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Shifting ground: The changing landscape in financial markets and technology

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The Chicago Fed's Supervision and Regulation Department and DePaul University's Center for Financial Services held their ninth annual risk conference on March 29–30, 2016. The conference brought together financial industry professionals, academics, and regulators to discuss the challenges and opportunities posed by the uncertain outlooks for financial markets and geopolitical landscapes across the globe, as well as by the array of innovations from financial technology, or "fintech," firms.

Volatility across the global economy in 2016 has highlighted some of the deep structural changes in financial markets that have taken root over the past decade. The outlook for the world's financial markets and geopolitical landscapes remains uncertain, with risk indicators in bond markets pointing to concerns over liquidity and credit quality. In the U.S., the gradual post-crisis recovery continues to present both opportunities and pitfalls for financial service providers. For markets where demand and growth have been strong—such as commercial real estate (CRE) and leveraged commercial lending[1]—federal supervisory agencies have deepened their focus on financial institutions' riskier practices. These conditions have put sustained pressure on financial firms to strike a strategic balance between growth and risk mitigation. In addition to these challenges, the financial industry's landscape has been rapidly transformed by the fintech movement. Fintech start-ups have already produced several innovations, such as those that have made processing loans and payments more efficient. Moreover, some fintech enterprises have become sources of credit for those who have not been able to obtain loans from traditional financial service providers. These new online financial firms—which provide a wide range of products and services, including cash management and small business lending—are reaching previously underserved customers while competing for traditional firms' existing clienteles. In response to fintech's disruptive innovation, some banks are forming strategic partnerships with fintech companies (or developing their own divisions based on fintech solutions). In this *Chicago Fed Letter*, we summarize discussions on these and related topics by the multiple keynote speakers and panelists at the conference.

The conference agenda and some materials presented at the event are available at https://www.chicagofed.org/events/2016/risk-conference.

The global economy: Near-term challenges, uncertain outlook

In recent years, a number of key economic issues have created significant uncertainty for markets. The outlook for oil, the health of China's economy, and the future of benchmark interest rates in

the U.S. and elsewhere are three such issues. In the opening keynote address, Carl Tannenbaum, executive vice president and chief economist, Northern Trust Corp., touched on each of these as he explored current macroeconomic risks facing the financial industry.

In contrast to historical trends, the steep decline in oil prices since 2014 has not been accompanied by a substantial increase in consumer spending. “We keep waiting for the benefits of cheap oil to become apparent,” Tannenbaum said. He stated a good portion of U.S. consumers’ savings from lower energy prices is likely being used for rent payments. U.S. household costs for rent are at historic highs on an indexed basis in many regions. Regarding China’s economy, Tannenbaum said the country’s recent slowdown poses a stiff challenge to financial institutions exposed to its economy—a dynamic exacerbated by China’s limited transparency. While China’s economic data may be unreliable, Tannenbaum noted, it’s clear that the country is well into a delicate transition from an economy built on manufacturing to one fueled by services and consumer spending. “China’s manufacturing sector is at a standstill, at best,” he said, noting evidence also suggests private investment capital has recently begun exiting China, which had been for two decades the standard-bearer of emerging-market economies. In regard to central banking and the future of benchmark interest rates, Tannenbaum described a highly uncertain outlook for monetary policy worldwide under conditions that have scarce historical precedents; he noted 40% of sovereign-backed bonds are currently tied to economies with negative interest rate monetary policy. “There are lots of risks, and we will see how they manifest themselves,” Tannenbaum concluded.

In an accompanying keynote address, James Paulsen, chief investment strategist, Wells Capital Management, explored how these and other trends have unfolded in the midst of a recovery of nearly unparalleled duration, despite persistent concerns about the pace of growth. “Unemployment is low, personal debt is very low, capital levels are high, incomes are going up. This is the most successful ‘disappointing’ recovery we’ve ever had,” Paulsen stated. He noted that a number of economic indicators suggest business owners and consumers alike continue to keep in mind lessons from the most recent financial crisis. In a discussion of key risks, he said an unanswered question for the U.S. economy is the future of workforce productivity, which has been stagnant in recent years. “Public and private spending are the two things that drive productivity,” Paulsen said. “There’s not much hope that public investment will pick up, but corporations have the ability to drive capital spending.”

