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## A note from the Editor

This issue looks forward to AfricaCom, the continent's largest exposition of information and communications technologies, and represents key developments with respect to security, network business models and services, satellite architecture, and digital innovations.

Main Cover Image: Alcatel-Lucent Submarine Networks

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## Une note du rédacteur

CETTE ÉDITION DE Communications Africa/Afrique représente les logiciens, les conférences de communications, et les tendances de TIC



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## MainOne's tier III data centre gains first PCI DSS, ISO 27001 certification in Nigeria

WEST AFRICAN TELECOM services and network solutions provider MainOne's premier tier III data centre, MDX-I, has become the first tier III data centre operator in Nigeria to achieve both Payment Card Industry Data Security Standard (PCI DSS) and ISO 27001:2013 certifications; the company's chief executive officer, Funke Opeke, said Main One's ability to ensure security of customer data "is attested to by these certifications and ensures we provide an equivalent level of security as the best in-house bank data centres".



Lynda Madu, GM, corporate services & development, MainOne, and Adedoyin Odunfa, MD/CEO, Digital Jewels, during the presentation of ISO 27001 and PCI DSS certificates to MainOne's data centre subsidiary, MDX-I

## Dynamiv digital satellite communications initiative set to transform lives

A PROJECT THAT will revolutionise e-commerce and maternity services in remote communities across Nigeria and Kenya through the delivery of reliable, space-based internet connectivity services has completed its installation stage and is ready to be rolled out; the initiative, Digital Frontiers, forms part of the UK Space Agency's £32mn (US\$50mn), two-year International Partnership Space Programme, in which Inmarsat, the leading provider of global mobile satellite communication services, is a central partner, working alongside a group of international organisations including Equity Bank Group and Mobile Alliance for Maternal Action (MAMA).

## Nielsen pioneers census of more than a million Nigerian stores using mobile technology

GLOBAL INFORMATION AND measurement company Nielsen has measured 1.2mn Nigerian retail outlets, in what's being billed as the biggest global retail census operation of its kind to date; Nielsen West Africa managing director Lampe Omye commented, "We've carried out census work in key African urban areas and cities and sample census in rural areas but we have not conducted a full country Nigeria census until now."

Nielsen West Africa managing director Lampe Omye

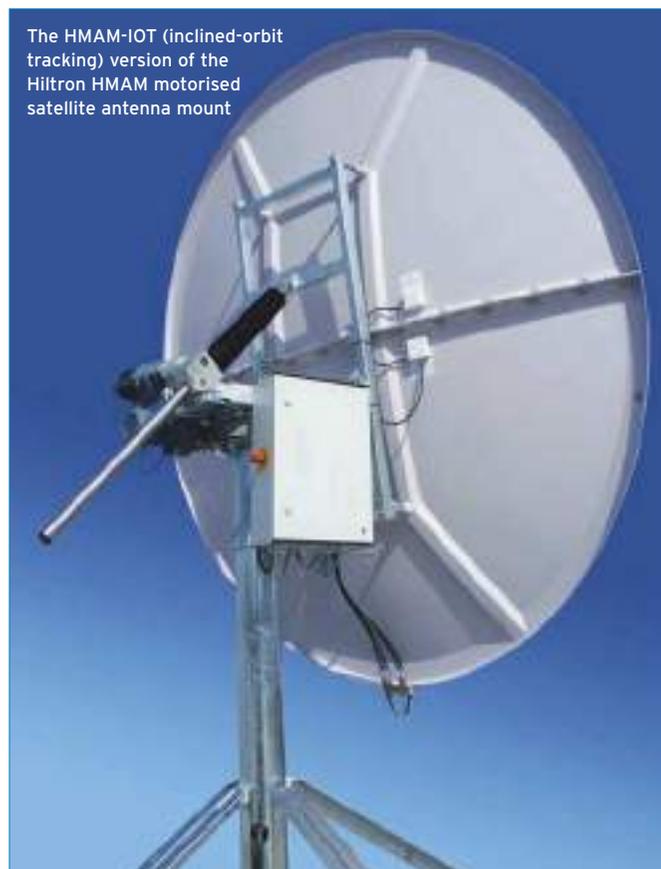


## Nigerians sell second hand items worth almost two billion dollars on MOBOfree.com

ONLINE SOCIAL MARKETPLACE MOBOfree confirmed recently that there has been 274 per cent year-on-year increase in the total value of goods on its platform in Nigeria, with the current value of goods recorded at US\$1.97bn (NGN394bn), up from US\$526 mn a year ago; this impressive growth outperforms the forecasted figure for 2015 by 30 per cent.

