## FCA TechSprint: It takes a network to defeat a network

## By Denisse Rudich

While regulatory events are interesting for those who chose to attend, it is rare to hear great praise showered upon such events. This week, the highly energetic tech team at UK's Financial Conduct Authority (FCA) hosted what has been dubbed a "ground-breaking" three-day AML & Financial Crime TechSprint at E&Y offices in London. During those three days, social media became awash with participants applauding the "inspiring," "outstanding," and "incredible" experience that had been created for them.

The idea behind the event was in itself ambitious. The FCA decided to bring together developers, subject matters experts, senior executives and international regulators to create prototype solutions to show the positive role that new technology can play in financial crime prevention. But not just any new technology but rather new technology developed through industry and international collaboration. This is in recognition that only by effecting change through global cooperation can we increase the 1% of the estimated \$1.6trillion (UN statistic) of illicit financial flows that are detected, seized or frozen. Effectively, it was a recognition that traditional methods of fighting financial crime do not work.

The first day opened with speeches from members of the FCA. Nick Cook, Head of RegTech and Advanced Analytics, showed a video highlighting the social harm of financial crime. Below are some hard hitting statistics that were shared throughout the week:

- \$150bn is made from forced labour every year which is more than \$4,750 per second
- £320 billion is the value of the drug trade
- £90 billion is laundered in the UK according to the National Crime Agency
- Phishing and identity theft are now cited as the most widespread fraud risks faced by firms
- British banks spend £5 billion annually combating financial crime, more than £1 billion spent by the UK on prisons

Cook went on to tell all participants that they needed to forget who they usually work for, bring all their skills, and work together to solve a global problem. Effectively, "it takes a network to defeat a network."

Margaret Megan Butler, Director of Supervision - Investment, Wholesale and Specialists at the FCA also spoke to the participants that first morning, highlighting that "we have a public duty to explore all opportunities to combat crime." Butler delivered the following key messages in her speech:

- Financial services firms play a major role in fighting financial crime and are not judged on the amount they spend to fight crime, but rather their ability to do so effectively. She highlighted the following figures obtained from the Annual Financial Crime return it introduced in 2016:
  - o 920,000 internal suspicious activity reports were have were reported in the UK
  - More than 1.1million prospective customers were turned away by financial services firms due to financial crime concerns
  - o 370,000 existing customer relationships were exited for the same reason
- The FCA is supportive of firms using technology to improve AML/CTF compliance as technology is increasingly essential in combatting financial crime.

- There are practical obstacles to applying new technologies in financial institutions, such as the need to integrate legacy systems dating back to the 70's, as well as challenges around poor data quality and fragmentation.
- There are concerns that proprietary algorithms could evolve to such an extent that developers may not understand why a machine is making the recommendations it is making, effectively with machine learning becoming 'incomprehensible to humans'.
- Firms need to test newer, cheaper technology to ensure that it works properly before replacing older, expensive systems that do work.

Nevertheless, Butler emphasised that if "there are methods, innovations, or technologies that help...combat crime, tell regulators about them – and do not be afraid to move first."

Over the next two days, 200 participants from 107 organizations beavered away to explore, develop and combine technologies to tackle 15 user cases reflecting existing challenges in the AML/CTF space. User cases ranged from addressing the customer due diligence and data protection conundrum, to exploring how to improve transaction monitoring, enhancing SAR data, improving capital markets monitoring and assessing how to use cryptography and blockchain for better data sharing across borders. The FCA worked very hard to ensure that cross-industry collaboration was taking place. And there was an infectious energy and buzz in the air as ideas were explored, challenged and developed with a flow of creativity. Some of the technology explored includes:

- Using the Zero Knowledge Proof technology developed by Sedicii to facilitate customer due diligence while maintaining data protection
- Using Natural Language Processing (NPL) to make SARs more effective
- Employing digital identity certificates to make banking safer
- The use of homomorphic encryption to improve data sharing
- Exploring metadata to enhance transaction monitoring
- Applying network analysis and surveillance to track unusual activity cross-border and allow for the creation of super SARs
- Creation of solutions to make it harder for criminals to use crypto-assets
- Using digital ledged technology carry out cross-border CDD/KYC
- The creation of self-sustaining blacklists through machine-learning

On the 4th day, the FCA brought together 400 individuals from 300 organizations, including figures, technology specialists and global regulators to further discuss how to work together to tackle some of "the biggest, and most egregious, issues facing the financial sector" and also to see the solutions that had been developed.

In the speech delivered by Chris Woolard, Executive Director of Strategy and Competition at the FCA, he spoke about a couple of key initiatives that the FCA are working on. These initiatives show how the FCA has embraced a leadership role in promoting international collaboration amongst regulators in the technology space. Earlier this year, the FCA launched the world's first global sandbox to allow for innovative products and services to be tested across different jurisdictions, making it easier for them to operate globally. While supporting competition and the growth of emerging technology, this also has the advantage of allowing regulators to work together to identify and solve cross-border regulatory issues that affect them all. Additionally, the FCA has signed ten cooperation agreements with eight different countries which allows for the sharing of market trends, and "support cross-border business in a sensible way." Woolard ended by indicating that he hoped that some of the solutions developed over the past few days could be in the global sandbox. The winners

were announced and their technologies, just like all other technologies showcased, could really make a massive difference in the fight against financial crime.

It is therefore essential that employees of financial institutions begin to explore the RegTech technologies that are out in the market. Not only could they lead to massive cost savings through increased efficiencies but the adoption of these technologies could also have a massive positive social impact. It is worth highlighting that before fully implementing new tech, that the technology and the firms that has developed it must be subject to extensive research and testing to ensure that financial institutions a) understand the technology on offer, b) are able to ensure that it works as they believe it should and c) that adopting this new technology does not increase their AML/CTF and operational risk. Additionally, the European Supervisory Authorities (ESAs) published an *Opinion on the use of innovative solutions by credit and financial institutions in the customer due diligence process* earlier this year. Firms who are looking to adopt this new technology will need to be aware of this as European Regulators will be using this as a guide and while some of the recommendations are practical, others will need to be adopted using a risk-based approach. On a slightly different note, financial crime functions will need to consider recruiting a different kind of resource that is able to understand how new technology works in addition to general AML/CTF knowledge.

Nevertheless, just like new technologies have helped criminals to commit wrong, new technologies can be game changers in the fight against financial crime. The applause that the FCA received last week is well-deserved and the industry is likely reap the benefits of the AML & Financial Crime TechSprint for years to come. This event showed the magic that can be created when individuals work together across industry and borders. As Nick Cook indicated on the first day, "It takes a network to fight a network."