Federal Deposit Insurance Corporation (FDIC)
Don’t Bet the Farm Symposium
March 10, 2011

>>RICH BROWN
Good morning and welcome to the FDIC’s L. William Seidman Center in Arlington, Virginia. My name is Rich Brown and I would like to welcome you to today’s FDIC farmland price symposium. I'm glad you could join us here in the FDIC auditorium and also on the Web with our simultaneous Webcast.

There has been a lot of talk lately about high prices for agricultural commodities and the effect that it may have on the US economy and economies around the world. There has been almost as much talk about the long term rise in US farmland prices and implications that that could have for credit quality in the years ahead. Fortunately, we're well-positioned to explore these topics this morning from several different perspectives. Our two panel discussions will include, first, a cross section of farm sector experts who will evaluate the current situation, and that will be followed by a second panel with a group of lenders who will talk about how they go about managing the unique risks involved with agricultural lending. We're also very well-positioned to explore this topic from a regulatory perspective. We'll be joined in a few minutes by FDIC Chairman Sheila Bair. She has been unavoidably delayed this morning, but in the meantime we're fortunate to have on hand a former Chairman of the FDIC, Bill Isaac. And I'm going to go ahead and introduce Bill and we'll have his remarks first and will be joined by Chairman Bair in a few moments.

I think the FDIC's steady focus on agricultural issues over the years has been in large part a result of our experience with the US farmer sector downturn of the 1980s. This episode showed what happened to farm lenders and communities when boom times turn to bust. And some of the difficult policy challenges of that era have helped to shape our approach to risk management in bank supervision in the years since. And that's why we could think of no one better to relate to you the lessons of that period and their implications for the current situation than our next speaker, former FDIC Chairman Bill Isaac. William M. Isaac was the 13th Chairman -- is that right Bill? -- of the FDIC, serving under Presidents Carter and Reagan from 1978 through 1985. As he will describe to you, this, too, was a tumultuous period that during the history of the banking industry, not only in terms of the farm crisis, but also the early stages of the S&L crisis and the insolvency of Continental Illinois, a $40 billion institution. He later founded the Secura Group, a leading financial consulting firm which was acquired in 2007 by LECG, where Mr. Isaac remained with the financial services group through earlier this year. He's a regular contributor to the *Wall Street Journal*, the *Washington Post*, the *New York Times*, the *American Banke*r, *Forbes*, and other leading publications. I almost forgot to mention that he's also Chairman of Fifth Third Bank in Cincinnati, Ohio. You can find Bill frequently in the electronic media and on the speaking circuit. I would be remiss if I didn't point out Mr. Isaac's unique and valuable contribution to the now growing literature on the lessons of the 2008 financial crisis. He is the author of *Senseless Panic, How Washington Failed America*,

available online and at fine bookstores. And this book stands out I think in the way that it recounts the inside story of the banking and S&L crises of the 1980s and applies those lessons to propose reforms in the wake of the crisis of 2008. Now, not everyone will agree with all the recommendations in the book, but after reading it I assure you everyone will know exactly where Bill stands and why on the major policy issues arising from the crisis. So please join me in welcoming to the podium Mr. William M. Isaac.
[Applause]

>>WILLIAM ISAAC
Thanks Rich, and it's really nice to be here this morning. This whole complex brings back fond memories of my days at the FDIC because we decided to buy the land here and build these buildings when I was Chairman. I thought that we needed to really upgrade the training facilities at the FDIC. This serves as a training facility for other Federal regulators as well and most, if not all, of the state banking departments and bank supervisors from around the world, so it's really a wonderful facility. I went to the dedication ceremony, and my successor made some remarks about the extravagance of it all and blamed his predecessor. But anyway, it's a marvelous facility, and every time I come here I'm amazed because it really has developed into quite a complex and important part of the training of bank supervisors from throughout the world. I was surprised Rich to hear I was 13th Chairman of the FDIC. I really never counted it – but if you say so, I'll accept that I was the 13th.

It really is a pleasure to be here and participate in this symposium on assessing the developing boom in US farmland prices. I commend the FDIC for hosting this symposium, but also for continuously providing a wealth of information to the industry and the public about the trends in the economy and the financial system. I know as I prepared for my remarks today I reviewed a number of relevant FDIC papers and articles published on these subjects. The FDIC has always prided itself on having a first-rate team of economists and academic researchers and I can attest that this tradition continues very strong-- the FDIC is producing a lot of good thinking.

I don't know if a bubble is developing in the agricultural sector or what the outcome might be. I know we have two panels of experts today who will be discussing and debating that topic. As Rich said, I have been asked to provide historical perspective on the last boom/bust cycle in the agricultural sector which occurred during my tenure at the FDIC. Shakespeare wrote, “What’s past is prologue.” Edmund Burke put it this way, “Those who don't know history are destined to repeat it.” Unfortunately, we often don't learn or we forget the lessons of history. That was all too evident in the recent financial crisis. I'm delighted the FDIC is simultaneously focused in this symposium not only on the here and now, but also on the past and the future.

Speaking of not understanding history, when I tell people I was Chairman of the FDIC during the 1980s most immediately respond, “Oh, you mean during the S&L crisis? What a difficult time that must have been.” There are a couple of big things wrong with that response, beginning with the fact that the FDIC did not supervise or insure the S&L industry. Although it did have under its watch the mutual savings bank industry which had the same characteristics and problems as the S&L’s. I would like to think it was handled a fair amount better. I think we lost less than $2 billion on the savings banks, which were comparable in size to the S&L’s, while we lost 150 billion on the S&L industry. So I think those problems could have been handled differently in the S&L industry, and they were handled differently in the savings bank industry. A more important point is that the 1980s involved enormous banking problems far more threatening to the nation’s economic well-being than the S&L crisis. The bust in the agricultural sector on which I'll focus today was an important event at the beginning of the decade. It was followed in rapid succession by a collapse of the energy sector, massive losses in the thrift sector, a serious rolling recession in the real estate sector, and the threat of widespread defaults on third world debt that could have forced the nationalization of all of our major banks. We did have standby plans in place to do just that.

Altogether during the 1980s, through 1991, some 3,000 banks and thrifts failed, including many of the largest in the country. Nine out of the ten largest in Texas, for example. The FDIC's problem list still stood at nearly 1,500 banks at the end of 1991, after 3,000 failures. The 1970s were dominated by out-of-control inflation resulting from loose fiscal and monetary policies. The Johnson Administration's decision to fight a costly war in Vietnam, while launching its great society domestic programs without increasing taxes to pay for either, set off inflationary forces worsened by overly accommodative monetary policies. The dollar declined during the 1970s, leading to sharply increased foreign demand for US agricultural products, with farm exports jumping from $7 billion in 1970 to $32 billion in 1979. By the way, whenever I use numbers here today, multiply them by about 6 to put them in perspective to today's economy. Crop prices received by farmers nearly tripled from 1970 to 1975. Net farm income during the 1970s was roughly double net income during the 1960s.

Inflated crop prices and farm incomes were reflected in rapidly increasing farmland prices. The price per acre of farmland for the nation as a whole soared by over 350 percent between 1970 and 1982. The boom in farmland prices was supported by an explosive growth in farm debt. Farmers and speculators bought more and more land and financed ever more expensive machinery to enable them to farm the new acreage more efficiently. From 1970 through 1983 total liabilities for farm businesses quadrupled from $52 billion to $207 billion. Credit was available in almost unlimited amounts. The expansion of credit was greatly enhanced by the fact that many banks base their farm loans on the collateral value of the land and machinery rather than on an analysis of projected cash flows. Farmers would finance the purchase of land with modest down payments and, after the land increased in value, would use the paper equity to borrow more money to purchase additional land.

As we learned with the recent bubble in housing prices, all good things must come to an end. The beginning of the end occurred in August 1979 when President Carter appointed Paul Volcker as Chairman of the Federal Reserve with the mandate to wring inflation out of the economy. It was an honor to serve alongside him during that period of crisis. He's a great American. Volcker attacked inflation with a vengeance, the money supply was tightened, and by 1981 the prime rate climbed to an unthinkable 21.5 percent. The impact was felt immediately throughout the economy, but particularly by businesses and individuals that were highly leveraged with debt. Farmers and speculators in farmland were the hardest hit.

I see Chairman Bair has arrived. It's an honor to be here with you today. Nice to see you. A two-year-plus -- I can stop right now if you wanted to go ahead --

>>CHAIRMAN SHEILA BAIR
No, no, no. [Laughing,]

>>WILLIAM ISAAC
A two-year-plus, very deep recession ensued, with unemployment reaching 11 percent, damping domestic demand for energy and other commodities. The dollar rose sharply, making farmland exports less competitive in world markets. Banks were limited by law on the interest rate they could pay for deposits, causing money to flee the banking system in favor of newly developed money market funds and US Treasury securities. The outflow of deposits made it even more difficult for banks to stand by farmers and other customers in their hour of need. The impact of tightening credit, high interest rates, declining exports and falling prices for crops had a devastating impact on farm income. In 1973, farm income had reached a record high of $92 billion, nearly double the $48 billion earned three years earlier. Farm income fell sharply from there to $23 billion in 1981 and only $8 billion in 1983. I mean, talk about a collapse. It was a depression in the agricultural sector. Farmland prices experienced a dramatic contraction as well. For example, after peaking in1981, farmland prices fell by up to 50 percent in states such as Missouri, Minnesota, Illinois, Nebraska, and Iowa. The deep troubles in the farm economy were reflected in the agricultural bank failures. The farm bank failure rate reached 62 in 1985, accounting for about half the nation’s bank failures that year.

The trauma of 21.5 percent interest rates, widespread foreclosures on family farms, a deep recession with unemployment reaching 11 percent, and scores of farm bank failures is difficult to describe to those who didn't live through it. The public was understandably angry and frustrated, and a good deal of the anger was directed at the government generally and at the FDIC. Tensions were very high. The FDIC's job was to take over failed banks and do its best to collect the failed bank's loans, including through foreclosures. An FDIC field office in Nebraska was fire bombed. In another case, a man walked into the Federal Reserve headquarters in Washington wearing a trench coat and sat down on the floor outside the board room on the second floor. Concealed under his trench coat he had a shotgun and dynamite strapped to his body. Try to do that today at the Fed.

This leads me back to today—also a period of great unrest and tensions. Could we be entering another major boom/bust cycle in agriculture? There's certainly some worries in trends and similarities between the 1970s and today. Government spending and deficits are growing exponentially, with seemingly little political will to address them. We fought two costly wars in Afghanistan and Iraq at the same time, and entitlement programs were careening out of control. Monetary stimulus is well beyond accommodative. The dollar is undervalued, farm exports are up, and prices are increasing for most commodities. The price of farmland was pretty stable from 1993 to 2003 but since then inflation adjusted prices have risen over 10 percent annually. There are fewer farm banks today than the 1970s and early 1980s. And they hold a smaller share of the agricultural loan market. The 100 largest banks in the country hold more than 25 percent of all agricultural loans. These banks are diversified and, therefore, less vulnerable to a significant downturn in agriculture.

I hope that all banks today are basing their lending decisions on projected cash flow analysis and not just collateral values. If there's a bubble in farmland prices, I hope the bulk of correction is borne by investors such as hedge funds and not by the banking industry. A dollar lost by an investor is a dollar. A dollar lost by a bank results in roughly $8 in lost lending capacity, which has significant economic impact at a time when we can least afford it.

Once again, I really appreciate the FDIC holding this symposium and Chairman Bair for getting out front on these issues to examine this budding systemic risk. Walter Wriston, the legendary head of Citibank during the 1970s and '80s once said, “Trouble always enters the window you're not watching.” I'm grateful that the FDIC is watching this window and hopefully many other windows because we don’t need a repeat of 2008. Thank you very much. And have a good meeting.
[Applause]

>>RICH BROWN
It looks like we have time for just two questions from the audience. Microphones are standing by, so please stand and identify yourself and ask for the microphone if you would like to pose some questions to Mr. Isaac.

>>WILLIAM ISAAC
First question is always the hardest.

>>RICH BROWN
Bill, I'll ask you a question. Coming out of the response to the farm bank problems of the 1980s, what do you think are the most important risk management improvements that you see in the banking industry in the way that risks were underwritten and managed in the early 1980s compared to the present period?

>>WILLIAM ISAAC
Well one thing I think for sure is that, as I said, I hope all banks are basing their analysis on cash flows, not on collateral values. I mean collateral values are relevant for sure but they shouldn't drive lending decisions. And I think--I hope—all banks are doing that today. They weren't during the 1970s, so that's a huge difference. I think that banks generally are paying a lot more attention to risk management; it's become a very high priority item in banks of all sizes. The agricultural sector is a highly cyclical sector. And therefore, farmers have real cash flow issues. They have to invest heavily to plant the

crops, buy the machinery, and buy the land. There's a lot of investment that goes in, and there's no return until the crops come in. And so the banks really need to be there for a period of time to help farmers, and then all the money comes back. And then the bank has got to figure out what to do with the money once it comes back. So it's a tough business to service properly. And I think banks that are heavily invested in agriculture need to have strong capital and strong liquidity, and I think they do, and then they need to figure out how to diversify risk by perhaps selling participations in loans and trying to buy participations in non-ag loans so that they have more diversification in their portfolios. I hope banks are doing those things; I believe they're doing those things. I'm hoping we will weather any crisis with minimal loss in the banking sector if there is a crisis. And I'm not predicting one. I'm just saying that there are some worrisome signs when I look at what happened in the 1970s, and I look at what's happening today. There are some worrisome signs.

>>RICH BROWN
Any other questions? With that, please join me in thanking Bill Isaac for his remarks.