Bond markets: Low returns, tightening liquidity

Financial institutions of all sizes have been affected by recent conditions in bond markets, notably low yields, decreasing liquidity, and distress tied to slumping energy prices. “We are in the early innings with regard to the energy cycle, and we haven’t yet seen the full effects,” said Devi Aurora, senior director, Standard & Poor’s, in a panel on bond market trends. About 20% of outstanding corporate bonds have exposure to the energy sector, so these bonds are now facing challenges after several years of attracting many new investors because of their higher yields relative to government debt. “There’s been a big change in ownership of U.S. corporate bonds, with an increase by mutual funds and foreign investors,” said Robert Summers, senior vice president, Neuberger Berman. These trends tend to reduce market liquidity, which can have a variety of negative spillover effects for institutions and investors, he indicated. As one example, lower liquidity can exacerbate the tendency for corporate bonds to trade infrequently beginning shortly after they are issued, as most investors lock in returns for the long term. “The more bonds season, the more illiquid they get,” said Alex Roever, head of U.S. interest rate and short-term fixed income strategies, JPMorgan Chase & Co. “The breadth of the market is very un-uniform: 20% of outstanding bonds account for 90% of trading.”

Hammad Pirzada, corporate treasurer, The PrivateBank, described the operating burdens for financial firms that tight bond market liquidity can produce. “It’s hard to find high-quality bonds

at decent yields," he said. "We don't have an investment portfolio large enough to just let it run off. And it has been very hard over the past several years to find good replacement bonds for our holdings." Aurora noted, "We frequently hear from investors that you'd better like the position you have, because you might be holding on to it for a very long time."

Commercial real estate, leveraged loans, and risk culture

Two areas of risk recently associated with financial institutions are commercial real estate and leveraged loans. Separate conference panels discussed these sectors' emerging trends and the forces behind their rapid expansion. In regard to commercial real estate, several supervisory agencies, including the Federal Reserve, have deepened their surveillance to head off the potential for systemic threats. The agencies are emphasizing the use of sound risk-management practices that include contingencies for a downturn, regardless of the CRE market's rosy conditions (such as historically low vacancy rates and several years of easy credit), which have enticed investors and lenders. Similarly, commercial leveraged loans have drawn the attention of financial institutions and supervisory agencies. The combination of strong growth and weak controls in markets serving highly leveraged borrowers has drawn a series of responses from agencies, including the Federal Reserve, the Office of the Comptroller of the Currency (OCC), and the Federal Deposit Insurance Corporation (FDIC).[2]

In a panel on CRE trends, Erin Spears, senior vice president, Fifield Companies, said the CRE expansion, which has been long under way, is currently being held in check by high construction costs. "We're seeing a big increase in the costs for planned projects, to the point that some won't be economically viable. That trend is serving as a natural governor on the market," Spears said. One consequence of expensive input costs for newly built projects, panelists noted, is that many developers are turning to renovating or refitting existing buildings.

Of all CRE subsectors, rental apartments have attracted the most capital investment in recent years. The panelists agreed this subsector has yet to show material signs of stress, in large part because of secular demographic trends that underpin enduring demand for rental units. According to Ron DeVries, vice president, Appraisal Research Counselors, "there's been a long-running decline in homeownership nationally. … Across all age cohorts, the percentage of homeownership is declining." While some of the decline in homeownership is driven by consumer taste or choice, panelists discussed how hard and fast lending standards are keeping many consumers in the rental markets; some said their institutions commonly see adults under 40 years old whose credit scores disqualify them from getting a mortgage. Christopher Fruy, senior vice president, Heitman, said demographic trends are one reason institutional investors have in recent years gravitated toward rental property assets.

