Changing Business Models in Financial Services

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Introduction

Ignace R. Combes
Chairman Centre for Financial Services
Vlerick Business School

Dear Reader,

In the last editions of Dialogue, reinvention or transformation of the business model for financial institutions was often an underlying theme. Indeed, because of increased regulations designed to make the financial services industry more robust or make the European markets more open and more transparent and because of disruptive innovation thanks to new technologies leading to tougher competition both from within the sector as from outside, financial institutions need to reassess their business models. A business model is a representation of a firm’s value proposition to its major stakeholders such as customers, shareholders and employees in a socially responsible way towards its communities.

Transforming towards a sustainable value proposition, does not necessarily mean a radical change of its business model, but it is at least critical to reassess if not to reinvent itself from time to time. Financial institutions had first to deal with the consequences of the crisis and had to reposition themselves, mostly leading to restructurings and even retracting to their domestic market. They now get increasingly more customer focused and look at how they will add value going forward and achieve the necessary returns they will need to have to a sustainable access to capital markets.

Business model transformation can come in very different shapes from changes which client segments to target and which services or products to offer, to becoming more efficient and effective the way services and products are delivered to existing client segments. Within a more complex and more competitive environment, financial institutions need to become more agile. Such transformation doesn’t come easy and requires a much better understanding of the changing customer behavior, a much better understanding of how new and upcoming regulations can be an opportunity particularly for early adopters, a much better appreciation of how technology is changing customers and competition.

Given this complex and challenging environment, financial institutions may need to adopt different ways to better asses relevant opportunities and sustainable business models and therefore we are likely to see financial institutions at least initially engaging more than before in partnerships or collaboration for certain services or investing in several new technologies before being able to assess which ones are relevant for the targeted client segment. This shows that changes of business models of financial institutions will mostly not be radical but more a continuous evolvement towards a more optimal model.
The articles in this seventh edition of Dialogue give several witnesses of how a better understanding of the customer, markets and regulations are the corner stone of the transformation to a more value driven business model:

- The article “Insurers and Banks – An Important Distinction” talks about the bank-insurance model and the way the regulatory changes with Basle III and Solvency II have and are reinforcing the underlying dynamics of their respective business models with for example the insurers being the long term investors. As pointed out, such changes can lead to new business models with (rather than integrated bank-insurance businesses where the synergies are not always consistently present) more collaboration across industry segments to leverage each other’s strengths.

- Another example of leveraging regulatory changes is in the payments with for example the upcoming Payment Service Directive commented in “Adapting to Change in the Payments Industry”. The payment industry is fundamentally changing with new players coming into the market. The article makes the point through a number of examples that it is not only important to find innovative ways to enhance the customer experience. It is also important to look for opportunities to engage with customers beyond existing boundaries focusing on what customers want by leveraging not only internal data but also working closely with payment service partners such as merchants to better understand the needs of the customer.

- “Banks re-invent themselves to keep the Customer Onboard” discusses the fact that clear technology changes such as increased digitization are not necessarily not yet widely adopted by the customer and therefore it may be worthwhile to see how old distribution channels such as the branch can be married with the digital distribution platforms to a flexible “banking store” for advice and service delivery.

- “Delivering Shareholder Value amid Complex Regulatory and Supervisory Landscapes” starts from the fact that it will be a major challenge for banks to accommodate the increasing complexity of regulation and supervision and at the same time create shareholder value. Bank business models can be at large categorized in retail, wholesale and capital markets and banks often have a mix of those with one dominant. These distinctive models have each their risk profile and return potential but in a mix model there are also cross-risks and enhanced return opportunities. The article makes the point that it will be important for banks to redesign their strategies taking into account these increasing cross-model complexities to assess which geographic and product segments are likely to be most effective in delivering shareholder value.

- In several articles published in this and previous editions, the importance of better understanding the customer behavior has been more than highlighted. “Making Use of Big Data to Create Value for the Customer”, based on an interview
with Philippe Baecke who is doing research on the use of big data in the financial sector, goes beyond the importance (and the challenges such as data privacy) of using big data to become more customer-centric by stating that banks as a result may start to be more collaborating with other business partners, initially to better understand their customer and at a later stage to possible provide services together.

- The business environment of financial institutions are also impacted by measures taken by the central bank to stimulate the economy and as such may influence how banks for example take advantage to the benefit of their customers of such measures and the liquidity it creates. The article “Quantitative Easing for the Eurozone: Origin, Impact and Unintended Consequences” not only discusses the impact such measures may have when rolled out but also highlights some scenarios of how it may impact the business environment at the time such measures would be phased out.

It is an understatement to say that financial institutions face tremendous challenges to cope with a radically changing customer, technology and regulatory environment. We hope that the articles in this seventh edition of Dialogue from both market practitioners and academics continue to provide you not only with insights but also give food for thought in the way you transform your business or make your business more efficient and effective to your customers. Better understanding your business environment has to be a continuous process and we hope we can contribute to your better understanding. Besides these insights, we see our role as well in re-channeling built-up knowledge (through research and interaction with the market) into our education programmes and in the context of this publication, allow us to highlight our Executive Masterclass in Big Data, commented in the interview with Philippe Baecke.

We appreciate receiving feedback and views.