[Applause]

I appreciate Mr. Isaac for taking time out of his busy schedule to be here today. I think it speaks volumes about his ongoing commitment to the risk analysis efforts at the FDIC and bank supervision in this country.

It is now my privilege to introduce to you the keynote speaker for this morning's symposium. Sheila C. Bair was sworn in as the FDIC’s 19th chairman in June 2006. She brought with her an extensive background in banking and finance in a career that has taken her from Capitol Hill to academia to the highest levels of government. Her long list of prestigious appointments is detailed for you in the bio in your packet. I won't go through them in detail. But during her time here at the FDIC she has presided over one of the most tumultuous periods in the nation's financial history. Under her leadership the FDIC has launched a series of innovative policy programs to help restore stability in the banking industry and US mortgage markets. These programs strengthened the funding base of the banking industry and through a temporary liquidity guarantee program. They shored up the cash position of the deposit insurance fund without taxpayer money and set the fund on a path toward long term financial health. In addition, these programs reduced the number of foreclosures by systematically modifying troubled loans. Her work here has also focused the FDIC on consumer protection, economic inclusion, and programs to bring underserved populations into the financial mainstream. For her efforts, she has received a number of awards, including the John F. Kennedy Profile in Courage award. She topped the Wall Street Journal’s annual 50 Women to Watch list in 2008, and was named one of Time Magazine's 100 Most Influential People in 2009. Incidentally, in both of those years Chairman Bair was named by Forbes magazine as the second most powerful woman in the world, second only to German Chancellor Angela Merkel. She has published both academic studies and educational children's books on a wide range of financial topics and, most important for today's discussion, she hails from Kansas -- where she received her bachelor's degree from the University of Kansas and her JD from

the University Of Kansas School Of Law. Please join me in welcoming FDIC Chairman Sheila Bair.
[Applause]

>>CHAIRMAN SHEILA BAIR
Thank you, Rich. And thank you for your great work, all the great work you do at the FDIC and, in particular, for organizing this very important conference this morning. And yes, generally when I'm introduced people don't mention my rural background. But I am a fifth-generation Kansan from Southeast Kansas, and still have distant relatives that farm near Parsons, Kansas, so it is very much a part of my upbringing and background which is why this conference is something that I have taken a particular interest in.

At the outset let me thank the organizers of National Agricultural Credit Committee for coordinating their meeting with us this morning. Doing so has helped to ensure that some of the nation's foremost experts in agriculture finance can participate. We do appreciate that. As we begin the symposium, I would like to say a few words about the FDIC's risk analysis activities and how they relate to the agricultural sector. I would also like to place these activities, and today's symposium, in the context of the work of the new interagency Financial Stability Oversight Council, or FSOC, that was authorized by last year's Dodd-Frank financial reform legislation.

The first thing I should discuss with you is why the FDIC has chosen to convene a risk management symposium at this time on the topic of US farmland prices. The short answer is that, while we don't see a credit problem in agriculture at this time, the steep rise in farmland prices we have seen in recent years creates the potential for agriculture credit problems sometime down the road. We'd like to avoid that. That's precisely the sort of long term risk farm operators, lenders, and regulators need to stay attuned to as we carry out our day to day businesses. Stepping back for a moment, we know that the banking industry has faced some historic credit challenges in the past few years. But agricultural lending has not been prominent among them. Since the onset of the recession in December 2007, FDIC-insured institutions have charged off just under a half a trillion dollars in loans and leases, including $125 billion in credit card loans, $90 billion in one to four family mortgage loans, $69 billion in commercial and industrial loans, and $69 billion in loans for the construction and development of real estate. Over the same period, net charge-offs and loans secured by farmland have amounted to just $573 million, that's million with an M, while charge-offs from agricultural production loans have totaled just $812 million.

To be sure, this disparity in loss experience reflects not only much lower loss rates in ag related portfolios, but also the fact that ag related loans made up under 2 percent of total industry loans and leases at year-end. But the overall size of the industry's agriculture portfolio tends to understate the importance of the farm sector to the banking industry and to local economies that depend so heavily on farming in their economy and their way of life. At year-end, more than 1,500 banks and thrifts were designated as agricultural lenders under our informal definition which includes any institution with ag related loans of 25 percent of their total loans. Together, these institutions make up 1 out of 5 FDIC insured institutions. As you might guess, farm banks are clustered in the mid section of the country, the FDIC's Kansas City, Dallas, and Chicago regions. But in rural areas that depend heavily on agriculture, even institutions that do not meet this 25 percent test for ag related loans still find that the fortunes of most of their non-farm borrowers tend to rise and fall with the ag economy. Community institutions are critically important to meeting the credit needs of businesses and household borrowers in rural areas. Because they are locally operated, community banks are in the best position to understand and respond to the unique credit needs of local farmers and small businesses in rural areas. That is why I cannot emphasize enough the importance of preserving the long tradition of community banking in America and ensuring that the future prospects of this sector are not undermined by deficiencies in risk management or an unduly burdensome regulatory process.

Recently, times have been very good in farm country. US net farm income rose 27 percent in 2010 on the strength of high commodity prices and a good harvest. Globalization is helping to improve living standards in emerging nations and, as their people begin the eat more like Americans, with more protein-based diets, demand for meat, grains, and other farm commodities is rising rapidly. US farm exports last year hit a new record of $116 billion and China became the number one importer of US farm products for the first time. The strong performance comes on the heels of a string of recent years in which inflation-adjusted earnings in the farm sector have been the highest since the 1970s. All this is good news for US farmers, but it also brings us to the topic of this morning's symposium, which is the historic increases that have been observed in average US farmland prices over the past decade. Based on data from the US Department of Agriculture, average US farmland prices have roughly doubled in the past decade in nominal terms. And have increased some 58 percent after inflation. Farmland has clearly been a preferred asset class in an era where other asset classes have stumbled as a result of the financial crisis. But for farm operators, farm lenders, financial regulators and investors, the key question is what lies ahead after this historic boom.

In considering the question, we must recognize that the farm sector has historically been associated with a significant amount of volatility. Like only a few other sectors, US farmers are subject to abrupt changes in both their level of output and price of product based on a variety of factors beyond their control, including the weather, the value of the dollar, the level of interest rates, the cost of energy, fertilizer and other inputs, foreign production, foreign demand, changes in trade policy, and changes in domestic farm programs. When these factors are generally favorable, as they are now, we see strong farm incomes and rising land prices. However, such a boom period can also give way to reversal conditions that can result in falling commodity prices, falling incomes, and falling land prices. Under such a scenario, farm operators can suddenly find it very difficult to make ends meet and service their outstanding debt. After the boom years of the 1970s, the US farm sector experienced just such a downturn that had a devastating impact on farm operators, farm lenders, and farm communities in the early to mid 1980s.

In all, almost 300 farm banks failed between 1977 and 1993. We're very pleased that Bill Isaac has been here this morning to talk about his personal accounts of that tumultuous time period. Agriculture can be a very volatile sector. The upside we have seen recently for commodity prices, farm incomes, and lend prices represents only one side of this inherent volatility. I think farmers and their bankers understand this as well as anyone. Those that experience the hard times in the 1980s know that collateral is only one of the four C's of safe and sound lending, the other three are character, capital, and most importantly, the capacity to repay. Good community lenders know more than what the price of farmland happens to be today. They also know their customers, their businesses, their track records, and their capacity to repay regardless of land price volatility. By staying focused on the long term fundamentals, community institutions ensure they will remain in a good position to help their customers in good times as well as in bad. It is also our responsibility as prudential regulators to constantly monitor developments in key industry sectors such as agriculture.

This risk monitoring function has always been a part of the FDIC's responsibility as regulators of state-chartered banks, as well as steward of the deposit insurance fund. In these roles we rely on bank examinations conducted on site by the FDIC itself as well as other state and federal regulatory agencies. These examinations not only evaluate the financial condition of the institution, but also its policies for loan underwriting, administration, as well as other risk management practices. But as we have once again learned in the recent crisis, it is equally important to monitor market conditions at the macro level and develop a clear picture of emerging risks that individual institutions may face in the months and years ahead. This is no easy task. There are many potential emerging risks in the financial system that are shaped by macroeconomic events, financial market practices, credit decisions within and outside the banking industry, and the interactions between these trends can be very complex. For example, the credit problems that arose from subprime and non-traditional lending in the recent financial crisis were generally not well anticipated in advance due to an inability to connect the seemingly disparate market trends that in the end made this so dangerous to our system. Not every emerging risk that comes onto our radar screen will ultimately develop into the type of systemic threat to financial stability that we experienced in the fall of 2008. The fact is that risks of that magnitude will be the exception, we hope, rather than the rule. That said, we all now recognize the devastating economic consequences of failing to identify and act on emerging risk in housing and mortgage markets until it was too late and our system is already hurtling toward crisis.

So it is clearly one of our primary tasks as prudential regulators to monitor a wide range of risks—large and small, near and far—to become as informed as possible as to their nature, and to be prepared as possible for the contingencies associated with them. It is in that spirit that we convene today's farmland price symposium. We believe that frequent, frank communication on these topics among regulators and with industry participants can promote understanding of risk management topics by all parties. This type of communication can help to reduce the risk of unanticipated developments that can become a threat to important segments of the financial industry or to the stability of our system as a whole. I was very pleased to see Tom Hoenig, President of the Kansas City Fed, describe some of his concerns how rising interest rates can affect farmland prices in the years ahead. We share those concerns. I'm also very pleased that a member of his staff could join us here this morning.

None of us can predict the future. But that shouldn't dissuade us as regulators from asking hard questions and articulating our concerns before a crisis is upon us while times are still good. The importance of risk monitoring and communication was recognized by Congress in the Dodd-Frank financial reform legislation. The new law authorizes the Financial Stability Oversight Council, the FSOC, to coordinate risk monitoring activities across regulatory jurisdictions on a wide range of topics. One of the primary lessons of the crisis was that not enough was done to communicate and share information across regulatory jurisdictions about the risks in mortgage lending and in complex derivative instruments based on mortgage loans that led to the crisis. In the first two FSOC principals meetings we have had some productive discussions on a wide range of risk management topics. More work along these lines is taking place at the staff level. Again, not every topic that has been identified will ultimately be deemed a threat to the stability of the financial system. But I believe we can improve the communication on these issues among regulators and between regulators and the public. These discussions are in addition to work streams we are pursuing to identify systemically important financial institutions and financial market utilities and to subject them to greater regulatory oversight and market discipline.

The task of making our system more resilient to shocks will not be accomplished overnight. But if we take this task seriously and take the initiative to investigate and respond to emerging issues before they cause large-scale damage to our financial system, I believe we can greatly enhance the stability of our system in the years ahead. So thank you very much for joining us this morning. Thank you.
[Applause]

>>RICH BROWN
Thank you Chairman Bair for taking time out of your schedule to be with us this morning, for your thoughtful opening remarks, and for your leadership during these past few challenging years in the banking industry.

As a note to all of you in attendance today and watching over the Internet, we intend to move through our entire agenda this morning without taking any organized breaks, which will take us right up to about 11:30 Eastern Time. So you're free to get up and move around as you need to but we're going to keep moving through the agenda. Our first panel this morning will get right to the heart of the matter. The first panel is entitled, “How Concerned Should We Be About Farmland Prices?” And moderating this first panel is Mr. John Anderlik, Assistant Director in the FDIC’s Division of Insurance and Research based in our Kansas City regional office. John is responsible for groups that conduct research and risk analysis on a wide range of economic and banking issues in the three FDIC regions right in the heart of the country where, as Chairman Bair described to you, the farm banks are concentrated: the FDIC Chicago region, the Kansas City region and Dallas region, which includes our Memphis area office. Now, these groups of analysts not only advise the FDIC senior management and Board of Directors on emerging risks in banking, but also provide risk management information to FDIC examiners and conduct outreach with bankers and the wider analyst community. During his 20-year FDIC career, John has been a bank examiner, a financial analyst, a regional manager, and has published special studies on regional bank performance, farmland price trends, rural depopulation, and the effect of natural disasters on banking industry performance. So, with that, I'm pleased to turn it over to our first panel and its moderator, Mr. John Anderlik.

>>JOHN ANDERLIK
Thanks, Rich, for that introduction. I'm very pleased to be moderating this morning's panel. As you can see on the screen, it's entitled "How Concerned Should We Be About Farmland Prices?" For this panel we have assembled a group of experts in the agricultural field that represent a diverse set of experiences and viewpoints. We have with us today Dr. Joseph Glauber, Chief Economist at the USDA; Dr. Brent Gloy, Associate Professor and Director of the Center for Commercial Agriculture at Purdue University; Shonda Warner, Managing Director at Chess Ag Full Harvest Partners; and Dr. Brian Briggeman, Economist with the Federal Reserve Bank of Kansas City. The way this panel will work is we will give each panelist some time to give us their remarks on topics such as the state of agriculture, how farmland prices currently correspond to market fundamentals, and how current conditions compare to those that preceded the bust of the 1980s. After all of the panelists have made their remarks, we will open up for questions from the audience.

And with that, I would like to more fully introduce our first panelist of the morning. Dr. Joseph Glauber is Chief Economist at the US Department of Agriculture. As Chief Economist, he is responsible for the department's agriculture forecasts and projections and for advising the Secretary of Agriculture on the economic implications of alternative programs, regulations, and legislative proposals. From 1992 to 2007, Dr. Glauber served as Deputy Chief Economist at the USDA. In 2007 he was named the Special Doha Agricultural Envoy at the Office of the US Trade Representative where he served as chief agricultural negotiator in the Doha talks until January 2009. In addition to his work in Doha negotiations, he served as Economic Adviser at the Blair House Agreements leading to the completion of the Uruguay Round Negotiations. He has also served as Senior Staff Economist for Agriculture, Natural Resources, and Trade at the President's Council of Academic Advisors. Dr. Glauber received his Ph.D. in Agricultural Economics from the University of Wisconsin in 1984 and holds an A.B. in Anthropology from the University of Chicago. Dr. Glauber.