In a panel to discuss leveraged lending, David Althoff, global co-head of industrials mergers and acquisitions, Duff & Phelps Securities, described how a search for returns has enticed investors to buy higher-risk debt. "Everyone's looking for yield. Everyone's trying to get a return," Althoff said. "In the '80s and '90s, modeled returns for private equity were commonly around 30%. Nowadays, you see modeling in the teens." Richard Jander, managing director, Maranon Capital, said investors have returned to funding higher-risk sectors devastated by the crisis at a quicker pace than many might have imagined as recently as a few years ago. "Who would have thought that we'd do another deal to fund an auto supplier or building products company?" Jander said. "But right now, those are two very active sectors."

The above-benchmark growth in leveraged loans has been accompanied by deeper scrutiny from financial supervisory agencies. "When you look at the impact on the institutions we supervise, addressing leveraged lending practices has been one of the most significant actions we've taken during the past few years," said Clay Ancri, lead credit risk specialist, Board of Governors of the Federal Reserve System. Stephen Isaacs, managing director and group head of sponsor finance, BMO Harris, noted his

institution manages its operations with supervision in mind—a practice he recommends. Isaacs said of his firm: "It's all about having a mentality to set up your business with supervision top of mind."

Closing out the first day, David Casper, president and CEO, BMO Harris Bank, gave a keynote speech on risk culture. Specifically, he argued that the current climate of low profit margins and competitive pressures makes corporate culture a distinguishing factor among financial institutions. "Next year BMO will be celebrating its bicentennial," Casper said, explaining his firm's long life adds weight to its mission and culture. "We believe a strong risk culture is a competitive advantage," he stated. This is in line with Federal Reserve Chair Janet Yellen's fairly recent contention that it is not the role of government agencies to dictate corporate culture—and that, indeed, financial institutions must maintain the responsibility to take their culture seriously for their own benefit.[3] Casper said his institution requires staff to consider risk in all dealings with counterparties. "At BMO, if you're in front of a client, you own the risk," Casper said. "If the first line of defense doesn't believe and behave like they own the risk, there are not enough risk professionals or regulators to deal with the monumental consequences."

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— David Casper, BMO Harris Bank

The rapid rise of fintech

The landscape for banking and financial services is changing at an accelerating pace as fintech companies create new avenues for consumers and businesses to efficiently access financial products and services, especially credit and the processing of payments. Two panels, composed of representatives from both new and traditional financial services firms, explored emerging fintech trends.

There is considerable investor interest in fledgling financial firms serving customers who need to obtain loans and to make and receive payments. Jeanine Jue, director of developer evangelism, Envestnet Yodlee, presented research showing capital inflows into firms developing fintech-based lending and payments accelerated from $3 billion in 2014 to $18 billion in 2015. Participants on the two panels agreed that a common trait among those working in fintech firms is an ability to see challenges to traditional banking as questions of engineering and technology—more specifically, as problems that can be solved through a combination of high-quality data and automation.

While many fintech lenders use the same types of information in their underwriting as traditional lenders, the level of automation in loan processing enables them to offer a more efficient customer experience. Whereas bank lenders largely rely on the customer to gather and provide paperwork (including pay stubs, bank statements, and tax returns), fintech companies typically have the ability to connect directly to information sources and to almost instantaneously use the information for identity verification and fraud prevention. For example, some fintech firms cross-check an applicant's IP (Internet protocol) address with the physical address listed on documents such as loan applications and credit reports.

During a panel on fintech and credit, industry professionals discussed the ways fintech firms are using technology to significantly change the customer experience, most notably the level of convenience. According to panelist Larry Baker, co-founder, Bolstr (a fintech lender), his firm uses APIs (application programming interfaces),[4] including those from Yodlee and Intuit, to collect the majority of data for loan applicants. But Bolstr still requires a manual review of each new loan by a loan officer. In response to the panel discussion, Andre Salvi, managing director, partnerships, BMO Financial Group, described how BMO harnesses fintech strategies to personalize rewards program

offerings for its credit card customers. Fintech firms have attracted significant attention for their use of social media data. But the consensus among the panelists was that while many fintech firms use social media data to generate new business and verify customer identities, such lenders rarely use this sort of data as cornerstones of the underwriting process.