Ignace R. Combes
Chairman Centre for Financial Services Vlerick Business School
You will be familiar with the expression: “If it looks like a duck, swims like duck, and quacks like duck, it probably IS a duck.” Now let’s try it again from the top, applying the same formula: “If it looks like an insurer, acts like an insurer, and has a balance sheet like an insurer, then it most definitely IS an insurer.” Why then when the characteristics of banks and insurers are so different, are the latter often lumped into the banking basket, when on a risk comparison basis alone, they are quite different.

While I am strongly convinced that insurers are very different from banks, over the past decade a great number of insurers have done their utmost to look and act like banks. Before establishing Ageas as an independent international insurer, we ourselves were part of the bancassurance group Fortis. In a number of cases this even led to a fully integrated financial model and the creation of financial conglomerates. But things are changing in favour of distribution agreements, joint venture agreements, and affinity contracts with major banks and other distributors. We both assume financial risks but should always be aware that our roles in the functioning of the economy are different.

Inevitably the financial crisis resulted in financial institutions being boxed together in the minds of some into a single “bad” unit. But six years on, or more, depending on your assessment of when the world was officially “in crisis”, we must as insurers continue to reinforce the distinction when talking with investors, regulators and business partners. There is evidence that insurers have been a source of stability in the financial crisis. Insurers are much better able than banks to hold assets to maturity without forced selling. We are long-term holders, not traders. But it is also fair to say that banks and insurers really have complementary skills and as such must continue to work effectively alongside one another: banks tend to be strong at analysing credit risks and structuring credits while insurers can supply long term funding. While we both seek to protect the purchasing power and wealth of consumers over the short and long term, how we go about this is quite different and requires a very distinct business model reflecting other business risks, funding strategies, balance sheets and specific ALM and investment management. In general, the balance sheets that underpin our respective business models tend to be more stable and less volatile. The mismatch between assets and liabilities also varies fundamentally in size and nature between banks and insurers. Banks usually have a more short term perspective. Insurers take a longer term view as
they focus on risk pooling and risk transformation. And most importantly there is less inter-connectivity between insurers, with the exception of reinsurance practices, so insurers do not face liquidity and hence systemic risk in the same way, and as a consequence, the risk of contagion during periods of crisis is less likely.

But why is any of this important? As an investor or regulator your decisions should be taken on the basis of the insurance model and not on a generic “banking and insurance” model that doesn’t reflect the reality of how a pure insurer works. Based on Solvency II, which clearly takes into account the full risk spectrum of an insurance company, regulators have designed an insurance specific solution. Moving forward we must ensure there is better knowledge, understanding and respect for each sector allowing each to thrive on its own merits.
Banks reinvent themselves to keep the customer on board

Guy Roosen
Member of the Executive Committee
Beobank

Proximity and intelligent and secure digital experience are banks’ main weapons to secure customers’ altered expectations on banking

In the last decade, trends and behavior patterns of the FMCB* business have increasingly made inroads in the banking industry. From the “24 hours open” culture to the multi-channel diversity on product offering and the increased customer demand on customer service standards, customers have grown accustomed to an era where supply and demand interact in constantly changing perimeters.

While banks massively invested over the last 10 years in digital front ends (ATMs, home banking platforms, security gateways, etc...), customers have not necessarily been wowed and convinced on their banking journey. In the WRBR of Capgemimi and Efma (2015), polling shows that even for non-complex products, customers prefer the convenience of their branch. In the same report, the Customer Experience Index for Belgium (and Western Europe in general) has decreased 5 BPs (2015 versus 2013), showcasing customer’s lowered appreciation for medium and back offices.

At the same time, Regulatory initiatives have tightened their grip on the banking industry as a whole. In between Mifid regulation on enhanced customer protection, the Payment Service Directive (PSD2) on opening up the payment landscape to new entrants (in line with the SEPA promise), Basel II/III requirements on financial buffering and the Single Supervisory Mechanism (SSM) on the reinforcing of the Economic and Monetary Union, banks have been known to spend 80 to 90% of their yearly IT budget on Regulatory Affairs. Apart from the IT cost and the enlarged MIS requirements, there is also the undermining of traditional bank revenues.

With the walls between industries fading, a variety of new players have been attracted by the low hanging fruit in the financial department store. Offering financial products is not only considered as a new revenue stream, but more as a direct highway to customer’s DNA, as financial operations are often the missing link between the consumer and the purchase behavior. Retailers, web giants and service providers have embraced the financial space as a strategic direction to deploy.
How can banks going forward secure their existence and relevance in this challenging environment?

Firstly banks need to keep investing in their traditional branches network, in line with customer’s expectations on proximity and the desire to have a safe haven for advice and counseling. While financial products have often become a commodity, the expert counseling of a Financial Advisor has not. The differentiation in the marketplace will be on the merits of holistic advice, across the various product lines, towards a solution for customer needs. The shift from product management to solution management is more tangible than ever. To cope with these needs, banks will not erect more branches, but rather invest in more Financial Advisors in their existing network.

Secondly banks will need to continue to invest in intelligent digital channels. For generation Y customers the streamlining of processes and flows into manageable interaction platforms is a pre-requisite for doing business. For different customer segments technology is an indispensable part of the daily consumer journey, with varying expectations on delivery returns.