>>DR. JOSEPH GLAUBER
Thanks very much—that ate up about five minutes of my time. I apologize for the long bio. It's a pleasure to be here. This is a great conference and I commend the FDIC for putting this on. I know this has been obviously a very hot topic. We have had these very, very tight markets and we have been seeing record prices for many of the commodities. I think it was mentioned earlier about record farm income, record farm exports, and we're seeing, of course, a very, very big run-up in land values over the last 5 to 10 years. My views here during the presentation I'm going to give are probably going to be at a little

higher elevation or off the ground than the experts on this panel. I'm honored to be with these people because I think they spend a lot of time looking at these land values.

I'm going to talk a little bit about some of the underlying economics. First let me show -- these are from the NASS land values survey conducted in June, where farmers were asked for their best estimate of farmland values and then some comparisons with the previous year. Obviously these are not actual transactions but you can see the big increase we have been talking about, both in nominal and in real terms. What I did here is I just took some selected data from roughly the 7th and 10th Fed Districts, but again these are NASS numbers, then I deflated them. You can see the concerns that people have when they look at that spike in the late 1970s and then look at where we are over the last five years. They have some real concerns there. What's interesting to me, in looking at the annual growth rates over the last five years, while we have seen some very, very high rates of increase annually, they are still about half the level of what we saw in the late 1970s.

As I mentioned before, we have also seen record high net cash income this year; we're now forecasting for 2011 at $98.6 billion. That's the highest in real terms since the 1970s. And I think five of the last eight years, if we look at it, when adjusting for inflation, those two are the highest net cash income since the early 1970s. So we see a very much higher cash income and a lot of volatility over the last five or seven years. We have seen some high years and then with some pretty big drops. So after a relatively flat period through the 1990s and for a lot of '80s where farm income was relatively flat, at least in real terms, we have seen more volatility since then. Here I just want to go through some quick slides. Again, the interest rate has some effect here; the higher the interest rate, the discounted stream of earnings, et cetera, is going to be lower. We expect an inverse relationship there. Again, these are aggregate numbers so I don't want to make too much of it. I think digging down as some of the people on this panel have done will give a little better picture. And here I did some crude discounts of net cash income using the real rate of interest. It's what you would expect: the positive relationship over time, with a lot of noise because I'm looking at total net cash income and the total value of real estate. But in looking forward I think the concern is what do we expect?

Here what I have is the most recent forecast for the ten-year bond rates that are put out by CBO. They are expecting some, at least adjusting for inflation, a slight rise but I think that at least compared to the 1990s they expect lower rates to continue. Similarly with net cash income, these are the USDA's baseline projections and adjusting for inflation, we show some slight drop from current levels. The record nominal income levels that we see now will start flattening, but remember the last five or ten years have been very, very good years. When we look at baseline estimates they tend to be fairly flat or show a slight rise and here at least flat in real terms. But we have seen historically and particularly over 8, 9 years a lot of volatility and I think that's a key thing to keep coming back to.

We had our outlook conference a few weeks ago, and I threw this chart up and I think it's an interesting one to consider what's gone on in agriculture over the last 60 years. Really up until the last 5 or 6 years we had seen a trend up on these prices both in nominal terms but also in real terms. And what's driving that has been farm productivity. The red line there is a unit of output per total factor inputs. And then the blue line is labor.

One explanation why we have seen a lot of people—right after World War II, the ‘50s and ‘60s and even into the ‘70s— so many people leave agriculture. It’s just to say productivity has been a big factor in that trend. There continues to be strong growth in ag productivity and that’s good. That lowers costs, makes things more efficient, and that's one reason real prices have come down. On the other hand, we have seen a pick up in demand in growth rates on world wheat and feed grains over the last several years. And you can see over the last 10, 11 years or so that we have seen some pretty big increases in demand, both for wheat and feed grains. Feed grains have been driven by biofuel production but even on the wheat side, we have been seeing increased consumption and demand worldwide. It was alluded to earlier on course grains as well that livestock production is increasing, diets are changing, and demand for protein is increasing in developing countries, particularly in Asia.

The other side is the world soybean demand. We keep making note of how China has become a major player in the world soybean market, importing some 60 percent of the total world trade in soybeans. Again diets are changing and livestock production is increasing in terms of per capita consumption. But also there are efficiencies in how livestock and poultry, et cetera, are being produced. So that’s having an effect on world demand and it has really increased demand for protein meal and a lot of people think ultimately for coarse grains as well.

Let me switch in my remaining time to talk about the fact that the good news is that one way or another the farm sector looks better compared to what it did in the early 1980s. In this slide we're looking at current real estate debt relative to the 1980s. Certainly if we look at farm debt as percent of assets, we know that it has gone down considerably. These are the aggregate numbers if you look at particular livestock specialties. Those are even lower numbers for a lot of field crops where we do see some stress and again, these figures are updated only through 2009. The ERS will update these in a few months for 2010 when they get cost production numbers in. But we know in 2009 that both hog and dairy operations went through a lot of stress so we see increases in debt during that period. And there is concern there, I think, on the finance side particularly as we move into another period of very, very tight margins.

Okay, what to conclude? Yes, farm values have risen sharply over the last five years, though I think the comparisons to late 1970s seem unfounded because they are far lower than what we saw then. We should have concerns, and that's my guess as to what will be a common theme we hear throughout today. I would think that the increases appear to be generally consistent with the rise in farm income and the low interest rates that we have seen. However, and I think this is an important point, that net income has been quite volatile over the last five years and I think that could lead to some volatility in farmland values if we see some downturn. That has to be factored in as we are looking at valuations. Again, we're looking at some rise in interest rates although it looks like a small increase, at least at this point, so I think that's certainly supportive of some of the increases that we have seen. And then the long-term factors for farming I think remain positive. We have very strong foreign demand, very strong domestic demand. Certainly if you look at the USDA baseline or others, I think we're still seeing very, very tight markets for a number of years to come and continued very strong growth in world demand.

Also, we talk about land values in the absence of the budget situation. I think we very well could see some farm programs cut that could have some effect on land values. But I think it's important to remember as well that direct payments and other payments are a much smaller portion of overall farm income these days although they may be important in local areas. And then lastly, just to reaffirm the point, I think the ag sector in general is in far better shape than the early 1980s. With that I'll close.

>>JOHN ANDERLIK
Thank you Dr. Glauber. Our next panelist today is Dr. Brent Gloy, who is an Associate Professor and Director of the Center for Commercial Agricultural at Purdue University. He also serves as Director of Research for the Center for Food and Agricultural Business. Dr. Gloy teaches and conducts research and extension programs in the areas of agricultural finance and agri-business management. The majority of his research has focused on issues related to the supply and demand for agricultural credit. Prior to arriving at Purdue, Dr. Gloy spent ten years at Cornell University where he was an Associate Professor in the Department of Applied Economics and Management. An Agricultural Economist, Brent received his M.S. and Ph.D. from Purdue University. In addition to his activities at Purdue, Brent remains involved in the family farm business in Southwestern Nebraska. Dr. Gloy.

>>DR. BRENT GLOY
Thanks John. It’s a pleasure to be here today. It's actually a nice time to talk about farmland values when they're going up and we have very strong income and favorable conditions. Now is the time when it's enjoyable to talk farmland values. What I want to convey today is just talk a little bit about where we're at and understand a little bit what the risks might be. Now, if you're like me, I would say about ten months ago you thought it probably was more likely that corn would crash through $3 a bushel before it went through $7. And turns out I was wrong and probably a lot of other people were as well. But if you put those numbers in context of say, high quality Indiana farmland, 200 bushels per acre that's a $4 swing on prices and an $800 per acre revenue swing, which is substantial. So the volatility in the agricultural marketplace today is absolutely substantial. I think the farmers I talk with are aware of it but their tone is clearly happy.

I think to set the stage I want to ask two questions. One: is it possible that land values could decline significantly 10, 20, 30, or even 40 percent over the next three to five years? And two: is there a bubble in the land market? And I think these questions are slightly different. Just a preview my answer to one is of course they could. They could be substantially higher, though, as well. So I think the financial crisis taught us one thing, that when people say markets can only go one way or the other, they're wrong. And so it's certainly possible.

The question of a bubble I think is a little bit different because it implies that the market is somehow irrational or that there's a short term structural issue that's causing prices to diverge from what anybody would think as a reasonable view of economic fundamentals. The other thing I think we have to look for is people buying or selling in panics because prices only go up or down. Farmers saying, ‘I have got to buy farmland today because if I don't in three years I won't be able to afford it. I won't be able to get into the game.’ Those kinds of things happened in the '70s. I don't think it's widely happening today. But other things that we look for, I think, are sudden liquidity crises that cause everybody to have to sell on the down side, or liquidity gluts on the front side that encourage people to take lots of risks with other people's money.

To step back for a second, before we answer this question, I think it's important to think about: why does someone buy farmland to start with? Well, farmland is a capital asset. And capital asset pricing is no great mystery. You buy a capital asset to capture its future earnings. If you can capture future earnings for a price that is less than the real value of those future earnings, you're going to do well. Now it sounds real simple. The problem is it's based on expectations and the expectations of not only future earnings but also rates and inflation which drive the present values. These are all difficult to forecast. And I think today, ten years ago maybe I was just overly confident, but I could have given you pretty high odds that I could predict corn prices plus or minus a buck. Today that's not so easy to do. Okay, I might tell you I could do that but whether I would be willing to put my own money behind it is a whole other question. I think the problem is it's very difficult to know when expectations are misinformed.

There's a wonderful book written about the agriculture credit crisis or farmland crisis of the '80s called Anatomy of an Agriculture Credit Crisis and I encourage anybody to take a look at it. It’s an outstanding book and it describes some of the conditions that led up to that. But one key points the authors make is that everybody is going to look back on this and say, ‘that was crazy, what were the guys thinking?’ It was obviously a train wreck waiting to happen but in the middle of it, it didn't feel that way. And I think, in part, because the expectations were that incomes were going to continue to grow rapidly. So when you compound this with an infinite-life asset, such as farmland, we have to forecast earnings not just for another period but multiple periods into the future. Thus you get the tendency for the capital assets to overshoot, particularly when market participants can't get into the market rapidly. Also, farmland doesn't turn over as rapidly as the stock market so these markets can overreact on both sides.

The other thing I think is important to think about, and Joe did a good job setting this up, is how we got here. If you think about it, we have had some amazing things happen, such as tremendous demand shifts in agriculture we're not used to. We don't have those very often. Today about 20 million acres of our corn crop will go to biofuels, up from less than 5 million acres ten years ago. That's a big demand shift. Also, we send about 20 million acres of the soybean crop to China in exports. Again, we shipped less than 5 million acres to China ten years ago. So substantial demand shifts have pushed prices upward, combined with the weather shock and a poor crop in the United States, you have a situation of very strong income. Layer on top of that a generally decreasing rate environment and you have the recipe for strong farmland prices.

Now this chart shows the value-to-rent multiple for average-quality Indiana farmland since 1975. You might look at this and think it's actually the price chart but it's really the value-to-rent multiple. What we see is that multiple started to climb in about 1987 after the crisis was over and today it’s reached almost 28. So not only has income increased, but people are willing to pay more for the income that land produces. That's had a powerful impact on prices. Now there's good reason why the multiple has gone up: the interest rate environment that Joe talked about earlier has been generally decreasing. And if you look at that place I have circled, that's about 1987. My colleagues in the academic literature will tell me that it's difficult to find a relationship between interest rates and farmland values empirically. But I don't think it's a complete coincidence that the multiples started to climb as interest rates declined.

Now I always tell the story that this is kind of like putting the frog in the pot and turning the heat up slowly. And I have two little girls and they don't like that story so I’ll have to come up with a different one. But I think we're cooking. Okay, so the pot is cooking very rapidly right now. Because rates are low we don't notice it, it's kind of like gaining a little bit of weight, you gain five pounds every year and you don’t notice that much and then all of a sudden you wake up one day and go whoa, what happened? And I think that's what we have going on here, and as a result prices are up as we all have seen.

So I think when you look at this, land values today reflect the current high returns in agriculture and low interest rates. I don't think they're overvalued given the conditions. I think the further increases from here are dependent on optimistic assumptions about where we're going. But that doesn't mean downward movement isn't possible and doesn't mean substantial upward movement isn't possible.

I have some thoughts on things I think tend to fuel bubbles but I want to focus your attention on the bolded one, which is widespread uncertainty about economic fundamentals and their future outlook. Combined with the market misunderstanding or mispricing risk, not being aware of full risk, uncertainty by itself is not a problem for pricing assets. The problem comes when the market doesn't understand the magnitudes of the risk that it's pricing. And so the real question then is: what factors could stimulate bubble formation in the farmland market and reduce land values from their levels?

This next slide is a risk matrix for land values over the next one to five years. On the vertical axis we have the impact on farmland values with large increases at the top, large reductions at the bottom, and then probability going across the horizontal axis from low-probability events to high-probability events. Now we can all quarrel with where I placed things on this map but I think it helps us think a little bit about some of the factors driving the farmland value market. Clearly, the China growth story played a key role in stimulating farmland prices which is over in the moderate impact, high probability area of the map. It's likely that that's going to continue. Could it not continue? It’s certainly possible. If it were to not continue I think you would find yourself over in that large reduction category on the left side of the axis, which is probably a lower probability event. But it's certainly possible.

Let's focus for a second on things I think are likely. Ag input costs rise rapidly and margins return to normal. That would probably weigh on farmland values. Now land is going to capture some of those increased margins but other inputs will also capture some of them. So I think that would tend to pull down land values a little bit.