Payments processing is another area in which fintech companies have had a significant impact over the past few years. In a panel on fintech and payments, Jonathan Solomon, executive director, Chicago Bitcoin Center,[5] explained the user demand behind the rise of new payment options. "We live in a world where we want payments that move as quickly as email," he said. Consumers have shown demand for payments that move cheaply and as fast as email, yet today most payments in the U.S. (e.g., those made via wire transfer) often move less quickly, with pricey fees involved at times. Despite pressure to increase speed and ease, firms engaging in payment innovations must still give top priority to information security and fraud prevention, the panelists noted. "It will be interesting to see how some of these entities perform during times of stress. Most of these folks have only known the post-crisis environment, which has been relatively stable," said Rumi Morales, executive director of CME Ventures, CME Group. That said, these new strategies and technologies may improve institutions' ability to catch fraud—even as they speed up payments and reduce transaction times. As panelists noted, a combination of fintech and "big data" can allow payment processors to identify illegitimate merchants, as well as fraudulent "card not present" transactions.

When challenged by the audience to assess the competition posed to banks by fintech firms, those on both panels unanimously agreed that the two are in many ways complementary. "For banks, fintech presents both opportunities and risks," said Cathy Lemieux, executive vice president, Supervision and Regulation, Federal Reserve Bank of Chicago. Because banks have access to existing customers and inexpensive costs of funding, partnerships with fintech businesses can be mutually beneficial. Conference participants noted that, for instance, many community banks do not offer online loan applications, even though consumers increasingly prefer them. Some representatives of fintech companies contend that by integrating fintech into existing banks, it can help traditional banks capture additional customers or serve current ones more profitably. Chris Rentner, CEO, Akouba Credit, said his firm studied bank business models and concluded each small business loan carries $3,700 in fixed costs—an expense level that fintech can reduce to less than $1,000.

The question of regulation continues to be part of most discussions related to fintech, and panelists agreed that the potential for stronger oversight is not one that fintech firms are ignoring. Panelists noted that because fintech is still in its early stages, regulators have not yet made clear how they will strike the balance between accommodating innovation and safeguarding the system. In an effort to show their commitment to fair practices, some fintech firms have created and signed the *Small Business Borrowers' Bill of Rights*—a list of practices aimed at building and promoting transparent lending to small business customers.[6] The compact may be seen as an effort to head off additional regulatory scrutiny, which some firms fear could limit innovation.

Conclusion

The conference's speeches, presentations, and discussions underscored how operating conditions for U.S. financial institutions are constantly evolving, placing an onus on each firm to manage its own unique set of risks and opportunities. For traditional banking institutions, low interest rates, global market volatility, and unpredictable bond markets are challenges for their historical business models. Meanwhile, nonbank financial firms, such as fintech firms, must manage themselves with an eye toward potential regulatory scrutiny in the future. Both sets of firms are tied together in the recognition that each firm's future depends on its ability to maintain a proactive risk culture—one that rewards all employees for identifying threats as they arise, regardless of whether they're familiar or previously unseen.

[1] Leveraged lending typically consists of large commercial loans extended to borrowers that are already considered to be carrying substantial debt. Historically, leveraged loans have demonstrated a higher rate of default than commercial loans to borrowers with less leverage.

[2] In December 2015, the Board of Governors of the Federal Reserve System, the FDIC, and the OCC reiterated existing guidance for commercial real estate lending; see https://www.federalreserve.gov/bankinforeg/srletters/sr1517.htm. Similarly, in March 2013, these regulators released guidance for leveraged lending practices (revised in November 2014); see https://www.federalreserve.gov/bankinforeg/srletters/sr1303.htm. Both apply to all financial institutions supervised by federal banking agencies.

[3] See http://www.federalreserve.gov/mediacenter/files/FOMCpresconf20150318.pdf.

[4] Application programming interfaces are computer applications that make it possible for separate sets of software to share data. In one example, fintech lenders use APIs to access and standardize IRS (Internal Revenue Service) data for use in automatic loan underwriting, relieving borrowers of the task of aggregating and submitting personal tax histories.

[5] For more on bitcoin and how it works, see https://www.chicagofed.org/publications/chicago-fed-letter/2013/december-317.

[6] See http://www.responsiblebusinesslending.org/.

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