But compromises on efficiency and customer friendliness will not be tolerated by the demanding customer base. Product-wise, the dematerialization of cash and plastics will continue to progress towards mobile carriers, ranging from mobile phones and wearables to digital wallets. Security protocols will be key here in customer adoption. Beobank is investing the NFC technology through launching contactless debit and credit cards in 2015 and is preparing a business case for a digital wallet in line with market trends. Contact-wise customers are increasingly hungry to challenge traditional face-to-face encounters to virtual meetings, be with through videoconference, instant messaging or multiple social media. It goes beyond saying that bankers need to embrace every contact opportunity with their customers, but with the proper security lock on the virtual door.

Lastly banks will need to redesign their revenue model. With traditional revenues under attack, there is a clear shift between product fees and a “customer advisory fee model”, whereby new ways of tariffication will need to be developed to cope with tomorrow’s reality. In an atmosphere of transparency, models need to be developed which value counseling and advice, in the same way as is customary for liberal professions for instance.

The face of banking in the next 5 years will witness an accelerated evolution of the traditional high street bank institutions of yore to flexible banking stores of the future. Both the brick-and-mortar and digital platforms will offer progressively more tailored advice to solution customer needs, based on the proximity relationship between a banker and its customer and the one shop shopping advantage. Customer touch points will need streamlining from front to back, to comply with high demands on 360° solution management throughout the customer life cycle. Security and convenience will need to find new balances to accommodate for customer’s ease of mind.

The old bank may be dead but bankers are more alive than ever....

*FMCB = Fast Moving Consumer Business*
Adapting to change in the payments industry

Alessio Ballesio
European Market Development, MasterCard

Valerie Nowak
General Manager Belgium and Luxembourg, MasterCard

There is no doubt regulation and technology are fundamentally changing the financial services industry. This is also true for payments. The EU Regulation\(^1\) of interchange fees entered into force on June 8 in all EU countries. The revision of the Payment Service Directive is expected to be ratified after the summer: Member States will then have two years (around Q3/Q4 2017) to transpose it into their national laws. At the same time, with a smartphones penetration rate of over 83% in Western Europe\(^2\), technology promises to change the way payments work as it has already changed the way we communicate and interact with each other.

What does this mean?

Electronic payments are expected to continue displacing cash (which in Europe still accounts for \(\sim \)78% of the number of transactions\(^3\)). Technology and regulation will not change this trend: likely they will accelerate it. Nonetheless they both impose on financial services players the need to reconsider their model in the same way that a sailing boat needs to reassess the tactic and trim the sails accordingly when the weather conditions change. In order to understand how the industry stakeholders should adapt, let’s first look at what is changing: there are three key implications.

First of all, the current economics of payment service providers are being challenged. This is true in particular for those who issue payment cards. The Regulation will cap the interchange fees\(^4\) – starting from 9 December 2015 – at levels of 0.2% of the

\(^1\) Regulation (EU) 2015/751

\(^2\) Source: ComScore’s MobilLens 2014

\(^3\) Source: Euromonitor 2014

\(^4\) Interchange fees are fees which the issuing payment service provider receives from the merchant payment service provider as contribution to the costs the issuer sustains to enable and guarantee the payment. As such it is a crucial mechanism to ensure electronic payments systems work in the most efficient and fair manner
transaction value for consumer debit/prepaid card transactions and at 0.3% for consumer credit card transactions. For credit card issuers, for example, this will mean a potential reduction of the card payment revenues ranging from 50 to 70%.

**Second, competition is increasing.** PayPal, which already captures over 14% of all the e-commerce transactions in Europe, is looking to exploit the mobile revolution to expand its reach and acceptance beyond the on-line space. Other multinational companies like Apple, Samsung and Google are launching payment related initiatives. Many start-ups have appeared and more are expected to come with the adoption of the revised Payment Services Directive. This Directive introduces a new type of players referred as “Third Party Payment Providers” (‘TPPs’) and requires banks to provide to TPPs with access to the bank account of the consumer in order to initiate a payment, provided that the consumer has given its consent.

**Third, the boundaries of payments are being changed.** Consumers not only have many devices (smartphones, tablets, PCs, watches, etc…) that are connected to each other but they also use them for practically everything, including for making purchases and managing money. Therefore payments can no longer be considered as a stand-alone event: rather, it will increasingly become an integral and seamless part of the wider experience, from searching what to buy up to getting rewards or deciding on how to finance the purchase.

**So what should financial service players do?**

We have identified two main set of actions which payment service providers, both on the issuing or acquiring side, should do:

1. Find ways to enhance the customer experience, recognizing that not all customers are alike
2. Look for opportunities to engage with customers beyond existing boundaries

**Enhancing the customer experience**

The customer base is a key asset that financial institutions have, compared to other players entering the payment space, in particular the emerging ones. So it is important that they continue to focus on what customers want and then act accordingly. The challenge is that those needs are changing more quickly than in the past: technology is not only helping address existing needs but it is also creating new ones.

Broadly speaking, consumers expect from payments ease of use, safety and security, the possibility to do the payments anytime / anywhere and with any devices in an unified way. As many initiatives are emerging and promising to make payments easier and faster, banks must fulfil the ‘ease of use’ criteria expected from their customers (without sacrificing security) if they want to remain relevant in the payment area. Two key examples where existing and proven solutions can help, though the take up in many countries is still rather limited, are the following: contactless when paying in the physical world, and digital wallets for on-line transactions today and for potentially all transactions tomorrow (especially leveraging smartphones). Both solutions indeed enhance convenience (for example avoiding the need to systematically re-enter the card
details or the shopping address) and are therefore increasingly popular with consumers and merchants: for example, in Poland and in Czech Republic, among the first ones to adopt contactless technology in Europe, respectively 39% and 58% of all MasterCard in-store transactions are contactless.

