Financial Regulatory Outlook Conference 2018

Evolve or Perish – The Global Forces changing the business of Banks

Geopolitical Threats and Opportunities for Europe

Palazzo Taverna, Rome 27/28th November 2018

As I have told some of you before, I was staying in the Borghese gardens when I woke up two and a half years ago to the news that my country had voted for Brexit. Notwithstanding this alarming memory, it is a huge pleasure to be in Rome and I thank you for inviting me back here to be with you at this conference.

When thinking about what I might say to you this evening I first thought I might discuss the macroeconomic challenges facing the eurozone; how the most productive EU economies benefit most from an undervalued Euro; how monetary union is creating an unintended but damaging divergence between the north and the south, with massive persistent surpluses in the former and deficits in the latter; and how domestic demand has been suppressed in the periphery to sustain the union.

But then I thought that - as a Briton speaking in Rome - this might seem rather unattractive, if not downright undiplomatic.

I also considered talking about the problems created by the shifting political landscape; the popular disenchantment with mainstream politics; the lack of respect for experts and great public institutions; the lack of informed public debate about the balance between the safety and soundness of the financial system and the need for economic growth; and the need for a clearer defence of open markets and capitalism.

But then I realised that – as a Briton speaking in Rome – this too might seem rather presumptuous.

So I thought I would speak briefly about two other challenges that I see for Europe, its economy and financial system and its regulators: trust and technology. In truth they are global challenges; but clearly also highly relevant for our own region here.

Let me first address trust, and particularly the loss of trust in the financial system and financial markets that has occurred in the past decade.

The crisis that broke over us 10 years ago inflicted extraordinary damage. On top of the staggering outright losses incurred by firms and individuals, the fines imposed for

misconduct now total almost $400 billion, the cost of remediation for firms runs to between $5-10 billion, and a generation of bankers have been wiped out.

To give you sense of scale, $400 billion, had it been retained as capital in the banking system, would have supported well over $5 trillion in bank lending – equivalent to about 40% of all bank lending today in the United States.

However, the real harm done a decade ago was not financial, but rather reputational damage - to trust in the financial system, in financial services firms and in financial services regulators.   And this reputational harm and loss of trust has had a real cost to us all in terms of higher costs of capital, lost opportunity and the erosion of the social licence to operate needed by the financial services industry.

A decade on, countless surveys show that trust in financial services and banking in particular is still very low: both by the public in bankers and by employees in banks with respect to their own firms.

I was in Australia three weeks ago when coincidentally the latest Trust Project survey findings revealed that just 18% of Australian citizens trust their banks; so you can work out quite easily how many don't trust them.

Of course regulators have been very busy in the past decade, repairing things that were broken and making individual firms and the system as a whole much safer.

But – and this is the central message I want to convey this evening in connection with trust - regulation cannot fix the "trust deficit" that persists; however much we may want it to.

Fundamentally, this is because the conduct and culture of people and firms in financial services are determined by factors well outside the scope of financial regulation; factors that are the province of psychology, social science, behavioural economics, philosophy and the law; that manifest themselves in complex ways; and in which a series of collective action and prisoners dilemma problems make embedded conflicts of interest very hard to address.

It is also fair to point out that regulation can struggle with the rapid pace of innovation in the private sector; the asymmetric imbalance of knowledge and resources between public sector regulators and the private sector; and a global financial services industry that transcends national jurisdictional and regulatory boundaries.

I must emphasise that I am not arguing that regulation is a bad idea or doomed to fail – rather that it is a necessary, but not sufficient, condition for fair and effective financial services.

Something else beyond regulation has to be addressed if trust in financial services is to be rebuilt.

If you need proof of this thesis then I refer you to work that has been done by the FMSB recently which shows that over 235 years since the dawn of modern capital markets, across hundreds of cases of misconduct in finance in 25 jurisdictions worldwide, just 14 types of behaviour repeat again and again across time, markets and jurisdictions and together explain effectively all market misconduct that has been prosecuted.