Probably also more likely event is an increase in interest rates. One of my colleagues just says it's a question of when rates will rise and how fast. I don't like to predict interest rates; if I can do that I probably wouldn't be here today. But what I would say is any increase is going to reduce farmland values. Now one of the things I think is interesting is I can stand up here and give a persuasive argument for why they should increase substantially. And I think that increased-rates story would involve inflation, which is at the top left of the matrix, probably a low-probability event in my opinion. But if we were to get inflation in the United States it would be very, very stimulative to the farmland market. But I could also tell a bearish story and I think these risks are part of that whole event.

The reality is that we are where ag markets may not experience just one trend carrying itself out, but multiple trends moving us to the tails of the distribution. Eventually something will come along and change us, and it may change for the better, or it may change us for the worse, we don’t really know. Predicting these things is very difficult to do. I think that the risks in the farmland market today are highly non-linear. Again we're operating in the tails of the distribution. We don't get to where we're at with just one or two isolated events; it took a variety of things to get us there.

This confluence of events makes projecting income very difficult and do set the stage for bubble formation and a potential correction down the road. But not any time soon. I think if you were to ask me I think there's great uncertainty about where farmland will trade five to ten years from now. It's not clear to me today that land is dramatically overvalued, but again, that can change rapidly.

If you want more detail on some of the things I’ve talked about today we have a variety of resources on our Website. There's a live Webinar that people have found interesting that I encourage you to listen to as well as a paper we have written on the topic. Thanks for your time and I'll turn it back to you, John.

>>JOHN ANDERLIK
Thank you, Dr. Gloy. Our next panelist is Shonda Warner, who founded Chess Ag Full Harvest Partners in 2006. Chess Ag Full Harvest Partners manages the Full Harvest Agricultural Opportunity suite of funds dedicated to agricultural asset management. Prior to establishing Chess Ag, Ms. Warner was the Managing Partner of the fund of funds, Chess Capital Partners, in London between 2002 and 2006. Between 1998 and 2002 she was the Co-Managing Director and part owner of Montier Partners, another boutique fund of funds based in London. Prior to Montier, Ms. Warner spent 15 years in senior

trading roles at Goldman Sachs and Bear Stearns in financial instruments trading, and at Cargill during the beginning of her career trading grains. Ms. Warner.

>>SHONDA WARNER
Thanks so much and thanks so much for doing this. I think it's wonderful and incredibly interesting. I thought I would start for a few minutes by talking about this hot topic and how did it become a hot topic where all of us are talking about it. I can share with you a little bit back in 2006 when I decided to come full circle and come home and get back into ag. I went out to talk to people and everybody looked at me and crossed their eyes and said, "Oh, ag assets, that's really exotic isn't it?" I said, "No, it's really basic. I'm going back to the basics." They said, "We never ever thought about that. That's kind of interesting. Hmm, 8, 9, 10, 12 percent returns. That's low. That's a little boring." I said, "Well yeah, but wouldn't you be happy with that in the next ten years?" Now that's changed a lot post-2008.

So we'll sort of get started here, and talk about what we hear in the streets, listening to people and what they want. They're scared. They feel burned by Wall Street. They lack confidence in the stock market, and they're looking for diversification. Investors are looking for uncorrelated investments, right? And they want diversification again. That's what we hear over and over again that they're looking for in their portfolios. And I'm talking individuals and institutions and family offices and everybody here. There's not that much difference at the margin around what people want. They're worried about what they hear happening here in Washington with high deficits and possible ensuing inflation. I know that no forecasts show that, but when you're an investor and making investments, your job is to look out beyond what the forecasts say and see what can cause problems.

As we'll see in a minute, and I think people at this table will be able to tell you, certainly in mild-to-moderate inflation situations there is a positive correlation with ag. What will happen at the end of QE 2 when rates normalize? I'm sort of a betting person, I guess, and if you ask me, I don't spend my days forecasting interest rates but maybe they'll go down a little bit because we're in trouble but I think they're more likely up over the next three to five years than down.

There's also a lot of investments in asset classes where there's too much herd participation. I think the people felt the herd mentality coming out of 2008 where you couldn't get a bid or you wanted to put your investments in one place and there was no place to go. They want things that don't have herd mentality associated to them.

And finally, a lot of plan investors are worried about asset matching. They want coupons, they want some return, and the fixed-income market isn't providing them the return they're used to seeing.

And let me talk about who the investors are and what we see in the marketplace. While there's a huge amount of discussion right now amongst institutional investors about thinking of ag as an asset class, actually I don't think we're seeing massive participation in that sector yet. Maybe it's the tip of the iceberg and maybe we'll see more. If too much of that comes the way of ag it is in a lot of illiquid pieces; farmland in particular is particularly illiquid. And so you know when a lot of that comes our way we could be in trouble, but we're not seeing it yet. When we're out in the fields, and the streets, and the auctions, what we're seeing are a lot of individual investors. Some of those people are farmers that want that piece of land next to them. There's a huge amount of farmer buying and they're paying sweet high prices.

But the second thing we're seeing is just really shocking and I wouldn't have the guts to do it myself, quite frankly, if I didn't have background in ag. A lot of ordinary lay people, urban citizens who have a chunk of money lying around and don't want 50 basis points and they say, “Well I usually have CDs. I can clip some coupons by buying a farm, so I'm going to buy a farm.” And the really interesting thing is that I think a lot of those people are at auctions, they’re buying land, and they're really not levering too much. So that makes us kind of comfortable. But we're probably seeing more farmers and individual investors right now than we are these big scary institutions, there's lots of talk there, they may come in but they're small so far.

New ways to invest in agriculture. I know that today our topic is farmland but these other areas really impact us. Liquid investments today. You can buy ag indices and they'll go out and buy you some corn and beans and wheat and rice and cattle, whatever, and they roll on a month-to-month basis. They typically use futures to do that. I think that right now the majority of institutional investment in agricultural sector or planned investment is in these future markets. Everybody wants liquidity, and these things are liquid. And I'm sort of stressing them because I think that, in particular, is an area that can cause all of us trouble down the road. ETFs, everybody is familiar with MU and the other ETFs, there's a few long, short hedge funds out there that invest in ag equities and CTAs focus on soft commodities. Of course in the liquid investment camp there's direct farming; you can go buy a farm if you want and be a farmer, but it's pretty difficult to start from scratch. I think there's some statistic Brent or somebody will probably know exactly, but something like 85 to 90 percent of all farmers have parents that were farmers. It's a hard barrier to entry; it costs a lot of money to start. And there's a lot of knowledge there you have to acquire. You can go out and buy a farm and lease that farm out through a fund or directly. And then there's private equity. There are some great private equity funds in the market that look at food and agriculture from the full stream, sort of up and down the curve.

So now let’s talk about what investors want. How does ag fit this? And you know, like it or not, this is what people are talking about. We have some slides in a second I'll go through but farmland show returns similar to the stock market, with somewhat less standard deviation or less risk. Returns are not really correlated to the stock market or other commercial real estate markets, particularly on the downside. Inflationary period returns tend to correlate positively. So hard assets, which are not particularly subject to the vagaries of securitized-asset price inflation and are not heavily leveraged as a sector. It's a situation that pretty much no matter what happens, ultimately the returns are going to flow back to farmland. A lot of people like it because there's lots of data, so if you do statistical analysis or risk analysis you have a strong group of data, unlike a lot of financial assets you can’t get strong information from.

Large economies of scale, what is going to change? What creates opportunities? What is going on right now? There's lots of consolidation in production and costs. The single most important factor as to whether you're a successful farmer or not is how well you utilize your equipment. There is a lot of operating leverage out there. And so people are buying more farmland and they're renting more farmland to drive down their unit costs. Economies of scale, sort of the same story.

I'm going to fly through these next few slides. You can get them later on the FDIC Web site. Here are the stock market returns. Here are the returns for cropland -- non-irrigated cropland by state between 1951 and 2008. You're looking at half the return for rent, the other half from capital appreciation. Right now it shows 11.7 percent. You know everybody says it's real estate; well it's not real estate, it doesn't correlate with real estate. In fact, it correlates somewhat inversely.

Next slide -- you know 92 percent correlation to inflation is a pretty strong number. So although I would say we have never had hyperinflation in the United States, and I hope we never have it, but if we were to have hyperinflation I am not sure what will happen. How should you think about this as an investor? If you look at rent to value, 5 percent is sort of the average number. If I was looking at 2 to 3 percent, with 5 percent as average number, I would throw up some red flags. So soil, water quality, there's all sorts of suitability for non-ag benefits in there, home sites, hunting, value water minerals.

We think you can also add value by picking where to invest. Let's get to the warning bells -- that's what people are talking about. They are out there, wanting to invest, and they're investing. We're investing. What can go wrong? One of the things I think that can go wrong and that scares me and I lose sleep over is that volatility is greater than it normally would be even with supply and demand and weather issues. There is a lot going on, with supply and demand fundamentals, everything that is going on in the world, weather events that seem to be increasing in frequency, and massive futures speculation. I think people become disenchanted and they go the other way. And people need to bear that in mind because all of a sudden, grain commodities or grains themselves are extremely very, very volatile and now with this new investor interest, I think that they're going to be more volatile going forward.

So when we go out and look for land, does my land cash flow for me at a 40 percent price fall and that kind of a drop in commodity prices? If I can say yes, maybe I want to buy that. But I would encourage every single investor out there to think about it like this, and banks also should encourage your clients to think the same way. Because right now I know that a lot of places in the United States have that rent-to-value ratio of 1 or 2 percent. That doesn't leave down side protection.

The second thing is if and when institutions get into the game, if they don't really know what they are doing they might pay up for land where people who have been in the game a long time wouldn't be paying up for that land. That could cause prices to rise faster than they normally would or should. Farmers know what's going on. Farmers are aware that commodity prices are very volatile. When things run up, traditionally they have tended to run land prices up quite as much. But if a whole wall of institutional investors comes in, you should watch that space. A fast jump in interest rates or inflation could destabilize the sector.

Problems would probably be more due to operating leverage than anything, is what I worry about. I don't think that farms are leveraged anywhere near where they were in the 1970s but there's more operating leverage than ever. Input costs, people don't talk much about them. You know when corn was $2 in 2006, look where oil was. Look where it is today and look at what percentage it is of farmers' total cost to grow the crop -- it's massive.

And then finally, two that I didn't stick on there, if China backs up or has a hiccup, we're in trouble. Get out of the way. And biofuels, if Washington totally cuts everything all at once, there's room for more volatility. So while I agree with Dr. -- or Mr. Glauber and Dr. Gloy, or is it two doctors? Two doctors, sorry.

>>DR. JOSEPH GLAUBER
But we can't help you if you're sick.
[LAUGHTER]

>>SHONDA WARNER
Right now it doesn't look like there's any problem. There's a lot of volatility, and there's a lot of unrest in the world. I think that farmland is no more subject to danger than a lot of other asset classes right now. I think rising interest rates could hit a lot of different sectors very hard. But ag won't escape, so just bear that in mind when thinking about things.

>>JOHN ANDERLIK
Thank you Ms. Warner. Our final speaker on this panel is Dr. Brian Briggeman. Dr. Briggeman joined the Omaha Branch of the Federal Reserve Bank of Kansas City in January 2009 as an Economist in the Regional Affairs Department. He provides expert commentary on agricultural and rural issues to the public, media, and Bank senior officials, and provides written commentary for bank publications. As Rich Brown noted earlier, the Federal Reserve Bank of Kansas City has been out in front on the issue of high and increasing farmland values, and Dr. Briggeman's work on the topic laid much of the ground work for President Tom Hoenig's testimony before the Senate's Agricultural Committee last month. Prior to joining the Federal Reserve Bank of Kansas City, Dr. Briggeman was an Assistant Professor of Agricultural Economics at Oklahoma State University, and he has a Ph.D. in Agricultural Economics from Purdue University. He was originally from Iuka, Kansas, where his parents own and operate their family farm. Dr. Briggeman.

>>DR. BRIAN BRIGGEMAN
Well thank you very much for the opportunity today to be here and talk about farmland values. And in particular, I want to focus in on exploring the relationship between interest rates and farmland values. What we have seen with record high farmland value gains has

shot up farm wealth as well as collateral values on many agricultural loans. But we're beginning to call into question the sustainability of these gains, which is why we're all here today. In the past, interest rates played a role in shaping farmland values. Today is no different. Very low capitalization rates have boosted land values, but what happens if these cap rates begin to rise? Through a set of “what if” scenarios, I plan to walk through this with you all today and look at how farmland values might be brought down and how farm wealth could fall as well.

As Brent outlined fundamentally, you purchase farmland for its ability to generate future incomes and that's how we should think about determining its value. So these higher expected farm incomes would be expected to lift farmland values, and lower expected incomes would be expected to decrease the value of farmland. Now these economic returns are then capitalized into the value of farmland through a discount, or capitalization rate. When comparing the value of current income, future income streams need to be valued at a discount. Now the size of this discount depends on interest rates or an investor's required rate of return and that’s a primary way in which interest rates flow through and affect farmland values. So with lower interest rates we tend to see investors’ required rate of return fall, which tends to push down farmland capitalization rates, in turn lifting farmland values. Conversely, higher interest rates raise cap rates and could depress land values. Interest rates could also have an effect through farm incomes.

Now of course as Dr. Glauber pointed out, many farm incomes are shaped by global conditions for supply and demand for agricultural goods as well as global income growth that’s out there. Some of the past research in the ag economics literature has pointed to maybe a connection, at least in the short term, between interest rates and farm income. And as this research has pointed to, primarily through exchange rates as well as the costs of storing grain.