It is also important to highlight that different needs play different roles depending on the customer segment. Therefore it is important that financial services players re-assess their customers’ segmentation and adapt the value proposition and product offering accordingly. This may also help mitigate the challenges on the economic side: recent research conducted across different countries shows that consumers are willing to pay extra for those features which better meet their needs. For example, the study has shown that Dutch consumers, beyond expecting wide acceptance, highly value features that provide additional security, such as ID theft resolution, zero liability, purchase protection and exception handling in store & online. And they are willing to pay more for this.

Engaging beyond existing boundaries

In addition, payment service providers should continue to explore ways to engage with their customers beyond the usual boundaries: this opens the door to opportunities which are new or not fully exploited yet.

One clear area is the use of data. This is an important asset still under-utilised across the industry. Clearly, data analytics can help issuers identify those customers that are more likely to value and respond to specific offers from their bank. But payment data can also be the basis to further engage with consumers on a larger scale and make issuers attractive partners for merchants. The ability to leverage payment data, together with the other customer data held by financial institutions, allows running more targeted offers/ marketing campaigns (i.e. card-linked offers). This possibility is very interesting for merchants as it represents a more effective way to attract new customers or retain existing ones.

Another opportunity, closer to the expertise of financial institutions, is related to instalments. A recent survey across multiple countries in Europe demonstrates the wide appeal that instalments have among consumers. Card based instalments are a payment solution which best meets all of the consumers’ payment needs in terms of flexibility, convenience and control when compared to payment card transactions, personal loans or other forms of credit (e.g., overdraft).

So far, few issuers have addressed this opportunity, leaving the space to offer financing at the point of sale or after the transactions to specialized consumer finance players or the merchants themselves. Luckily, there is now the chance for them to enter this space. Technology can make things easier for issuers to play a role and to improve the consumers experience by eliminating paperwork – consumers often perceive often perceive the existing processes as too burdensome and everything that this entails (e.g., consumers ‘walk of shame’ to the financing booth in the shop). It is indeed possible to activate the instalment capability either directly at the POS or after the transaction is done by leveraging the card infrastructure not only to recognize and score the consumer but also to post the different instalments to the consumer account. The need to evaluate how to engage beyond existing boundaries with customers is also true for the acquiring side. There are many small or medium-sized merchants, including professionals like doctors, lawyers or plumbers, who, even when they use cards for their
professional purchases, do not accept card payments. Today only about 25-40% of those merchants accept cards. Nonetheless, they all have a bank account.

Banks should therefore not miss the opportunity to invest in the on-boarding of small merchants and develop solutions to address their needs. Together with the grey economy, which governments in the EU have started to tackle more and more, the lack of relevant solutions and the high cost of acceptance are key factors for merchants not to accept electronic payments. The interchange reduction and the adoption of MPOS terminals\(^5\) are helping to remove such hurdles, thereby further increasing the benefit of accepting card payments while reducing costs. The cost of an MPOS terminal is limited while its perceived value is high.

In addition, MPOS allows increasing the return of investment on the terminals by:

- expanding the breadth of value added services which merchants can provide to their customers and thereby creating new revenue opportunities;
- providing solutions which help small merchants manage their own business and cash flow.

Banks are the best positioned to address this opportunity: having an existing relationship with those customers makes it easier for them to satisfy the “know your customer” requirements and therefore to reduce the cost and burden of on-boarding small merchants.

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\(^5\) Mobile Point of Sale (MPOS) is a merchant acceptance device that enables accepting card payments using a mobile phone or tablet.
In conclusion

Regulation and technology are changing the payment industry. This change represents a challenge, but it also provides many opportunities to those who will be willing to proactively take action. It is therefore critical to remain focused on ensuring the best possible customer experience. Increasing agility and flexibility to adapt to the “weather” conditions will also be very important factors considering the intensifying competition and the faster pace of change.

Example: How can other financial services players use card payments to solve business problems

MPOS opens opportunities not just for banks to better serve SME-customers but also for other financial services players to optimize their management of payments. A relevant example is what a leading European insurance group has done together with MasterCard and other key partners in Hungary. All sales agents have been equipped with a MPOS with a fully customized application both on front and back end to ensure a complete integration with the company systems. By using the application, not only can customers pay directly the insurance premium to the sales agent with their credit or debit cards, but the cardholder also receives an email confirmation of the payment.

This solution has enabled the insurance group to achieve important benefits including:

- Increase efficiency of sales agents
- Reduce significantly new business cancellation
- Avoid generic cash acceptance issue, with all the problems related to anti-money laundering requirements
- Reduce operating and administrative costs
- Improve cash flow management
Making use of big data to create value for the customer

Philippe Baecke
Professor at Vlerick Business School

Interview by Marion Dupire

You have been working on the use of technology in the banking sector. In your view, what is the bank of the future?

“Indeed I have been working on incorporating new technologies, and more specifically on the incorporation of data sources within banks.

What I see is an evolution from product-oriented to customer-centric banks. Banks are now selling advice, in addition to financial products. As a result, nowadays the banks that perform better are the ones that know their customers better from the data they have. In terms of big data analytics, the financial sector is one of the leading sectors, together with tech, mobile and retail industries.