Every time a major problem occurs, the same cycle ensues: an investigation is conducted, an authoritative report is written, new laws are passed and regulation created. Then a few years later, in another part of the world or another market – or even in the same part of the world and the same market – precisely the same misconduct repeats itself.

The law in the UK that was used to prosecute LIBOR manipulators in 2014 was the very same law that was created in 1814 to prosecute the first manipulators on the UK government bond market at the end of the Napoleonic Wars.

I believe that the biggest missing pre-requisite for trust to be rebuilt is a comprehensive and sustained effort by the private sector, undertaken willingly and not at the end of the regulators gun barrel, to define the standards by which business will be done and how the private sector will measure itself against these standards verifiably, and in public.

Only with such public, voluntary and measurable scrutiny can trustworthiness be established and the first steps taken to rebuilding trust itself.

There is already good work being done in this area, not only by my organisation FMSB, by the UK Banking Standards Board and other parallel organisations; but there is quite a steep hill still to climb before this work is complete.

Let me now turn to my second topic: technology.

I believe that massive technological advances in computer processing power, data harvesting and storage, machine learning, open access, cloud computing and the distributed ledger, as well as changes to come – for example in quantum computing – all will mean very significant changes over the next 15-20 years in financial services and, necessarily therefore also, for regulation.

Many of these changes will result in huge benefits, for example in the area of financial inclusion where they could enable the 1.5 billion people globally who have no access to banking to receive financial services, or in combatting financial crime where new

technology, data science and artificial intelligence should materially help fight the criminal and terrorist exploitation of financial services intermediaries.

Without in any way underplaying these benefits I want to focus this evening on the challenges that will also be encountered, as they must be addressed but haven't yet received much attention.

The biggest change that new technology will bring is the disaggregation of what have hitherto been highly integrated bank business models – in which essentially all activities, risk, infrastructure and governance have been located inside a single legal entity or group of closely related legal entities. This corporate structure has in turn driven the approach to bank regulation, which has everywhere in the world developed policies and supervision tailored to the legal entity structure of the industry.

In future it is most likely that material banking risks, and the accountability for those risks, will not sit so neatly inside simple, easily-supervisable, legal entities.

It is highly probable that bank business models will change materially to reflect the opportunities offered by advanced data science and AI. It seems logical that "data rewards" available to those firms with advanced data harvesting and analysis capabilities will confer greater advantages than simple algorithmic prowess. In this case, it seems likely that firms with the best data scientists are likely to have a systematic competitive advantage over their peers; and in all likelihood will be able to grow at a structurally higher rate.

If this is the case it is likely that such firms will outstrip medium and smaller sized firms to create a new tier of "globally significant" financial services providers enabled by data science – potentially a very different group of firms from today's GSIBs.

Different skills will be needed by banks to compete in a highly technology enabled, data rich world. Where previously asset gathering and balance sheet management were critical, in future data gathering and analysis will be crucial. Where scale and the techniques of mass production have been critical to compete on cost, in future tailoring services to specific customer profile will be key. Where personal relationship management was a critical differentiator, in a digitised world optimising the "best fit" for your customer using data science will be essential. Where firms have hitherto retained customers by raising barriers to exit, they will in future have to work harder to create sticky retention-ties based on the quality, excitement and convenience of their data-enabled services. Where human judgement has been a differentiating advantage, in future competition will be driven by data-fuelled artificial intelligence.

Faced with these challenges some firms will likely opt to become "dumb pipes" to other product providers while other firms will choose to become "supermarkets" offering a

wide range of banking, and non-banking, services under one roof. Probably, some of these supermarkets will have their ancestry in technology and e-commerce rather than in banking. Not-for-profit industry utilities and infrastructure providers are likely to be attracted by the opportunities presented by data harvesting and analysis, just as much as traditional profit-maximisers.

The human resources, talent management and governance structures of firms will likely be severely tested by these changes, and firm cultures will be tried in ways that they have not previously. In all probability we will face a war for data science talent similar or greater in intensity to that experienced by banking in the heady days of the late twentieth century.