So if we look at one of the key drivers of farmland values from our net present value model of cap rates, and we plot against real interest rates, we can see there might be a relationship that pops up. For cap rates I have made a proxy of taking the cash-rent-to-land-value ratio, which I’ll proxy for cap rates. In this particular slide I have done that for the state of Nebraska, which is shown on the purple line. For real interest rates I have taken the inflation-adjusted yield on ten-year US security treasuries and plotted that out in the red line. Now if we look back in the 1980s when real interest rates rose, we saw that tending to put upward pressure on these cap rates. Now, since that time, we have seen real interest rates trend down, which has lowered an investor's required rate of return and helped contribute to pushing down these cap rates. Now today we have seen cap rates at historical low levels of around 5 percent, similar to what we saw in the 1970s, a period when real interest rates dipped into negative territory.

Another important factor for farmland values is farm income. And if we plot out real net farm incomes as shown in the blue line, relative to real, one-year US Treasury security yields in the red line, we might see a potential relationship begin to arise. In fact, we see that over time they tend to move in opposite directions. Most recently we have seen those movements occur, and part of that is we have seen these low interest rates potentially supporting these real net farm incomes. Since 2002, these real interest rates in this particular chart have averaged about 0.04 percent, which is the lowest average that we have seen since a similar period in the 1970s. Now with these very low capitalization rates and elevated farm incomes, farmland values have surged and that has occurred here recently.

The point I want to make with this graph is to show that it's not just concentrated in one particular area. We have seen it across the United States. This map looks at various Federal Reserve district land-value surveys for non-irrigated crop land values. And on a year-over-year change for the fourth quarter of 2010, we saw some of the strongest gains pop up in Midwestern non-irrigated crop land values of just over 10 percent. But if we look deeper into the western Corn Belt states of Iowa and Nebraska, we saw year-over-year gains of nearly 20 percent.

These substantial gains raise a lot of questions about their sustainability. In particular, since the land value gains have been outpacing the gains in cash rents. According to the USDA, since 2004 farmland values have surged 40 percent, which has outstripped the 17 percent gain in cash rents. This raises a question of other market forces, such as low interest rates, potentially driving some of these farmland value gains.

Let's take a look at how important these other market forces are to current crop land values. For this slide I have calculated the capitalized land value for a corn farm in Eastern Nebraska that's irrigated. Of course we can run into another type of scenario for another state or another type of ag production. And I have done that, and you still see similar types of results, but for here let’s focus on these values. We need to first come up with an expected farm income number, and as Brent pointed out that is very difficult to do. But as any good economist would, I'm going to make a few assumptions. If we look at USDA cost and production data, about 25 percent of all gross revenues generated from farmland are returned to the land owner. So we can think about a quarter of gross revenues being reinvested and capitalized into the land. If we take that percentage and then come up with a gross revenue estimate, which in this case I have assumed a corn yield of about 200 bushels per acre and corn price of $5.35 per bushel, and with those assumptions as well as Nebraska capitalization rate of 5 percent, I can arrive at a capitalized land value of $5,300. This value is pretty close to what we would expect on average land values in Eastern Nebraska for irrigated corn ground.

Now if we were to make some changes and move away from this historically low capitalization rate and move to a more historical average cap rate of 7.5 percent, we can see a steep fall in farmland values. In particular, we could see farmland values fall by a third to about $3,500 per acre. Now of course this does assume holding everything else constant. But if we keep the cap rate at that historical average cap rate of 7.5 percent, what corn price do we need in order to maintain that elevated value of $5,300 per acre? Well, following the formula we can see we would need a corn price of record highs of nearly $8 per bushel!

Now as we move down and see those corn prices fall, we would expect the capitalized value of crop land to fall as well. And if we look at a 2009 average corn price of about $4 per bushel, and at a historical average cap rate of 7.5 percent, the capitalized value of farmland would fall by half to just over $2,500 per acre. Now looking at these corn prices of $4, if we look at USDA's long term projection for corn price, they forecast in 2013 corn prices will be around $4.30. But what does this mean for a farmer? And in particular, for farm wealth? That's a point of some future research that I'm setting out on, and this slide represents some of this initial work. So if we drop values by one-third, how might that affect a farmer's balance sheet? Well, as USDA reports, agricultural real estate makes up a significant portion of a farmer's balance sheet to the tune of about 85 percent of total farm asset values. So with the decline of a third, the potential drop in farm equity could be quite significant. If we look across various types of farm households, we can see equity declines in the range of 20 to 25 percent. Of course this is a hypothetical drop. If we look at all farms, one point that comes to me when I look at that data is that according to the 2009 Agricultural Resource Management Survey, just under 70 percent of all representative farm households reported no farm debt. So a decline in wealth certainly would impair their balance sheet, but in terms of a severe traumatic event, it may not be as much.

But if we look at that other 30 percent of those farms who do have debt, you might see that landscape change a bit. In particular, we see a slightly stronger decline in those farm equity values. If we focus in then on those farms with debt and look at just various types of farm households, we can pick out other areas that we might see some stress pop up in farm loan portfolios -- in particular, those smaller farmers.

Here I have drawn the line at a million dollars of gross farm sales. And if you're below that level of gross farm sales you're defined as a small farmer. In this case we would see they have the steepest decline in farm equity of just over 25 percent. But some of my recent research looks at this, and it's more than just the change in the collateral value or balance sheet; also we need to think about their current capacity. These small farmers, based off other work I have done with the data, shows they have too much farm debt relative to farm income. We can see some stresses popping up within that particular farm type.

If we look across the farmlands landscape, we would see that the interest rate risk facing farmland values is quite high today. Most of this is channeled through farmland capitalization rates. So if we saw farmland capitalization rates return to their more historical average, farmland values could fall sharply. If such an event did occur, we could see farmers' balance sheets be impaired through the erosion of farm wealth. And those are my remarks.

>>JOHN ANDERLIK
Thank you, Dr. Briggeman. Thank you to all the panelists for their insightful remarks. Now we certainly have time in this panel for some questions from the audience and if you have a question please just raise your hand and we have folks with microphones that will come around and get to you. While you're thinking of your questions though, I would like

to pose the first question and this would be to the entire panel. I certainly appreciate your remarks and I'd love to have you back some day, so hypothetically, if I were to book all of you back for a conference of this magnitude two years from today, what do you think we'd be talking about with relation to farmland values? Would we be talking about "Wow, can you believe in the last two years we have continued to see the run ups?" Or that values moderated or how interest rates or some of these other factors have started to put some downward pressure on prices? What thoughts do you have on that type of question? Let's start with Brian. Brian what do you think?

>>DR. BRIAN BRIGGEMAN
Well I'll avoid the interest rate question first off. If you look down the road for two years, I think Brent's interest rate risk matrix outlines a lot of those risks that are out there that we face. And as Chairman Bair pointed out in her remarks, it's clearly difficult to understand primarily because of this connection agriculture now has to not only just the US macroeconomic environment but also the global environment as well. For example, looking at how China might develop. Will we continue to see strong robust livestock exports going to them and helping to support ranch values, or might that begin to shift in as they begin to modernize their livestock production facilities and pick up their demand for feed grains? We might see additional gains on the cropland side but to say where we'll be exactly in two years, the crystal ball is a bit fuzzy I guess on my end.

>>JOHN ANDERLIK
Sure. Shonda what do you think? What kind of probabilities do we have of different scenarios playing out over two years?

>>SHONDA WARNER
Okay, so I guess my job is to put both my money and my client's money where my mouth is. And so I think if you were going to put me on the spot, which I'm going to play this like you did, I'm not going to waffle around. I think that grain prices are going to be lower in two years. Provided that we don't have the long overdue Midwest drought or some other really large weather disaster. Who knows about that? I think farmland prices are probably stable to slightly lower. I think you won't ask us back John because there may be other problems in the world more pressing than agriculture two years from now.

>>JOHN ANDERLIK
What do you think Brent?

>>DR. BRENT GLOY
Professors are usually wafflers and probably I am too. But I think that on the land deal -- cropland is very likely to be higher than it is at this moment today in two years because I think that the capital asset continues to go up even if the income isn't there. I keep it going at least in the next couple of years. I would expect that incomes are going to return to normal and I think the land will keep going at least in the next couple of years.

>>JOHN ANDERLIK
And Joe, what do you think?

>>DR. JOSEPH GLAUBER
I think I'm busy in two years and I won't be able to make it. <Laughter> If you look at our baseline we expect prices to come down a little bit but I think that in real terms I guess I would expect land values to be pretty flat which could imply a slight appreciation in nominal terms. I think everyone here has pointed out all the uncertainties, however, with these estimates. Again, if you look at our baseline estimates, our projections are pretty flat and nicely monotonic, and then when you look backwards over ten years they look pretty jagged. So I think anything can happen. But I think just looking at where we are, I think that yes, I would expect short of any major production disturbances such as a drought, that I expect prices to fall a bit but real prices for land to be fairly constant.

>>JOHN ANDERLIK
Okay and I think we have a question down here.

>>HARRY GLENOS (AUDIENCE)
Harry Glenos at the OCC. Would you speak a little bit to what I have heard described as vertical integration, or kind of disaggregating of the farm production process and the kind of different tiers of business? Do you see that happening very much? And my second question is, since you talked about scale economies, what are you thinking an optimal farm size is today?

>>JOHN ANDERLIK
Who wants to take a shot at this?

>>DR. JOSEPH GLAUBER
Well in terms of integration, you see integration, particularly on the life cycle side, no question, and we have seen a lot in hogs. You know a lot of contracting issues have been emerging over that, but I guess the financing side has had issues, too, and Shonda maybe can talk about the investment side. What was the other question?

>>JOHN ANDERLIK
Economies of size and optimal farm size.

>>DR. JOSEPH GLAUBER
Optimal farm size. Yeah I'm not going to get that. I mean, there's no question that we have seen that we have seen huge changes in the average size of farms over the last several years, although I think those numbers have flattened a bit for certain types of operations. For crop operations for example, you're still seeing a little bit on beans and corn, and I think wheat as well. I think you can push it only so much with land-based things where you're seeing the concentration in scale, I think, is more on the livestock side. That's going to continue, I think.

>>DR. BRENT GLOY
I'll just comment that I think Joe's right on the vertical integration in livestock and in permanent planting to large extent. Not as much in row crops but on the economies of

size, I think that a lot of people point to that as the driver of all the consolidation. Frankly I think it's there but I think the biggest driver is management capacity as opposed to simple economies of size. The reason you're seeing these really large farms emerge is frankly because there are some people that are capable of managing those and they make money and they're very well run and they're going to continue to expand. It's not necessarily all just because they're big and therefore they're better, but there is some. But I don't see it as important as some other factors.

>>SHONDA WARNER
I agree with you. These big farms aren't really institutions, though many people say they are, but they're very successful farming families that have been farming for many generations. And they have gotten huge. And they're getting really smart. For example, the other day one hired a very prominent CFO from Wall Street and I went wow, that's really cool, look at that happen. That's management, management, management. And they're going to be very, very successful. We were just talking about pomegranates when we were having a cup of coffee before the session started, and we talked about integrating the pomegranate sort of business and buying the land and growing it and I think you're going to see more of that. And as our land in the United States does become more valuable over the medium to long term, we're going to figure out ways to use it more intelligently. Or use some of the 10 percent that doesn't get tilled for classic row crops, and we're going to think of all sorts of things because it's valuable and its going to force us to think that way. That's really exciting.

>>DR. BRIAN BRIGGEMAN
On the vertical integration side where you see it more on the crop side is within specialty crops with vegetable growers being able to sell directly through farmers markets or delivery to other neighborhoods. On the economies of scale size, to build off of Brent's comments, these larger farms that you see, they do hold a fair amount of farm debt that is out there if you look at the data. Roughly 30 percent of the farm debt that is out there is held by these large farmers. But they have ample incomes in which to repay on that debt. You look at their repayment capacity measures and their ability to service that debt, and it's quite strong. Now, could all that change? If we saw core prices fall or lifestyle prices fall, of course, of course that could change. But looking at some of the data right now they appear well suited to be able to service that debt.

>>JOHN ANDERLIK
We have a question down here. And then we'll get back here.

>>DAN O'NEILL (AUDIENCE)
Yeah, Dan O'Neill with Met Life Ag Investments in Overland Park, Kansas. How big of a factor do you think the regulatory environment is in all this? I mean one thing I worry about is you know we are seeing our borrowers have the topside of the balance sheet stronger than it has been in many years and we like that and we want it. But if I'm a farmer right now, I think I would be careful about being too vulnerable to any lending institution in this period of volatility. And I worry a little bit about as we see this volatility going forward. How are the regulatory institutions going to react and what are

they going to force the banks to do? Because that of course was one of the big problems in the ‘80s, right? We saw things fail. We saw operations fail that didn't need to fail but for the fact that their lending institutions didn't have the capacity to hang with them. Is that a concern to anybody?

>>DR. BRENT GLOY
I'll take a stab at that. I think yes, the response if there is a hiccup is very important, and the credit providers can exacerbate problems. That’s why I was talking about a structural issue that forces a sudden liquidity crisis, where bunches of properties go on the market, that makes the situation worse. Now the good thing is we're here today. As I said, times are really good but we’re talking about it already, so hopefully we're not too free wheeling with credit. But you all know in your business there are going to be people out there that are going to push the envelope. And how willing lenders are to participate in this because there's equity in the farm sector and there's a tremendous amount of earnings right now in the farm sector that could get levered more than it should. And the one thing I liked about the credit crisis book is it made the point that it wasn't that many farms that really failed when you looked at it. It was commercial farms that got over leveraged and there weren't really that many but it was enough that they caused a huge snowball effect and turned the situation into a credit crisis. So yes, I would be concerned about that. But I'm glad we're here today talking about the issues when it's still easy.