However, it is uncertain to me that banks should create all new business models. In order to improve customer experience, I rather think that banks need to collaborate more with other companies. It can be small start-up companies that create mobile payment applications for example. But it can also be larger companies like retailers or telecom providers for the development of online payment technologies. As an illustration, digital ecosystems with banks, telecom providers and retailers are created, such as “Sixdots” in Belgium or “CurrentC” in the US. It is a big change for banks which were used to work independently and are now forced to collaborate more with other companies.

We might even go one step further: banks might start collaborating not only for mobile banking but also to get a better view of their customers. At this moment, this is not at an operational level but you may envision banks and telecom providers starting to collaborate with each other in order to understand their customers better. The big challenge then becomes privacy: the opt-in of the customer is needed before doing things like that. One example outside the banking sector is “Weve”, which is a joint venture of 3 telecom operators in the UK to offer new services for personalized marketing communication by mobile phones.”
There is a view that tech companies like Google or Amazon may become banks because of their technological advantage. This would constitute a threat for existing banks. What is your view on this?

“The threat is certainly there. Some of these companies have already obtained a banking license and can start immediately. From a customer-centric point of view, they would probably perform very well because they have more customer data available than banks. However, customer centricity is not only about front office but also about back-office, where Google or Amazon lack a bit of experience. It is true that banks are not as agile as the technology companies but tech companies would probably lag behind on the operational aspects of banking activities. And a weak back-office will make it difficult to offer good front-office. Again, this is a reason why collaboration might be a better option than competition. I think that would be the big challenge for tech companies. However if they would be able to overcome this, then for sure they are a big threat for banks because they have more data and can become more relevant to their customers.”

How should banks deal with the issue of privacy given the current context where rebuilding trust in financial institutions is a key challenge?

“Privacy is indeed the biggest hurdle in the strategy of using big data to know customers better. It is not really about legislation, but more about ethics: the customer first needs to accept that the bank implements such a strategy. If the customer finds it too intrusive, it will not work in the end. During the implementation of this customer-centric data strategy, consumer ethics should always be taken into account. There is a very thin line between being intrusive and being relevant. This is something very important to consider.

However, companies that are relevant to the customer typically have a high satisfaction score. It is possible to make use of the data, be relevant and obtain high customer satisfaction. One example is Amazon which extensively uses customer data and has a net promoter score of about 70%. The reason of this good performance is that they make use of the data in a way that is relevant for the customer. As long as the benefits to the customers are perceived higher than the costs, they will be willing to give away the data.

You need to be relevant but you cannot be intrusive. In the end, the goal should always be to create value for the customer, which is the definition of a customer-centric strategy. In this way, the customer will be eager to give away the data because he gets something valuable in return.

Banks should see the privacy issue as follows: how can we make use of the data to give value to the customer? For example, KBC has created an app that keeps track of customer expenses and enables to visualize them in a structured way. For KBC itself, there is not a lot of value in this, except that it creates a lot of value to the customer who therefore becomes more willing to give away data. Making use of data only for the bank’s own good will never last.

6 Standard indicator to measure customer satisfaction
It is true that banks already lack trust because of the crisis. But on the other hand, banks can gain trust again by being relevant. They have to be more cautious about privacy than telecom operators for example, because banking is simply a more sensitive issue than communication nowadays.

Privacy will even become a bigger challenge in the future because of legislation. In 2017, the European Commission will implement a new legislation in which the customer agreement to use his/her data will have to be more explicit. In the US, privacy is less of a big issue; Wells Fargo was for instance allowed to implement third-party promotion services, while ING could not implement such a strategy because of the reticence of their customers. Ethics is even more important than legislation.

I would also like to emphasize the fact that a lot of predictions are made at banks. It can be predictions about whether a customer will purchase a product or whether a customer will leave the company. Banks should now start making predictions on whether the customer is privacy-sensitive. They can then make use of this information to evaluate whether making highly personalized offers will be properly valued by the customer.”

**The focus of your research is mainly on the use of big data in the banking sector. Do you also see applications for insurance companies?**

“In insurance companies, a new trend is to make use of sensor data. One typical example is putting a sensor in the customer’s car in order to get data on the customer’s driving behaviour in return for a discount to the insurance contract. In the US, there are already companies implementing it while in Belgium it is still in a testing phase, at least to my knowledge.

With this kind of sensor, new data is coming in, which can be used to better estimate the price of an insurance policy, an immediate financial benefit for the company and the customer. Each of these technology innovations should trigger insurance companies to ask themselves: ‘how can I increase customer experience with this?’ Insurance companies may think of new services to be provided based on these data. They may therefore create new business models based on these new data available. But they should always think about how to create value for the customer. With the sensor example it could be predicting when the customer needs to replace his/her tires. This service would directly create value to the customer who, as a result, would be more willing to give away his data. It has to be a win-win situation.”