All these developments will create challenges for the regulators.

The shape of the regulatory perimeter will need to be revisited. And where risk sits inside the perimeter will change.

For macro-prudential regulators, the shape and structure of the financial services system will change. But it may also become less diverse – due to the accelerated growth opportunities for data leaders, or because of the arrival in financial services of new, concentrated technology firms. The financial system is likely to be more interconnected, a particular hazard already identified by the G20 in 2009 and which regulators have been trying to mitigate for the past decade. The types of risk that are systemic – potentially a hazard to the entire financial system – will be different. And the viability of firms that are today traditional, major players in banking may be threatened if their business models are "salami-sliced" by new firms gouging profitable tranches of the integrated banking industry.

Micro-prudential regulators face a digital world with analogue tools. The traditional micro-prudential tools – of supervision, capital and liquidity - may be inadequate safeguards of safety and soundness. Risk distributed across multiple technology providers will be much more difficult to assess than in the current integrated bank with bilateral or central counterparty risk profiles. Individual accountability regimes will be sorely tested, or even undermined, by artificial intelligence-driven decision making: who is making the decision in an algorithm that has "taught itself" based on past observations that are not visible to human management? Regulators will also find it useful, or even essential, to standardise or harmonise their rule books to automate and make them AI-interpretable; and will have to rethink how they gather and interpret regulatory data from firms they supervise.

For conduct regulators interesting challenges will arise from the changes in the way that consumers interact with financial services providers in a data-enabled, high technology market. Less experienced consumers may be able to access sophisticated

products and services rather more easily than would be ideal. The way in which consumer protection is provided may need to change markedly. And judging the effectiveness, or otherwise, of competition will need new skills. While sophisticated AI and strong data analysis may make conduct problems less frequent, the interconnectedness of the financial system may well make them larger, more contagious and more serious when they do occur.

Regulator challenges will not end there, either. Banking and financial services regulators will need to think through, in the light of the probable changes I have described above, quite a few fundamental issues.

Should financial services regulators try to address a much changed, technology-driven market by expanding their own responsibilities and purview; or by finding friends among data regulators? And if the latter, how should regulatory collaboration be ensured to deliver effective policy and oversight? In particular, how should disparate and under-developed personal data standards be developed to protect financial services customers and providers?

An important related question is how technology and AI may impact the legal framework and decision making that underpins the financial services industry and regulatory structures that oversee it? How do we want ethical dilemmas that might have been decided using human judgement in the traditional legal system to be resolved in a world when, increasingly, artificial intelligence may be being used to cut the cost and increase the efficiency of legal dispute resolution? There is also an uncomfortable tension between global technology business models and the (necessarily) local focus of legal structures to safeguard consumers of technology services.

Underpinning all of the above is of course a bigger existential question: namely what degree of delegation society will accept in terms of financial services data ownership, management and analysis. This is particularly pertinent in view of the damage inflicted on trust in financial services in the past decade. There are those who argue that consumers will take a different attitude to privacy for personal financial data to that they have for social media data, and that this will limit the scale of the challenge to financial services providers, but this remains to be tested.

With all these questions unanswered – even unanswerable - today it would be easy to become discouraged. But I am an optimist and I look forward to the technology-enabled, data-rich future. In particular I am encouraged by the idea that there are obvious links between the trust "challenge" and the opportunities created by new technology.

Greater transparency about how business gets done and decisions get made is key to rebuilding trustworthiness. And the techniques of data harvesting and analysis can

create this transparency. So, while addressing the many questions posed by data science and new technology, we need also to be asking ourselves how these powerful new tools can be used to tackle the deficit of public and market user trust that has, very unfortunately come to bedevil financial services.

By answering this question I believe we can do much to create the stronger and more highly regarded financial services industry and markets that we need to support economic growth for our children.

Ladies and gentlemen, thank you for your attention.