>>SHONDA WARNER
If I were a bank today I would write up some little algorithm that said as you see USDA returns - which come out every August for the preceding year - as you see the USDA returns outpace the average - so you had 10 percent the last year or so outpace the average - I would up what I require people to put down. You know because your risk is increasing there. Because you know you're going to probably have some mean reversion at some point in time. I mean I think there are lots of things people can do to protect themselves as the market is on fire, to tamp out that fire.

>>DR. BRIAN BRIGGEMAN
From our perspective, this is something that is talked about within the Bank as well as with District bankers. We have discussions of well, what's the debt, where is it going, what is the leverage position? I think a lot of it for our District goes back to the 1980s and President Hoenig’s experience when he was going through the crisis with the Bank on the supervision side and how difficult it was to go in and close ag banks within our District. So it is certainly something we're beginning to have these discussions and talking about very frequently.

>>JOHN ANDERLIK
And from the FDIC’s perspective, Chairman Bair laid out some thoughts but we're not looking to overreact to this issue. We’re holding this symposium to make sure we get all the facts and get the experts’ opinions on the issue. We have recently issued a financial institution letter and wrote a Supervisory Insights Journal article that just is meant to remind bankers of the sound practices behind agriculture. We certainly don't want to see a return to the 1980s, and we haven't seen it so far. The fact is so far the run up in prices

has not been credit driven; our commercial banks have really held a tight line on loan-to-value ratios and cash flow analysis. And our message to them is to remain vigilant and continue to do those things. And we'll just continue to monitor the situation.

>>MALE SPEAKER (AUDIENCE)
I have two questions. Everyone on panel spoke about rate risk, which is quite high, and Brian you spoke a lot about what would happen were rates to rise. Have you done any research, or has anyone done any research, or can anyone speak to trends between the spread between cap rates and rates in the market, Treasury bills or other instruments, and what that trend has been and what volatility in that spread has looked like over time? And the second question is around demand. Everyone talked a little bit about ethanol. If we remain in an environment in which demand continues to grow and supply remains tight, is anybody willing to speak to the probability that there's a policy response to that which de-emphasizes ethanol?

>>JOHN ANDERLIK
What do we think?

>>DR. JOSEPH GLAUBER
I'll take a shot at the second part of that. People who know the first can answer the first part far better than I. With ethanol, one, there are couple of constraints on ethanol production currently. We are rapidly approaching the mandated levels under the RFS. Now we're also producing about a billion gallons above RFS right now and we also have a blend wall issue that limits ethanol production. I don't want to get into sort of the hypotheticals on what would happen with a short crop or that sort of thing, although clearly we look at all that stuff every year. But right now if you look at the ethanol industry, the mandates clearly aren't binding. We're producing above that. And if you look at the profits, at least on the margins, even with these high corn prices there's a big difference between now and 2008 when people really were caught with the squeeze with the high prices. I think a lot of operations are getting very smart financial advice in terms of pricing on forward grain and are in much better position. But the fact is I think when you look at that, these guys are still making profits producing ethanol. And as long as ethanol is trading at a discount to gasoline, the energy content notwithstanding, I think that 10 percent level doesn't figure much in terms of blending decision. There are incentives to blend ethanol and there are incentives to produce it. So what happens in the event of elimination of the blender credit? Well, Congress is certainly considering that and it only remains in effect until the end of the year. I think right now, given current situation, you'll still be making ethanol. Now will that change if there was a little more volatility in corn prices and oil prices? It's a very different question if you have $80 oil or $75 oil than if you have $110 oil, and right now I think most people are looking at $100 level certainly more than they are prices falling. I think all that is positive for ethanol production.

>>JOHN ANDERLIK
I think we have time more one more question. If we have one more question out there.

>>JARET SEIBERG (AUDIENCE)
Yeah hi, Jaret Seiberg with Washington Research Group. You know there is always a talk of sort of the Holy Grail out there is switch grass as a source for grading ethanol. And if that were to happen that could dramatically reduce the use of corn for ethanol. And that would seem to be a shock to the system and I didn't really hear anyone talk about that. How concerned should we – would we be if that demand suddenly disappeared and what could that do to farmland prices?

>>SHONDA WARNER
Well a lot of people would be growing switch grass and that takes farmland. If that were to happen with switch grass or mustard grass or whatever, we have to get to commercially profitable viability and that's going to take a long time. I'm talking 5 to 10 years at least before you could really do it. So maybe you know we'll eventually get there and maybe somebody will need our corn for something else by then. Who knows, but it's a fair ways out. So it's an issue but not a big looming one, I think.

>>DR. BRENT GLOY
Yeah I would echo that. I think that maybe it's even longer than five years out. It probably would be stimulative ultimately to farmland buyers because if you think how profitable that would have to be to be implemented and drag an entire supply chain that doesn't exist along with it into adoption, it's going to have to be very profitable to make all of that network actually happen. So if it were to happen I think it would be in the long term a great situation for farmland. But it's a ways off, in my opinion.

>>DR. JOSEPH GLAUBER
And understand it's not going to substitute for corn based ethanol. It's going to be additive to corn-based ethanol under the renewable fuel standard. There's essentially up to 15 billion gallons to meet renewable standard that can be made by corn-based ethanol. Above and beyond that, you have additional specific targets for cellulosic based ethanol, and advanced biofuels. But I don't think anyone is envisioning the future of switch grass taking the place of the 15 billion gallons that is currently being occupied by corn. I think it's all looking at additionally and again the viability of it when it comes online when it's actually profitable. I think it's still a little ways down the road.

>>JOHN ANDERLIK
Alright, with that I think our time is up. Panelists, I thank you very much.
[Applause]

>>RICH BROWN
I would like to thank the first panel for a terrific discussion. I can't imagine a more well-informed or well-rounded discussion of the current situation. We're now ready to assemble our second panel of the morning taking the logical conclusion of this issue: "How Are Lenders and Operators Managing Potential Risks?" As you heard from Chairman Bair and former Chairman Bill Isaac, FDIC is in the business of promoting financial stability through effective regulation. However, in the end, it's decision makers in the private sector that must manage business risks so that our economy is able to move

forward. So our second panel this morning, now assembling, will feature three such private sector decision makers to talk about how they go about this difficult and important task. Moderating our second panel will be another one of my distinguished FDIC colleagues, Mr. Richard D. Cofer, Jr. Rich Cofer is Regional Manager for the FDIC's Division of Insurance and Research in the Corporation's Kansas City Regional Office. He heads a 6 person team that analyzes economic conditions and emerging risks for the FDIC's senior management and our Board of Directors, and also conducts extensive outreach on these issues with bankers and the wider analyst community. Now, the Kansas City regional office has long been the central hub of the FDIC's research effort on agricultural issues, helping to make the FDIC a thought leader on issues such as the effects of rural depopulation on the banking industry. Rich is a 21-year veteran of the FDIC, serving first as Bank Examiner then Senior Financial Analyst before being named Regional Manager in 2008. And with that, I'm pleased to turn it over to Rich Cofer.

>>RICH COFER
Thank you Rich for that nice introduction. As Rich said I'm in the FDIC's Kansas City Region that includes the seven states from North Dakota south to Kansas and from Minnesota south to Missouri. There are a little more than 1,800 institutions in those seven states and roughly half of those are considered farm banks. Because agriculture is so important in my region, I have carefully listened to the speakers we have had before us this morning, and I'm very anxious to hear from the panelists up here on the stage with me. To my left are Matt Williams, Ken Keegan and Jim Farrell. Each of these gentlemen has made a very successful career in agriculture as operators, lenders and farm managers. The approach of this panel will be a more on-the-ground discussion about farmland prices and agriculture and will draw from their practical experiences. Let me tell you a little bit of background on each of these individuals.

To my immediate left is Matt Williams. Matt is a fourth-generation banker and is Chairman and President of the family-owned Gothenburg State Bank. Gothenburg State Bank is a $110 million community bank and farm bank located in Gothenburg, Nebraska. Matt currently serves as Vice Chairman of the American Bankers Association and also serves on the ABA Board. He is also one of 14 bankers serving on the FDIC Advisory Committee on Community Banking.

To Matt's left is Ken Keegan. Ken Keegan is the Senior Vice President and Chief Risk Officer of Farm Credit Services of America in Omaha, Nebraska. Ken has over 29 years of experience in the Farm Credit System. Prior to joining Farm Credit Services of America, Ken was with Farm Credit Services of Mid-America in Louisville, Kentucky. Ken was raised on a family farm in Southern Ohio and earned a bachelor's degree in agricultural economics from Ohio State University.

To Ken's left is Jim Farrell. Jim has served as President and CEO of Farmer's National Company in Omaha, Nebraska since 2004 and also serves as Chairman of the Board. Jim currently serves as Chairman of the Board of Directors of the Federal Reserve Bank of Kansas City's Omaha Branch office. Jim is an accredited farm manager and serves on the Editorial Board for AGRA Marketing Magazine. Jim grew up on and operated a family grain and livestock farm in Northwest Iowa. He holds a bachelor's degree from Iowa State University.

Before I open the panel up to questions, I wonder if each of you might take some time and tell us about yourself and your organization and maybe give us your quick take on farmland prices and any reactions that you might have from the previous comments made here this morning. Matt we will start with you.

>>MATTHEW WILLIAMS
Sure. Thank you Rich, it’s a pleasure to be here today. I appreciate Chairman Bair's interest in this topic. I think it is important that we weigh this risk and of course that's what we do in banking is manage risk. You might have picked up from the introductions that each one of us on this panel has a Nebraska influence. And of course, we are all intellectually challenged in Nebraska! You know that the large red “N” on the side of the helmet that we wear stands for knowledge. I'm glad you laughed at that; my wife never laughs at that joke. I was asked earlier this morning when I arrived whether I thought “Don't Bet the Farm” was too provocative or not. I guess I would change that topic a little bit and maybe call this, “It’s not your grandfather's farm and grandpa isn't running the bank anymore” even though I'm a proud grandpa. Banking and farming have changed significantly. And I was reminded with Chairman Isaac’s remarks this morning for those of us in this room that lived through the 1980s, those were really challenging times. I can remember in our small town going to church or to the ball game on Friday night and sitting next to the person that we had begun foreclosure on. We made a pledge in our bank not to repeat those sins that we created back then and we won't, and that's spoken with experience. I think I represent the only institution here that is actually insured by the FDIC, and I want to assure you that I also have skin in this game. Our family has owned our bank since it was started over a hundred years ago and my family has also been involved in production agriculture since the 1890s.

The one group that is not represented here today on the panels is actually agriculture producers themselves. Although we have done a great deal in banking to mitigate and manage risk, agriculture producers have done that also. The typical agriculture producer we're talking about today is a far cry from what an agriculture producer was in the 1980s. As you heard from the earlier presenters this morning, leverage ratios have declined. The USDA showed that farm debt declined from 2009 to 2010 and the USDA is predicting a very slight increase in 2011. I am uncertain where that increase will happen; our agriculture borrowers have done very well recently and are starting this year using a lot of their own money. We have also seen a decline in the average age of agriculture producers. The average age now is 51. The typical agriculture producer is a highly educated businessman that is looking at the business differently than his predecessors. To help producers mitigate risks, we have seen substantial changes in precision agriculture, agronomy, and biotechnology. All of these things help them monitor and measure the risk that they are undertaking.

There have also been analytical tools advanced to help them. Analytical tools that we as bankers use to look at and measure, those things that help them not only measure cash flow and balance sheet changes, but also tools that measure and monitor chemical use, herbicide use, pesticide use, and of course the ever precious water use.

I would also mention that marketing of commodities has changed significantly over the past 30 years as well. The average farmer in 1980 planted his crop in the spring, harvested it in the fall and then sold it. Typically, marketing is now done on a year-round basis. It’s done by using puts, calls, and other methods of forward contracting that reduce the risk and reduce the volatility. There is much discussion about input costs and their volatility, but there again farmers have the ability today to lock in many of those costs they did not or could not do in the 1980s. And one of the most major changes that we have seen in mitigating risk is the advent of today’s crop insurance. The revenue production crop insurance that we see our producers use today was not even available until the late 1990s.

All-in-all though, the one thing that I think has been the most significant change in agriculture has been a philosophical change. If I asked an agriculture producer at our bank in 1980, “Why do you choose to farm?” the typical response would be that “I have always farmed. I don't know how to do anything else and I feel it's my privilege to be able to continue farming.” If I asked an agriculture producer today “Why do you farm?” the answer would be much different. That producer today says, “I went to school to be a farmer. I have earned a degree in agricultural economics. Farming is a sophisticated, complicated business that challenges me and it challenges me to make money.”

The same changes that we have seen in agriculture have also happened in banking. I have said it's not grandpa running the bank anymore. The banking industry has taken the challenges of the 1980s and redesigned the products that we offer to our customers. We heard Chairman Isaac talk about it first thing this morning. In the 1970s and leading into the 1980s, we were collateral-based lenders and we were also pretty good judges of character. The 1980s proved to us that there were more C’s in that formula.

And today we have the analytical tools and the ability to also monitor the capacity and the cash flows that are necessary to make better decisions. Gothenburg State Bank is a small ag bank geographically located in the center of Nebraska. We have five ag lenders, but they are different today than they were in the 1970s and 1980s. Each one of our lenders has a degree in banking or agricultural economics. They also are all graduates or working towards becoming graduates from one of the graduate schools of banking, in our case either Colorado or Wisconsin. We also use analytical tools today that are completely different. There's a product out there that is widely used in rural banking offered by an Omaha-based company, Web Equity Solutions, that allows us to not only spread balance sheets and income statements, but also allows us to rate-shock those statements into the future.

