Olumide Osundolire Partner
oosundolire@banwo-ighodalo.com
Banwo & Ighodalo, Lagos

The disruptive impact of OTT services on telcos in Nigeria

The competition from over-the-top ('OTT') services has had a considerable impact on traditional service providers ('TSPs'); for example telcos have in some cases lost revenue, while struggling to cope with congestion problems on their networks which result from the increases in data traffic caused by OTT services. In Nigeria, the disruption brought by OTT services has challenged regulatory and legislative frameworks, and recently drawn the ire of Gbenga Adebayo, the Chairman of the Association of Licensed Telecommunication Operators of Nigeria ('ALTON'), who summarised the situation as "Telecom operators incur the costs, while OTT players make the money." Olumide Osundolire, Partner at Banwo & Ighodalo, discusses here the impact of OTT services on telcos in Nigeria as an example of the disruption OTT services can bring in a country with a developing infrastructure, and considers the approach Nigerian telcos are taking in adapting to this disruption.

Online content, applications and services are rapidly pervading all segments of commerce and society, and are disrupting traditional industries in many ways. Technological disruption continues to challenge traditional services and lifestyles. In the telecommunications industry, heavy disruption has been witnessed as services which were once the exclusive preserve of TSPs are being taken over by OTT services. This disruption challenges regulatory and legislative frameworks and finding a balance between TSPs, upon whose networks OTT services ride, and OTT service providers and consumers, who are the beneficiaries of these services, has been difficult.

The impact of the emergence of OTT services has been devastating on telecommunication services providers. Some of these OTT services are close substitutes to the services offered by telcos with the result that customers are being lured away and significant revenues are being lost. To make matters worse, although these OTT services utilise the telcos' networks and infrastructure, necessitating continuous capital investment on the part of the telcos, they do not contribute directly to the telcos' revenue - meaning that telcos are not getting the anticipated returns from their investments.

By their nature, OTT services require data subscriptions and as a result cause an exponential increase in data traffic and congestion problems on the telco's networks. This has in itself raised quality of service issues which in some climes has resulted in regulatory action being taken against telcos by the industry regulator. This has resulted in some TSPs blocking or throttling competing or bandwidth-hungry online services, while permitting alternative self-managed services to evolve.

OTT services refer to applications and services that are accessible over the internet and ride on an internet service provider's ('ISP') network without the ISP being responsible for such services. OTT services are provided through internet protocol ('IP') telephony, a general term for the technologies that use IP packet-switched connections to exchange voice, fax and other forms of information that have traditionally been carried over dedicated circuit switched connections of public switched telephone networks ('PSTN')[1].

In the past, technical realisation of communication via mobile and/or fixed networks was the major objective of telecommunication operators. However, a shift occurred with the convergence of voice, video and data which has led to an increase in the intertwining of application and content providers with telecommunication services providers. This convergence has led to competition between application and content providers on the one hand and network providers on the other. It has also led to the creation of a new ecosystem comprising of technology providers, network operators, platform operators and content providers - a condition necessary for OTT services to thrive. The aforementioned shift - which in telecoms means a shift from PSTN services, such as the traditional cellular phone calls and Short Message Service ('SMS' or 'Text Messaging'), to OTT services - has largely been attributed to recent enhanced access to 3G and 4G networks, which offer mobile broadband and high speed IP data networks[2]. This development also enables global access to free or relatively

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cheap OTT services by telecoms subscribers, such as live streaming and voice-over-internet-protocol ('VoIP') through the use of apps like WhatsApp, Viber, Google, Facebook, Twitter, Skype, Instagram, LinkedIn, Dropbox and others.

OTT services are carried over the networks, delivering value to customers, but without any carrier service provider being involved in the planning, selling, provisioning, or servicing of such networks. This means that traditional network providers cannot directly earn revenue from such services notwithstanding that the services are delivered using their network. Since network providers do not generate revenue from OTT services, there has been rising tension within the industry on the grounds of the perceived unfairness and inequality of the situation. Network providers are challenged with meeting the increasing demand for high transmission bandwidths which requires extensive investment in network infrastructure with the OTT service providers increasingly becoming the beneficiary of such investments without any participation in such investments[3]. Currently there is a massive migration to OTT services from traditional telecommunication and broadcasting services.