**Technology seems to move at a very fast pace, while banks are very complex and heavy organizations. This can be seen as an important disadvantage to evolve quickly in response to new technologies. What is your view on this?**

“I totally agree that the big challenge for banks and insurance companies is that they do not have the agility that the tech companies have. One of the solutions is to create a start-up within your own big company. This is known as the sandbox model where a sandbox is created within the big castle. People in the sandbox have more flexibility than in the big castle, they have less restrictions, more freedom, they can try new business models. The big advantage is that it allows to fail fast in case a new innovation does not work.
If the new business model works, then there is a challenge to bring it back to the castle. My recommendation there would be to build the sandbox with people from inside the organization instead of delegating the full task to external consultants, because internal people would be more able to bring the new business model back to the castle.”

At Vlerick you recently launched an Executive Masterclass on big data, can you briefly describe the content of the programme and give feedback on the first session?

“There are different ways to make use of data. It can be in a descriptive way, or to produce predictive statistics and translate predictions into immediate actions with prescriptive analytics. What we see is an evolution from descriptive statistics to predictive and prescriptive analytics. Now that more and more new types of information are now coming in, e.g. with phone calls, social media, emails, location, sensors..., the challenge for banks and other companies is to incorporate the big data to improve their predictive models.

The programme (click here) is mainly targeted at executives from tech companies, banks, telecom and retail, where the use of big data is particularly relevant. It is organized around four main dimensions that companies should take into account in making use of big data. These dimensions are based on an academic publication of my colleague Prof. Stijn Viaene, who is also involved in this programme.

1. **Modeling part**: it is crucial to break down the walls that typically exist between business domains, and notably between IT people and data analysts who need to optimally collaborate with each other. Implementing a good big data strategy requires a good understanding about data and technique, but also on the business. Without this synergy, the value from the data can easily be lost. This is also the reason why this programme aims to bring together these different profiles. Which is very challenging for the faculty, but a great learning experience for the participants.
2. **Discovery**: this part focuses on making use of new technologies in order to transform the huge amount of data into useful information. We want to give the people an insight on how this works.

3. **Operationalizing**: how to incorporate all this in your organization? How do you bring this into the big castle? A huge challenge that we see within banks is that they want to become more customer-centric but they are not able to create a single-customer view, connecting all the dots of data they have. Data are collected in different data marts (sales, marketing...), but banks do not have a single view on all the data. That is a big challenge from an IT point of view: banks need to re-architect their IT infrastructure in a way that brings the data in a single system.

4. **Cultivating**: How can we transpose a no-data-driven culture to a data-driven one? In this fourth part we investigate the models that make predictions from the data and see how to make sure that people actually make use of these models once implemented.

The programme also includes visits of Microsoft, HP, Oracle in Seattle and Silicon Valley.

A first wave already took place, with people from different backgrounds including business, IT and data scientists. Overall there were very nice synergies between the participants and the feedback was in general very good!”
Delivering shareholder value amid complex regulatory and supervisory landscapes

Mohamed Azzim
Professor at Vlerick Business School

In the aftermath of the financial turmoil, banks have been facing significant challenges to accommodate the increasing complexity of regulation and supervision, and at the same time create shareholder value. These external pressures from regulators, supervisors and shareholders will have a critical influence on the way in which boardrooms define their strategies and bank managers transform these strategies into effective business models. Ultimately, banks will need to remain competitive in the market whilst being responsive to regulatory, supervisory, and shareholder pressures.

In the years to come, regulators will be looking to ensure the stability of financial systems through complex demands on capital and liquidity, and supervisors will strive to promptly predict any eventual breach in the implementation of such demands.

The introduction of heightened requirements for capital (stress tests, changes in the standardization of risk-weights, limits on the use of internal models, implementation of leverage ratios, and countercyclical and systemic capital buffers) and liquidity (implementation of the coverage and net stable funding ratios) is intended to safeguard the stability of the financial system from future financial turmoil.

This complex set of regulatory and supervisory mechanisms implies a potential higher cost of capital compared to the return on equity, and thus challenges the creation of shareholder value and the attraction of capital.

Shareholders will be looking for returns that are proportionate to the level of risk of their investment in a setting in which regulatory mechanisms (capital buffers and stress tests) may also limit dividend distribution and share repurchases; and resolution mechanisms (capital buffer for bail-in and simplification of bank structures) no longer guarantee minimum payoff for their equity. Moreover, the complex set of regulatory and supervisory mechanisms being put into place may have unintended consequences on the functioning of capital markets, for example, they may limit banks from using dividends and share repurchases as signaling and agency cost reduction instruments and thereby reduce the potential to attract external financing in the form of debt and equity.

It is in the midst of this complexity that shareholders will be demanding both that boardrooms define strategies and managers implement business models that will ultimately deliver value that is proportionate to the level of risk of their investment. This
is notwithstanding the wider regulatory and supervisory agenda that includes eventual fines banks may have to disburse in case of infringement of money and capital market rules by their employees.

Boardrooms will need to reconsider and redesign their strategies. First, they will need to take stock of their technical, market-making, managerial and human, technological, and capital resources to define the strategies for their banks. Second, they will need to assess the geographic and product segments in which their resources are likely to be most effective in terms of delivering shareholder value. Third, they will need to identify the most appropriate channels to service customers.

Managers will have to translate the strategies designed by their boards into effective business models. This involves selecting an appropriate balance sheet (namely capital, asset and funding structures) and consequently income structure that is consistent with the resources possessed by banks and the strategic orientation given to them by their boards.

