us to be subjected to volatility based on ***other persons'*** *mistakes of judgment.* To prevent the volatility from becoming a permanent loss of capital, Wright Associates critically, methodically, and prudently reviews the decision rules of all of the managers in the portfolio, and makes sure to the best of our ability, education and experience that these managers have not become corrupted by current events. Most worrisome in the world that we live in today is that the proliferation of complex financial products like derivatives, combined with the use of leverage to bolster returns, will inevitably mean that there will be a regular stream of market contagions like the one we're having now. We didn't own anything directly related to sub-prime securities, but we are invested, so we are going to feel the effects of the crisis until the market is re-priced to a higher level of risk aversion. We hope that you appreciate the accelerated timing of the third quarter newsletter, so that you may have a better understanding of the recent market headlines.

Sincerely,

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