The migration to OTT services is decimating revenue for telcos around the world and the trajectory is widely seen as an existential threat to their commercial survival. This has resulted in the erosion of billions of dollars from telcos' balance sheets worldwide. For example, according to Informa's World Cellular Revenue Forecasts 2018[4], global annual SMS revenues will drop from $120 billion in 2013 to $96.7 billion by 2018, due to increasing adoption and use of OTT messaging applications. In its report 'The Future of Voice,' Spirit DSP, while discussing the impact of OTT VoIP applications on voice revenue, reported that overall global telco voice revenues (including fixed subscriptions) will decline from $970.4 billion in 2012 to $799.6 billion by 2020, at a compound annual growth rate of 2.4%[5]. Also, the telecoms industry worldwide will as a result of VoIP see a loss of revenues approximately worth $479 billion by 2020, which accounts for 6.9% of the total revenue from voice. Another report, 'Consumer OTT VoIP Outlook: 2013 to 2018' by Ovum, highlights that the OTT VoIP market is growing at a rate of 20%. Its applications usage will reach 1.7 trillion minutes by 2018, which translates to $63 billion in lost revenue. According to this study, as a result of the increasing demand for online applications for the purposes of messaging, by 2016, telecom operators will have lost revenue relating to messaging services worth $54 billion[6].

Nigeria is not isolated from this challenge. MTN Nigeria, for instance, provided a vivid picture of the situation recently while analysing its financial performance for 2014 to the media. According to the company, its SMS revenue declined sharply as its subscribers embraced OTTs; MTN Nigeria represented this with graphic illustrations showing that the new trend led to a 29% decline in its SMS revenue. In the company's words, "[growth] in chat applications [has] a cannibalising effect on voice and data revenue[7]." Gbenga Adebayo, the Chairman of ALTON described the situation as follows: "Telecom operators incur the costs, while OTT players make the money. Telecom operators invest a lot [of money] on network infrastructure in order to provide basic and innovative services to customers. Core voice and SMS revenues are decreasing continuously due to [the] impact of OTT players who offer voice, video and messaging services free of charge to their users. Telecom operators will continue to invest a lot to make the networks support the data tsunami, with the required quality of service and numerous innovative services [...] On the top of their infrastructures and customers [...] the OTTs are offering content [and] applications, using huge amount[s] of [the] telcos' bandwidth, collecting revenues but paying nothing to the telco operators and to the government[8]."

The foregoing is not a good portent for the sector in spite of the immense investment opportunities that exist. It must be noted that declining revenue and profitability in Nigeria is not attributable to competition by OTT services alone. That is just one of several challenges that are negatively impacting the ability of telcos to invest in infrastructure expansion, and serves as a recurring concern for investors interested in the sector. When juxtaposed with the already difficult operating terrain which exists in Nigeria, Nigerian telcos face a very challenging situation. They already face the threat of damage to their infrastructure, high operating costs resulting from the self-provision of certain support services to their infrastructure as well as multiple taxation from all manners of government agencies which see telcos as cash cows. Since most of the technology inputs into the sector are imported, telcos also have significant dollar based obligations and the weak position of the naira is already putting pressure on their margins. Already, in order to reduce costs and maximise profits, all of the major telcos in Nigeria have divested their tower and base station holdings in sale and lease back transactions with telecoms infrastructure services companies. Notwithstanding these efforts, significant gaps still exist in the telecoms infrastructure network in the country. The Executive Vice Chairman of the Nigerian Communications Commission ('NCC'), Professor Umar Danbatta, was recently reported to have stated that about 200 locations across the country are yet to have telecom services installed, resulting in about 40 million people being cut off[9].