One of the other things that I'm also very proud of with ag financing is that we haven't created crazy financial products. We keep it simple; maybe that's what we need to do to be an ag banker. We haven't created subprime lending; we haven't created all kinds of instruments such as interest-only loans that separate any discussion of ag land real estate versus those discussions of commercial real estate and residential real estate.

Another thing we have become really good at is saying no. And that sounds simple sitting here in front of this group, but that can oftentimes be the best thing a banker does is say no. The other thing that has changed is regulatory oversight. I know not all agree with me, but I am one that promotes and significantly appreciates the fact that the FDIC and the other regulatory authorities are paying attention to this topic, and they assist us with our ability to look at risk and manage it into the future.

I think there's a very bright future, Rich, but I think the ultimate question when we get down to it is a question of monitoring risk. The ultimate question that I ask my board of directors is what is the result if land prices would drop by one-third or more as Brian (Briggeman) discussed? Now the FDIC would tell you that that is shock testing, and that's a term you guys really like. I term it prudent banking because I think that is what is necessary for us as bankers to do. Now what's the answer to that question? Well in our bank, if farmland prices dropped 40 percent we would see a significant drop in the balance sheet net worth of a number of borrowers, but it would ultimately have little or no effect on the quality of our loans. You might ask why? The reason is because we have stayed with very fundamental and conservative underwriting standards leading up to this period of time. Our basic standard is 60 percent loan-to-value.

Beyond that as real estate in our areas has increased to $5,000 an acre, we still use $3,500 for balance sheet comparison and analysis and underwriting. So from our standpoint it's an interesting topic, one that needs to be looked at and weighed but I think the future of agriculture is bright. And I'll pass it on to the other panelists with that.

>>RICH COFER
Okay, thank you very much, Matt. Ken.

>>KENNETH J. KEEGAN
Thank you Matt and Rich and thanks to the FDIC for the opportunity to be part of this symposium and discussion of this important topic that we are dealing with on a day-to-day basis. I’ll first talk about our organization and then I’ll shift specifically to some risk management strategies that we have deployed in the last several years to help manage this volatile environment that we find ourselves in. Farm Credit Services of America is a financial cooperative that serves farmers and ranchers, agribusinesses, and rural residences primarily in the four states of Nebraska, Iowa, South Dakota, and Wyoming. Brian’s comments and slide showing the land value increases in Nebraska and Iowa, and even South Dakota and Wyoming puts us pretty close to the epicenter of some of what we are seeing in farmland movement. Our regulator frequently reminds me, “Ken, you're pretty close to the epicenter of this event; what are you doing to manage risk?” So I'll talk about some of that in a minute. We serve over 80,000 customers in our cooperative, and those 80,000 members are also owners of our company. They're represented by 17 members on our Board of Directors, elected out of that 80,000 stockholder membership.

We employ 1,100 employees across our four states and they're deployed in 42 office locations in many rural communities across the four states that we serve.

We have been very focused on the question that the gentleman asked earlier from Met Life about whether institutions are fundamentally sound to be able to withstand the volatility and bring capacity to the marketplace that this ag industry requires. We are very focused on our financial position in order to be a dependable source of credit and financial services for our customers. Today, we hold $2.6 billion of capital on our balance sheet. That equates to approximately 14 percent permanent capital. Is that enough in this period of volatility? As we look at the risk of the industries and the customers we're serving it causes us to ask the question, is that enough capital? We're having these types of discussions frequently. We also have been very focused on making sure that we generate adequate earnings on those assets. In 2010, we generated over $400 million in net income on our asset base of $15.6 billion. That level of profitability allows us to build capital for the future; it also allows us to distribute cash dividends back to our 80,000 customer members. And since 2004, we have distributed about $425 million of cash back to our customers. And as you think about the four states where we operate, that's a significant positive influence on the rural communities where our customers operate.

We're part of the Farm Credit System, a broader network of borrower-owned lending institutions and specialized service organizations. The system as a whole offers about $170 billion of capital to farmers, ranchers and others in rural America. It's a significant part of the debt capital that's available to fund the agricultural industry.

So I'll close with a few specific remarks about risk management in our company. It starts with our lending philosophy. Matt, I appreciate your comments; we have leadership that also have been here through the 1980s, have deep experience and bring forth that in the philosophy of how we lend in the industry. Our philosophy has been in place frankly for over 12 years, has been very consistent and has served us well as we have navigated the volatility of agriculture. And that philosophy is somewhat simple. We want to provide financing to operations that have sustained profitability, integrity, and the ability to withstand industry risks.

While that sounds simple, there is a lot that goes into finding the right customer relationship that brings forth those attributes. But it has enabled us to fulfill a commitment that we have to the industry which is to be a very trustworthy and dependable lender that is conservative in good times like we find ourselves in now so that we're able to be very courageous when times are tough. And that hasn't been long ago. We have dealt with cyclical downturns in both the swine and dairy industries as well as the renewable fuels industry. We must be prudent in our lending in order to be courageous during those tough periods of time so that our customers know that we're with them through thick and thin.

Our CEO, Doug Stark, formerly was our Chief Credit Officer and he often says to me, “Ken, don’t lose sight of the fact that the real risk in these portfolios are built in times like this. It's during the good times when you can make mistakes.” And so his message is one of being cautious and conservative so that we're able to be very dependable through tough cycles of agriculture. A couple of specific actions we have taken since this volatile period has emerged. First, we have implemented what is called the sustainable value lending methodology. It's where we look at what is a long term sustainable margin for our crop producers. We use outside resources to help us make decisions and capitalize that value into a sustainable value, not necessarily a market value.

From that, we decide our maximum loan we will write on that sustainable value, and our current maximum is 65 percent. The reality is if you think about specific locations, let's pick Northwest Iowa; it's not unheard of to see the best quality farmland selling for $9,000 an acre and higher. Our sustainable value would only allow us a maximum of $4,800 per acre in that environment. So it causes producers to make some tough choices about if they want to execute that transaction. They must bring more cash or equity to the table in order to have that lending relationship with us. And we do that intentionally because we think in this period of widening margins for our producers that they need to recognize that this is a great opportunity right now but that it's not going to be here forever. We want to make sure we don't become irrational in our decision making.

We have adjusted our underwriting guidelines and standards to reflect the volatile environment. And those generally show up in increased expectation for greater working capital and liquidity in the balance sheet, stronger levels of owner's equity, strong levels of repayment capacity, and then certainly the collateral decision.

We're utilizing risk-based pricing. And I will tell you that has become an important part of pricing our products in the market to make sure that we're getting an adequate return for the risk variables in the equation. And that's different. I would say as recently as six or seven years ago we didn't see as much differentiation in price for risk; today, I think we're doing a better job.

We have a dedicated risk management team that conducts stress testing. I think regulators use the term shock-testing, and it can feel like a shock when we do it. Scenario plannings are all part of our portfolio management processes. We're also utilizing economic capital models and tools to help us make sure we're allocating the right amount of capital to the right level of risks in our portfolios.

About 75 percent of our current growth comes from existing customers. So as we think about serving those existing customers we have a depth of relationship that tells us a lot about their performance. As we bring on new customers in the organization we do a lot to make sure we align our choices in terms of lending relationships that fit that credit philosophy that I mentioned earlier.

And finally, we have a 55-person specialized team of valuation experts that utilize robust sales databases as well as proprietary technology and tools to value and monitor farmland values. We feel like we're getting real time information to help us make good decisions from a risk management strategy in our company. So with those comments, I'll close.

>>RICH COFER
Alright, thank you Ken. Jim.

>>JIM FARRELL
Thanks Rich. I get the pleasure of being the last presenter today and as such, I was thinking about everything that had been said this morning. And there were a lot of interesting comments today. I'm old enough that I graduated college in 1976 and lived through the 1980s that we have talked about a lot today. Bill Isaac's memories were kind of interesting, very interesting actually. I was a farm credit borrower in the late seventies and into the early eighties, and I found his comparison to the seventies a little sobering, I guess, when he took a step back and took a look at the comparison of what's going on in the economy, not what's going on in agriculture.

I found it very interesting those comparisons—from the deficit spending, entitlements out of control, the great war expense we had at that point in time, the lower dollar value which I remember increasing exports, and the value of cropland was going up substantially. I remember my dad cash renting a farm in 1973 across the road from where we lived for $40 an acre. And I think it was 1974, my years might not be quite right, but I think it was 1974 that the rent went to $80 and 1975 it went to $100. And that was just unreal. My dad quit raising cattle that year because he said he had made too much money in cattle to lose it all in one year as feeders had gone up close to $500 and so on.

So those things are all kind of rolling through my mind this morning as I listen to the recap of the 1970s. I also found very interesting Chairman Bair's comments about extreme volatility in agriculture. That's something we try to look at in our company as we take a look at what is going on and look back on our experiences. My management team is mostly about the same vintage as I am. Sometimes that's good and sometimes that's bad because we have a tendency to remember things that maybe make us too conservative, but we look at things conservatively.

Let me give you a little background on our company; I know many of you in the room, but I know there are some I do not. We're located in Omaha, Nebraska. Our company was founded in November of 1929, interestingly enough, which was of course during the Great Depression. Our company today manages farms for absentee or non-operating land owners; primarily, these are folks who inherited it, but we also have investors that we manage for. We manage about 5,000 farms today in 24 states or about 2.5 million acres. We also sell farms, and we'll sell about 650 farms a year. That's what we sold last year, or about $330 million in real estate last year. Approximately 197 of those sales were auctions. So my perspective on the land market is pretty close as far as what's going on.

We have an appraisal business within our shop as well, and we have 17 appraisers on staff. We diversified in the early 2000s into the oil and gas business kind of thinking at that point that maybe the two wouldn't track identically. However, they have, interestingly enough. We manage about 70,000 oil and gas interests today in 36 states out of our offices in Tulsa.

We also offer farm related insurance products including revenue products among some other lines of business we have, but we're focused on land and landowner related services.

I thought I would cover just a couple of basics today. There was some discussion about who is buying land and who is selling land and I thought that I would add to the discussion. The non-operating land owner is the primary seller of farmland today. While there are farm operators that sell land, they are few and generally they are selling to consolidate. Even retired farmers generally don't sell the farm; they may, but generally they don't. So of the farms that we sell, over 90 percent would be non-operating land owners, most of who are over the age of 65 and are inheritors of the land. There's also going to be a high percentage of multiple owners. And they grew up on it or perhaps purchased the farm next door but that's commonly their connection to it.

We have seen a real sharp drop in the number of folks wanting to sell their land. Over the last 24 months, about 40 percent fewer of our clients are selling land today compared to what we saw on average the previous eight years. Monetary policy, and uncertainty about the economy are both affecting those decisions as well as concern about inflation.

From a monetary perspective, there is nowhere that land owners feel comfortable putting the money if they did sell the farm. The farm is showing a better return than their alternatives so they're hanging on to the farm. And so people that typically were selling in past years currently are not, and that's created a little bit of a sellers’ market in farm real estate. We have many more buyers than we have sellers due in part to that reluctance to sell.

On the land buyers side about 75 percent of the land we sold is to farm operators who live in the local area. The local area is broader than it was in the past; it might be 20 to 30 miles. Twenty-five percent of farm land is sold to investors and I agree with comments made on the first panel, that there's not a large influx of the large fund investors, but there are some. Of the 25 percent of land we see going to investors through our shop, about half of that is going to that non-operating land owner who is buying add-on pieces to what they already own or maybe going back to the area where they were raised and buying another farm. So maybe 10 to 12 percent of land sales we're seeing are to what might be a new investor, someone who is not familiar with agriculture, that didn't grow up in the area, and who doesn’t otherwise have a connection to the land.

We saw a lot of interest in the mid 1980s from that same group of folks, people calling up asking how to buy farmland by the foot, by the pound, and so on. I remember those calls when we came off the last ag crisis. The difference now is that we have substantial companies and individual investors that are buying. They are putting together portfolios and they are performing on it, which we didn't see nearly as much of during the 1980s. There was some but it is much more prevalent today.

The cap rate was mentioned earlier; it was 5 percent that was required two years ago. In the mid 1980s, we managed a portfolio for Morgan Stanley and they required 7 percent before they would buy. Today, it's hard to get in parts of the Midwest a 3.5 to 3.75 percent cap rate.

Another phenomenon that we have observed in our appraisals, and I would imagine that Ken could tell us the same thing, is that a third to a half of the land that's trading is trading quietly and is trading below market. Nobody knows it traded unless you're an appraiser and you're digging in the courthouse and you find the records. These are arms-length transactions and are not necessarily father selling to son, and the similar. A lot of non-operator owners, which as a group own over half the farmland, aren't well versed with current land values, and when somebody calls and makes them a purchase offer, they're selling the land and they are selling it kind of quietly. And so there's a fair amount of transaction going on underneath what we might typically consider the market when we're selling land by auction or private treaty.

Regarding risk management, and I'll wrap up here on a couple of comments on risk management, the commodity marketing that was mentioned earlier is something I think that most farmers are trying to utilize better today than they did in the past. They are being more aggressive in selling into the markets. We're currently fairly well sold out of our 2010 crops for our clients. We have sold a sizeable portion of our 2011 crops as well and we have some clients that have even sold 2012 and we have farm operators that are following much of the same patterns looking forward trying to put an income stream together on these high prices. And that's been difficult at times in this market; I have had clients call me that are upset with me because we sold their corn at $4.50 a bushel. You know $4.50 is not a bad price for most of us, but when corn is a fix, those decisions get really tough.

When I joined Farmer's National about 8 percent of our leases were cash rent. Today, 43 percent of our leases are cash rent. And so there is substantial shift of risk, if you will, from some sort of a shared environment to the farm operator. And that's often driven at the farm operator's request. That's not been driven at our request. About 39 percent of our leases are crop share of our farms and 18 percent are custom.