Bank business models most often encompass retail, wholesale or capital markets. In the retail model, banks secure funding from stable sources, namely customer deposits or long-term debt, and provide loans to customers. In the wholesale model, banks secure their funding mainly from the interbank market and provide loans to corporate and retail customers and other interbank market participants. In the capital markets or trading or investment model, banks secure their funding primarily from wholesale markets and hold a significant amount of tradable securities.

The categorization of business models is broad and in practice banks maintain their involvement in a mix of models to cater to the needs of their customers with one model predominating over the others. The business model adopted by a particular bank is determined by the composition of loans, securities, trading book and interbank lending on the asset side, and deposits, short-term debt, long-term funding and interbank borrowing on the liability side.

The model selected by the bank will determine its performance, return on assets (ROA) and return on equity (ROE), and risk, the volatility of earnings and the Z-score (the capital to asset ratio plus the equity to total asset ratio divided by the standard deviation of the ROA). These metrics may be elaborated to consider risk-adjusted performance, namely risk-adjusted return on capital (RAROC). These backward-looking, or balance-sheet and income-statement, metrics are key components that markets and rating agencies factor in establishing forward-looking metrics of value, the market to book value (Tobin’s q), and the excess market value (difference between the q of the bank and the q of comparable banks), and risk, the expected default frequency (EDF) and the credit default spreads (CDS).

Extensive empirical analyses are required to determine the model or mix of models that will deliver shareholder value for a proportionate level of risk and guarantee financial stability. Nevertheless, it is important to remember that a business model or mix of business models that may outperform others at one point in time may not necessarily do so at another point in time.

The implementation of the regulatory and supervisory mechanisms may also vary from one jurisdiction to another. This points towards the predominance of one business model or mix of models in certain jurisdictions and the opportunity for geographic diversification, and therefore calls for further oversight from supranational ombudsmen,
in particular with respect to grey zones, i.e. parts of jurisdictions that do not fall under the home and host country oversight. The banking union in Europe also aims to address this issue.

Creating shareholder value that is proportionate to the level of risk amid the complex regulatory and supervisory landscapes is indeed a tough challenge. Banks have shown over time that they can adapt to the changing regulatory and supervisory landscapes. With the right strategies and appropriate mix of business models, boardrooms and managers will deliver shareholder value to their investors not least because it is through value creation that they will guarantee the long-term sustainability of their banks.
Quantitative Easing for the Eurozone: Origin, impact and unintended consequences.

Freddy Van den Spiegel
Professor at Free University Brussels and Vlerick Business School

Quantitative easing

Quantitative easing is the ultimate tool for central banks, which is only used when all other tools, including extremely low or even negative interest rates, are not producing the hoped-for effect. That can be the case when the transmission mechanisms for monetary policy are not functioning or in case of a liquidity trap, when the general expectations are so pessimistic that low interest rates and ample liquidity cannot convince borrowers to take loans.

Quantitative easing consists of the central bank buying itself massively securities in a planned and openly communicated way. These securities, essentially government bonds and occasionally also private sector debt can be bought on the secondary and/or primary markets. Buying the bonds on the primary market, which means directly from the issuer, is called “monetary financing”. In that case, governments can finance their deficits without attracting investors as the central bank is just “printing” the money and buys the bonds. If these bonds are bought on the secondary market, governments have first to find investors in the primary markets, after which the central bank buys the issued bonds on the secondary markets. Also in that case, the financing of deficits is facilitated because the continuous buying of bonds by the central bank will drive the long term interest rate increasingly lower. Because of the strict legal framework in the EU, the ECB can only buy bonds on the secondary market (Treaty on the functioning of the European union, 2007, art 123). Quantitative easing can be one of the factors leading or increasing the pressure towards low or even negative interest rates.

Quantitative easing is considered to be a dangerous instrument for several reasons. It increases the supply of money in an artificial way, which could ultimately lead to inflation; it facilitates life for (public) borrowers, which could lead to more bad debt and
insolvencies in the future; it distorts markets as it brings the interest rates to dangerously low levels; and the exit of quantitative easing is a very delicate operation, often leading to financial panic, as historical evidence demonstrates (Claeys, Darvas, 2015). The impact of QE is further analyzed in the next paragraph.

Many central banks started a QE program since the start of the crisis in 2008. The US central bank started its QE program already in November 2008, ended its buying program in October 2014 and is now discussing the exit strategy. The ECB only started its QE program in March 2015, called the Public Sector Purchasing Program (PSPP), which consists of the commitment of the Eurozone central banks to buy every month 60 billion € public bonds, until September 2016.

**Effects of Quantitative easing**

Quantitative easing is a powerful instrument, with lots of direct and indirect effects, some of them intended (or positive), some of them unintended (or negative effects). Some of these effects materialize in the short term, others more in the medium to long term. Figure 1 gives an overview of these effects.

There is a direct impact on short and long term interest rates, depending on the assets that the central bank buys. When interest rates are already very low, this impact can be negligible, but nevertheless real.

More money in circulation and the fact that there is more demand for specific securities facilitates directly borrowing for those issuers, even if the central bank is buying bonds on the secondary markets.

The announcement of QE can have an immediate downward effect on the exchange rate of the currency, as the outlook for investors deteriorates. Lower exchange rates improve external competitiveness and exports. Clearly, the announcement of QE for the Euro supported the depreciation of almost 20% of the Euro/Dollar rate.

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<td><strong>SHORT TERM</strong></td>
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As QE creates plenty of new liquidity, the immediate risks for market crashes is reduced. Risk premiums in general come down, as low interest rates push investors to take more risky assets in order to get an acceptable level of return.