In line with its mandate under the Nigerian Communications Act 2003 ('NCA') to issue communication licences for the operation and provision of communication services, and to determine the eligibility criteria and other general terms and conditions of licences, the NCC issued Guidelines on International Gateway Access and Voice over Internet Protocol (VoIP) for the Nigerian Telecommunications Industry ('Guidelines'). In the Guidelines, the NCC expresses the expectation that the networks of licensees operating under Full Gateway and International Data Access Licences will convey data, voice and video signals either in their natural forms or in digitised formats. The Guidelines further state that operators of these gateways may also interoperate and exchange information by using appropriate protocol and signalling conversion devices. According to the NCC, the IDA Licence is issued

1. An Overview of Provisions of Over-The-Top [OTT] Services,' Policy, Competition & Economic Analysis Department, Nigerian Communications Commission (NCC), http://www.ncc.gov.ng/documents/713-overview-of-provision-of-over-the-top-ott-services/file
2. Ibid.
3. Understanding Today's Telecommunications Industry.
4. Joshi Sujata & Ors (2015), Impact of Over the Top (OTT) Services on Telecom Service Providers, Indian Journal of Science and Technology, Vol 8(S4), 145–160 @ 146.
5. Ibid.
6. Ibid.
7. Samson Akintaro And Kayode Ashaolu (2015), Killer Apps: How OTTs Shrink Telcos' Revenues, IT & Telecom Digest, http://www.ittelecomdigest.com/killer-apps-how-otts-shrink-telcos-revenues/
8. http://nigeriacommunicationsweek.com.ng/alton-decries-impact-of-ott-on-telecom-operations/
9. http://nigeriacommunicationsweek.com.ng/ncc-ignores-telcos-says-no-to-ott-regulation/
10. An Overview of Provisions of Over-The-Top [OTT] Services,' Policy, Competition & Economic Analysis Department, Nigerian Communications Commission.
11. Ibid.

continued

as a standalone licence and is not to be tied to any specific transmission medium for the purpose of conveying out-bound or in-bound traffic; hence it grants automatic authorisation[10]. The Commission further states that "while this licence is meant to cover provision of VoIP services, it does explicitly address the current challenges and threats posed by the growth and uptake of these services over the traditional telephone networks[11]." However, it is doubtful if the aforementioned licences are ideal for the provision of OTT services, considering the operating model of the providers.

It has been argued by some analysts that rather than see OTT only as a threat, telcos need to learn from the strengths of OTT, and adapt their processes to satisfy an increasingly demanding consumer base. The immediate past Secretary General of the International Telecommunications Union ('ITU'), Hamadoun Toure, expressed the same thought when he said that the approach to OTTs should not be tackling them, but working with them. During the SAMENA summit in Dubai, Toure insisted on the need to work with these content providers to grow new revenue business structures.

In Nigeria, the NCC appears to have adopted this approach as it has consistently indicated that it has no intention of regulating OTT services in Nigeria. In a paper titled 'An Overview Of Provision Of Over The Top [OTT] Services,' issued by the Policy, Competition and Economic Analysis Department, the NCC after having critically considered various issues relevant to this topic and having considered practices in various jurisdictions of the world, recommended that:

- the Commission should conduct a stakeholders' consultative forum on the provision of OTT services in Nigeria to determine if regulation is required for such services and the impact on the growth of the Nigerian telecoms industry;
- following the consultations, the Commission should review its Guidelines on the Provision of International Gateway and VoIP Services and also consider an appropriate Framework for Provision and Regulation of OTT services in the Nigerian telecoms market;
- the Commission must ensure that it does not stifle innovation since internet penetration is still evolving, access speeds are still low and there is limited coverage of high speed broadband in Nigeria; and
- the Commission should encourage network providers in Nigeria to innovate and explore more efficient business models that would enable them to compete favourably with OTT service providers. Network providers can also take advantage of the internet protocol technology through the design for their network upgrades.

It would appear that telcos in Nigeria have decided to align with the recommendations above, particularly the last two recommendations. For example, Airtel has introduced 'WTFB' bundles, which gives subscribers access to WhatsApp, Twitter, Facebook and BBM once they subscribe to the bundle. According to Airtel this data bundle was designed for customers who spend most of their time on social networks and love to stay connected with their friends and family on the go. MTN also has a similar service in the form of its MTN Goodybag Social, a package that consists of different data subscriptions, which include subscriptions to WhatsApp, 2Go, Facebook, Twitter, Instagram, WeChat, Eskimi and Nimbuzz.

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