Crop share leases are quietly disappearing, and the customs are increasing where we hire the work done to put the crop in. On the cash rents, we collect nearly all of them up front which is a risk management tool for us because we oftentimes can't perfect our liens well enough on the second half of the cash rent to protect our client's interest. We have seen a lot of variable rate cash rent come to the market. It's becoming more prevalent to use crop insurance as a formula where you take a ten-year average yield and you build some sort of a factor from that ten-year average yield considering the current crop price that's protected by crop insurance, which was announced about a week ago or so and which I think is $6.02 or $6.04 for corn. Looking at the fall price and doing a formula based on that, if your yield is above your average, you have a factor that creates more cash rent and if you have a poor yield, the farm operator has some protection.

We're also seeing blended share leases in the market, although not as many as I thought we might. We started to see a push for more blended shares and share crops again in

2008, but not much since then. Times have been good and farmers continue to want to cash rent. The blended shares is where the owner of the farm pays for the seed, fertilizer, and herbicide, and the operator provides or pays for all the labor and machinery and then they split the crop, but not 50/50, it's a higher percentage to the owner.

We also see the revenue insurance product as a really great tool that was not available in the late 1970s and early 1980s. Multi-peril doesn't hold a candle to the insurance products we have today, and we encourage our clients to review those products and our farm operators are also doing the same. It’s a year right now, similar to 2008, when you can buy up in the spring months and protect yourself against a falling grain price. And that's a really good risk management tool that is available.

Now that's a year-to-year basis, beyond this year you’re rolling the dice a bit as you look at land values. Most land loans are on fixed interest and are at very competitive rates, which is a much different scenario than what I saw when I was first starting out in ag. I would say some are more aggressive, we occasionally see loan-to-values as high as 75 percent, but I would say that's not the norm although there's certainly a lot of competition, Ken can attest to that in the market today for land loans, especially from good operators.

Finally, at our Federal Reserve Bank of Kansas City’s Omaha Branch Board meeting last week, some of the bankers on the Board reported that they have farm operators with cash in the bank as they're going into spring planting, and that's highly unusual. Their farm operators have bought machinery, they have bought some land maybe, and they still have excess profits on deposit in the bank which is really different than how most farm operators operate. Most farm operators don't like to operate with their own cash; they would rather operate on someone else's. I'll stop there.

>>RICH COFER
Okay, thank you very much. We appreciate all the wonderful comments from each of you. Certainly the audience has many questions for you. If you in the audience would like to ask a question, please raise your hand or stand, and our staff will be around with the microphone. Please identify yourself and your organization and be sure to remember to end with a question mark. I would like to get the ball rolling with a few questions of my own. First question, let’s start with somewhat of a high level question here, maybe a philosophical question. We have talked a lot about risk management, and –Jim, you talked about Mr. Isaac’s comments as they related to your early experiences, and Matt, you talked about this is not your grandfather's farm and it’s not your grandpa's bank anymore. So having gone through the seventies and eighties, if you were talking to a young Rich Cofer just out of school and wanting to get started in lending, what would you tell me? What would be your key lesson learned out of those events that has shaped how you do business today?

>>JIM FARRELL
I have a son who has just started in business in Omaha about nine months ago, and I have preached to him a lot about cash is king. You need to have cash flow; cash flow is much more important than equity. So that would be a very quick simple lesson from my

perspective. Not being a banker, I'll let my fellow panelists address it from their perspective.

>>MATTHEW WILLIAMS
I have an opportunity because of part of what I do to teach a lot of leadership and ethics classes across the country. And I'm often asked a similar question and of course the answer comes back to finding your passion. I think whether it's working for the FDIC, working for the Gothenburg State Bank, or Farmers National Farm Credit, it's to find your passion of what you like to do. Now that said, I think Jim's right, cash is king. Also recognizing that the downside in making conservative decisions is maybe potentially missing some growth opportunities, and that isn't always bad.

>>KEN KEEGAN
Probably the only thing I would add if I was giving advice to a young person entering the lending business would be to challenge them to make sure they choose and seek an employer that fits their core values. By doing so you're going to be in a situation where you're making decisions that fit what you believe personally. The other comment would be to stress the benefits of clearly understanding risk management, risk management strategies, and understanding the long term implications of those decisions.

>>JIM FARRELL
Rich, I would add a reflection on your question of what did I learn specifically in the 1970s and 1980s. This is something we talk about in our company all the time. Our revenue dependency is just like the farmer's; it's the value of the grain, the value of the rents, the value of the land, the value of the oil and natural gas. So we watch these things very closely. And when I look back at the 1970s and to the 1980s when I started managing farms and acquired properties for lenders in those days, it was the operating capital that initially caused the problems in the 1970s and 1980s. It wasn't necessarily the land loans—I'm not saying the land loans weren't a contributor—but my point is that a lack of operating capital and the inability to operate the farm is where it started. And that led to the inability to pay the long-term debt. Somebody mentioned this morning on the panel that operating leverage today is something that we need to watch because it can cost $500 to $800 an acre or more to plant an acre of corn today depending on where you're at. So when you push your cash rent on top of that, operating capital is very crucial.

>>RICH COFER
Great, those were excellent comments. I do see we have a question from the audience over here.

>>JOHN MOORE (AUDIENCE)
Hi my name is John Moore from the Farm Credit Administration. We have talked a lot in the earlier session and even in this one too about the impact of rising rates on land prices. One of the issues that we are also concerned about is the impact of rising rates on repayment capacity for farmers with their existing debt. How are your loan products shifting, if at all, with regard to use of fixed versus variable rates? I know Jim talked a bit

about the increase in the use of fixed rates and I would like to hear some comments perhaps on that from the two lenders.

>>MATTHEW WILLIAMS
I have been in this a long time and I would like to go back to the days when we worked more in partnership with Farm Credit than as competitors with Farm Credit, if that makes sense. I grew up in the business when the long term loans went to Farm Credit with fixed rates and the short term loans more subject to repricing were at the bank, but that's not the case any longer. In our shop, and I think this is standard across the market right now, we have seen pressure to change not underwriting standards but change risk on interest rates by lengthening that term. We certainly are resisting that to a great degree in our shop. Our ag loan portfolio is primarily one- to three-year fixed rates with rolling rate changes following that. Our operating loans are all on variable rates. And at this point in time we're having a lot of pressure from borrowers that want to fix these rates at these levels. I think we remember, and Mr. Isaac talked about it, the savings and loan collapse and a lot of that was due to not managing interest rate risk. And that’s the thing that we would look at in our shop.

>>KEN KEEGAN
I would add that we have encouraged our customers to think about their interest rate structure and their debt. Currently, about 75 percent of our loans are secured with fixed interest rates and most of that is secured with land for long term. So they have a portion of their interest cost fixed for a longer periods of time. But along with that conversation is this discussion of working capital and liquidity. And really the first line of defense for our operators against rising interest rates or rising input costs across the board is to make sure they have adequate working capital and liquidity in place to withstand the ups and downs we are seeing in this environment.

>>RICH COFER
Okay, I have another question. Some of you made comments about liquidity; in fact one of you commented that farmers have cash in the bank right now. To what level has this large amount of liquidity in the farm sector played in land values? What impact has that had for loan demand and what does that mean for competition for business moving ahead?

>>JIM FARRELL
I can comment on what it's meant to land values. We have seen quite a number of what we consider older farmers buying property and paying essentially cash for those properties because they can't put the money in the bank and get any kind of a decent return on it and they're reluctant to put it into something else that is more risky. If we had a 4.5 percent CD rate, the market would probably fundamentally look a lot different than it does right now. We sold a farm twelve months ago in York County at auction, a short-quarter, pivot-irrigated 140 acres for $8,200 an acre without the pivot and it had a cash rent lease for that year around $180 or $190. The farmer bought it for his son-in-law to farm, and this farmer was in his seventies. As best as we can tell, he paid cash or nearly all cash on this $1.2 million sale. That is the effect that we’re seeing in the market.

>>MATTHEW WILLIAMS
There is certainly a great deal of liquidity. In fact, at a loan committee meeting last week, I had to tip my chair back on one particular farmer we have dealt with since the 1970s. In the 1980s he was certainly beyond what you might have called troubled debt. We worked with him through that period and right now he's starting out this year with a half a million dollars in the bank, not a trivial sum of money. So that liquidity is there.

We as bankers also are enjoying more liquidity than we have normally had. I think rural banks are careful with that liquidity, recognizing that we could make mistakes by getting into activities outside of our comfort zone. Participations were mentioned this morning. Anybody that wants to use participations better understand what toxic participations are; some of us have experienced that in neighboring institutions. So, staying true to what we do just like a farmer is staying true to what he or she does is the best practice.

>>KEN KEEGAN
The level of profitability that we seeing in many of our customers is creating strong balance sheets and strong liquidity positions and it has had a significant impact on the increasing demand for farmland, and in part is fueling the increasing values that we're seeing. But, it’s not entirely that. I agree with Jim, the lack of alternative investments to park your capital to generate yield is having an equally significant influence.

>>RICH COFER
Okay great. Time for one more question.

>>RICH BROWN
I have one if no one else does. Rich Brown, with the FDIC. We have heard a lot lately about the costs of regulation. In some cases there are concerns that regulation is becoming intrusive, making it difficult to do business and manage risks. On the other hand, I could probably point to recent examples of insufficient regulation where regulators should have been more proactive in guiding the marketplace away from certain risky activities. Give us your sense, in your different parts of the financial system, of things that regulators should do more of, or perhaps do less of, to help you do business and manage your risks.

>>MATTHEW WILLIAMS
I'm very concerned with where we're going with implementation of new regulatory reform initiatives, in particular Dodd-Frank and what it can do to traditional FDIC-insured financial institutions—community banks like our bank that stayed true to our mission, did not participate or cause the financial melt down, and yet are the easy target to capture with new regulation. I sat around the table when the FDIC and other regulators started to point out the potential risk of commercial real estate and residential real estate a number of years ago. I sat around the table when the bankers pushed back from that and said, “Well that can't happen to us, that's just not really a concern,” and how wrong both sides were on that issue.

So that is why I'm pleased that we are here today. But I do have a significant concern that the stars aligned in the last year with consumer protection issues and other social issues at the same time we had an economic meltdown. Coupled with an administration and a Congress willing to move forward with legislation under the umbrella of protecting consumers, I think the final effect for rural consumers in Nebraska will be loss of products and loss of availability of financial services, not more protection.

Now, if I sounded like I was on my soap box, I was. I'm passionate about that and I believe that we need to protect the rights of consumers at the same time. The community bank is the economic driver that has the ability to significantly improve the economic conditions in our country. The majority of new jobs in our country are created by small business. The lender of choice of small businesses is small banks. And we need to keep them healthy and go forward. The cost of Dodd-Frank, the cost of interchange, the cost of further regulation and rule making in the area of overdraft protection, continue to take income and then capital out of our hands.

Mr. Isaac mentioned this morning that a dollar lost in a loan charge off actually turns into about eight dollars less in lending ability. The same thing happens when our income is restricted. I think those are concerns. In our bank we have almost two full-time employees devoted to the compliance area. We do that in our bank because if that's the rule we're going to follow it. But, sometimes over the coffee table at night, I look around and say, “Who is really benefiting from this in our shop?”

>>KEN KEEGAN
I would echo comments that we need regulatory agencies to provide the independent and objective view of performance of our financial institutions. Ideally that will happen at the cheapest dollars that can provide that safety and soundness assurance. What do we need from our regulators? Obviously they're doing much of the same thing we are in trying to be forward-looking to assess future risks that may impact the systemic operations we have as institutions. But that responsibility falls with us as leadership and management first and foremost.

If we are doing those things appropriately, it should be fairly easy for our regulators to come in and assess if we’re effective, if we’re doing the right things. And that reduces cost. When regulators have to dig and hunt to find information, can't get access to good data, and can’t have open and transparent communications, those things all add cost to the process. In a perfect world, we'd all be doing things perfectly and the regulatory costs would come down. We know that's not realistic so there's a balance there, but the cost is significant. Those are dollars that are not available for us to use in other ways in our company.

>>JIM FARRELL
We're not really directly affected by the regulatory environment within the banking industry as such, but we are more in an indirect way. We work with a number of publicly-traded companies, and in those companies where we manage properties for them through a trust department relationship, we are not unlike what Matthew was talking

about needing two people there for compliance. We have had to beef up staff considerably to meet SAS 70 audit requirements. We have to go through SAS 70 audits for two of our business lines every year. We have added substantial infrastructure for that. Some is good, but some you step back and look and it's not. So we're affected by regulation but just not the same way.

>>RICH COFER.
Great, thank you very much. It looks like we're up against the clock so thank you very much panelists. It was a great discussion.
[Applause]

>>RICH BROWN
Well I want to thank Rich Cofer and the members of our panel for their thoughtful discussion of risk management. You know, the great philosopher Yogi Berra once said it's very difficult to make predictions, especially about the future. He knew a lot about risk management. But we are very fortunate to have been able to hear from such knowledgeable experts who are willing to come here with us and speak frankly about their views on this important topic. The goal was to ask hard questions and to learn as much as possible about this topic, and I think our panelists were very much up to the task. I would especially like to thank our opening speakers, FDIC Chairman Sheila Bair and former FDIC Chairman William Isaac, for their thoughtful remarks as well. And finally I would like to thank our moderators, John Anderlik and Rich Cofer, as well as staff members, Camille Ireton, Nona Fitchett, Alan Levy, and other FDIC staff who did everything from A to Z to make this symposium happen. In closing, I'll point out that the panelist slide shows should be on our Web site, fdic.gov, later today and that by early next week the video file will be posted for viewing. That concludes today's symposium. Thank you for joining us.
[Applause]