

VODAFONE DEVELOPS ANTI-FRAUD APP WITH RIVERSAFE

Vodafone Group plc is a British multinational telecommunications company with headquarters in Newbury. One of the world's leading mobile communications providers, Vodafone operates in 26 countries and in partnership with networks in over 55 more. It has almost 444 million customers across the world and around 19.5 million in the UK. Vodafone made the first ever mobile phone call on 1 January 1985 from London to Newbury HQ. Still located in Newbury, today Vodafone employs over 13,000 people across the UK.

Awarded Splunk EMEA Professional Services Partner for 2017, RiverSafe helps organisations to maximise their investment in Splunk, providing the glue between machine data that not only ensures it's accessible but also usable and valuable. RiverSafe has helped some of the UK's largest organisations leverage their investment in Splunk to make their businesses more productive, profitable, competitive and secure.

CREATING ITS OWN CRITERIA FOR SPLUNK

Jake France, Head of Technology Security for the Information Security Technology Group for Vodafone in Ghana, approached RiverSafe initially to help with some log monitoring. The company had been using Splunk in its environment for two years and wanted to ensure that it was maximising on the value that Splunk could deliver. In Ghana Vodafone operates a prepaid market with its retail outlets and Jake quickly realised that Vodafone also needed better real time anti-fraud capability in order to prevent internal fraud between



the retail shop and Vodafone's back office systems. Jake again turned to RiverSafe for help in writing the scripts in order to develop a new anti-fraud app. Jake France comments: *"We found that there wasn't a Splunk app available to combat internal fraud and we needed this so that we could effectively reconcile revenue."*

With RiverSafe's help Jake and his team have now developed their own criteria, metrics, analytics and reporting around fraud trends as well as deep forensic information so that the Information Security Technology Group can assist various departments with any internal fraud issues.

OPERATING IN A PREPAID MARKET

The scripts and analytics developed by RiverSafe have been based on a number of use cases unique to Vodafone Ghana's telco infrastructure. The telco systems Vodafone Ghana relies upon are often not as well developed as other IT systems and therefore need more checks and balances to ensure they are not being compromised. In particular Vodafone Ghana has been going through quite a lot of consolidation, bringing together disparate systems, which can create vulnerabilities. Jake France continues: *"There are gaps or loopholes which create opportunities for theft. These can then be easily manipulated by those who understand where they are and how to penetrate them."*

For example the following are the systems that have logs currently analysed by Splunk: IN, HLR, BI, MSAN (Broadband Internet Billing), USSD, VAS, DNS and its CRM. However the following system logs are not currently analysed by Splunk but needed to be in order to obtain a more robust picture: Bluecoat, VPN, email servers, routers and switches and firewall logs.

Jake and his team started to develop and design a script for log management on these systems so that they could see the logs in real-time. Working with RiverSafe Vodafone reviewed its current configured searches and logic. It mapped this to documented use cases, reviewed current reporting based on consumer requirements and captured search logic requirements for new Broadband based use cases so that revenue assurance could check revenue growth with usage. Jake France continues: *"Now I can store all this information in my server and I can go back and write a script against these logs to find out what has happened if I believe there is an issue. This enables us to look out for possible trends and scenarios. Now we are being proactive as well as reactive, helping the fraud department with reconciliation and revenue assurance. For example, every transaction that goes onto the system needs to be vetted to make sure that it is a legitimate transaction. This is especially important in Ghana where we operate a prepaid market and need to ensure that authorisation for data and payments are legitimate. We wrote a script for revenue assurance*

to help the team to better reconcile between the high street retail shops and their back office in order to stop any internal fraud. So for example if a customer has paid for one gigabit of data then this is what should be issued to their account. What we found however was that some of the retail shops were raising fraudulent claims. We now have the ability to see this more easily."

FIRST CLASS SUPPORT

The internal anti-fraud app is now being rolled out to other Vodafone Ghana offices and will be monitored closely to see if it could be utilised in other parts of Vodafone in Africa and Asia which are also predominantly prepaid markets.

Jake France concludes: *"RiverSafe helped us to meet our security audit requirements, the team has been terrific and their expertise and support has been second to none."*

RIVERSAFE

INTEGRITY, INNOVATION, IMPACT

ABOUT RIVERSAFE

Based in Central London, RiverSafe is a leading security, data and threat intelligence consultancy. RiverSafe enjoys a strong partnership with Operational Intelligence provider, Splunk, and in 2017 it was awarded Professional Services EMEA Partner of the Year as a Splunk Certified Partner and Training Provider. Riversafe has been delivering secure solutions to its customers for many years partnering with Cisco and, more recently, ThreatQuotient. A rapidly growing and innovative business, RiverSafe has a strong track record of producing results and a team of highly accredited consultants with a reputation for delivering value. Key customers in the portfolio include: Vodafone, BP, RBS, OVO Energy, Computershare, EDMI, Addax Petroleum and WNC to name but a few. For more information please visit:

www.riversafe.co.uk

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