The increased money supply, together with the financial repression of sometimes negative interest rates, and the outlook for increasing inflation later on, can stimulate immediate demand in the real economy.

There are also short term negative effects such as the fact that QE distorts the normal functioning of markets, depending on the amounts and the specific markets where securities are bought by the central bank.

Furthermore, artificially lower risk premiums can also be an indicator for growing bubbles.

In the medium to long run, there are no specific positive effects of QE, unless it has an impact on the recovery of the economy and leads to sustainable long term higher growth. Central banks, and especially the ECB is however warning against this hope: QE can give a short term positive shock to the economy, but has to be accompanied by “structural reform” in order to have a sustainable effect.

The potential negative effects of QE in the medium to long term however are very clear.

Institutional investors such as life insurance companies and pension funds run the risk of insolvency, as the return on assets can get below the contractual return on long term liabilities.

QE continued over a longer period of time makes life for borrowers (too) easy. Especially governments can take the advantages without continuing the necessary and difficult structural reform of the economy to improve structural competitiveness. In that case, QE is only increasing the problem of excessive debt and bad loans.

If QE leads to bubbles in some asset real or financial markets, the risk of crashes increases with time.

Lower exchange rates support international competitiveness and export, but will also lead to reactions of other currency zones if they consider the lower exchange rate as an unfair instrument of competition. Currency wars can be a consequence.

Finally, the decision to end the QE, somewhere in the future, and defining the path to normalize the situation is a politically very sensitive process. There will always be analysts in favor of exit as soon as the first signs of recovery appear, in order to avoid inflation to increase too much. Others will be more in favor of waiting because an early exit could jeopardize the recovery.

From this overview can be concluded that QE delivers a broad range of short term advantages to promote economic recovery. However, the longer the QE takes, the more important will be the medium/long term effects which are essentially negative. In other words, QE seems to be a shock therapy to the economy which should not take too long. It is certainly not a fundamental solution for structural problems underneath the deteriorated economic situation.
Scenario’s for the future

Many scenarios can be imagined about how the Eurozone will get out of the QE phase. Essentially two are discussed below: one in which QE together with the other interventions are successful, and one in which the cocktail of policies, including QE, is failing.

**Scenario of successful QE**

The most optimal outcome of QE for Europe is that the actual signs of recovery of the economy become gradually stronger, until growth gets higher than 1,5% (the actual forecast of the commission for 2016). EU initiatives like the Juncker plan, help this recovery based on sustainable long term finance. The weaker Member states continue successfully their structural reform and confirm the actual improvement with gradually reducing government debt and a positive current account. Meanwhile, the EU legal and governance framework is further strengthened, with more discipline and coordination of economic policies of Member states and more EU money available to intervene in case of unexpected problems. Interest rates can be kept low for an extended period, as inflationary pressures remain subdued. The debt levels are stabilized, which means that they come down as a percentage of GDP. The financial system is further reformed, with a smaller banking system and more financial market activity. Fears that QE will lead to excessive inflation and bubbles do not materialize: after all, the supplementary volume of debt from QE is foreseen to be 1600 bn €, less than 5% of the existing debt levels. As the economy gets stronger, the ECB gradually starts an exit from QE. That can be done in an “automatic” way by not renewing ECB investments in government bonds when they come at maturity, or even more aggressively by selling government bonds in order to reduce available liquidity.

This almost sounds like a fairy tale, and indeed, it requires a lot of conditions to be fulfilled, but it is not impossible, even if parts of the puzzle are only partially realized.

**What if QE is not successful?**

It can of course not be excluded that the economic outlook for the Eurozone is not improving, despite QE, but that the EU and the Eurozone is just muddling through or is even confronted with new shocks and problems such as recession, political disputes and/or a renewed financial crisis. If QE, being the ultimate tool for monetary policy of central banks, is not able to produce the hoped-for results, other instruments of economic policy can still be implemented, going from capital controls, wealth taxes, some member states leaving the Eurozone, nationalization of parts of the financial system (such as banks), to even additional failing member states requiring help from the IMF.

As all possible policies under this scenario are far more intrusive and disruptive than QE, we can only hope that they will not be needed.

**Conclusion**

Since the crisis of 2008, the EU and more specifically the Eurozone is in a bad shape. As the home region for an extremely large banking sector, the effects of the banking crisis were far more severe than in other parts of the world and were even threatening a number of Member states. As there was no political framework available to stabilize these weaker member states, the banking crisis became a sovereign crisis in 2011, threatening the single currency. A policy framework to manage this crisis was gradually
developed, consisting of more discipline among member states, a (partial) banking union and mechanisms to resolve problems with European funds. But in the meantime, the economy did not recover, the levels of debt increased and the monetary policy instruments used were gradually extended.

The ECB is now implementing its ultimate tool, quantitative easing, which also the US and many other countries have used since 2009. QE remains controversial because it is not part of the conventional toolbox of central banks and history shows that “printing” money to finance the short term problems often leads to more serious problems in the long run. However, there is no valid alternative, and the experience of the US is rather encouraging.

QE alone will not bring a fundamental solution, but if it is combined with the necessary structural reforms at Member state and Eurozone levels, as planned, it can provide the necessary oxygen for a certain period of time to facilitate the reforms.

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