## Hiltron presents that HMAM motorised satellite antenna mount at IBC 2015

SATELLITE SYSTEM INTEGRATOR and equipment manufacturer Hiltron's presence at the 2015 edition of IBC is marked by the presentation of the HMAM high-precision motorised satellite antenna mount; designed for two-way VSAT communication or receive-only downlink applications, the antenna mount can be used for a wide range of applications including broadcast and telecommunication downlinks.



The HMAM-IOT (inclined-orbit tracking) version of the Hiltron HMAM motorised satellite antenna mount

## WorldRemit's world-first in bringing online money transfers to Burundi

ONLINE MONEY TRANSFER service WorldRemit has launched instant mobile money transfers to Burundi, so customers in 50 countries - including the 350,000 Burundians who live abroad - can now send money direct to Econet EcoCash mobile wallets, just like an instant message; the EcoCash mobile wallet is available to the two million feature phone and smartphone connections in Burundi.

## Marquis makes new business arrangement with Ethiopian public broadcaster

ETHIOPIA BROADCASTING CORPORATION (EBC) has contracted Marquis Media Partners to provide the public broadcaster with a five year strategy to cover all its areas of operation; the three month project, secured following a competitive RFP, commencing in September 2015, reviews every aspect of the broadcaster's operation to ensure it is in the best possible position to respond to continuously evolving market needs.

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## Orange renforce sa participation dans l'opérateur marocain Méditel

FIPAR-HOLDING (GROUPE Caisse de Dépôt et de Gestion du Maroc), FinanceCom et Orange ont signé un protocole relatif au renforcement de la participation d'Orange dans Méditel, opérateur de télécommunications marocain, en application de leurs accords de décembre 2010; grâce à cette opération, Orange détient désormais 49% du capital de Méditel.

## Les percées de la recherche et du développement dans le domaine de la 5G

ALCATEL-LUCENT A FRANCHI une nouvelle étape en tant que chef de file du secteur dans le domaine du déploiement des réseaux 5G; le projet 5G NOW, dont Alcatel-Lucent dirigeait l'aspect technique, a reçu la plus haute distinction honorifique en excellence scientifique de la part de la Commission européenne pour ses avancées dans le développement des réseaux mobiles de prochaine génération (5G).

## Kirusa lance InstaVoice avec Etisalat Nigeria, sur les téléphones basiques que sur les Smartphones

ETISALAT ET KIRUSA ont lancé le service InstaVoice pour les abonnés d'Etisalat au Nigeria; AdiaSowho, Chef du département Digital Media chez Etisalat Nigeria, a déclaré: "InstaVoice est une génération en avance sur tous les services de notifications d'appels en absence et de messagerie vocale que nous avons utilisé jusqu'à ce jour."

## Orange Business Services et Gemalto s'allient pour offrir un accès hautement sécurisé aux applications

GEMALTO ET ORANGE Business Services ont annoncé l'intégration de SafeNet Authentication Service de Gemalto au sein de Business VPN Galerie, la galerie de services cloud sécurisée d'Orange Business Services; l'authentification multi-facteurs permet de s'assurer qu'un utilisateur est bien celui qu'il prétend être en combinant plusieurs facteurs pour l'authentifier.

## Autour de la direction d'une entreprise dans le contexte d'un écosystème médiatique en évolution

X-LE SOMMET DES dirigeants IBC est un événement exclusif, sur invitation seulement, réunissant plus de 150 dirigeants de l'industrie des médias électroniques et du divertissement issus de l'Europe et de la région Moyen-Orient - Afrique du Nord; tenu pour la cinquième année consécutive, le sommet permet durant une journée de comparer les points de vue judicieux de conférenciers influents aux résultats d'études indépendantes et inédites, fournis cette année par le partenaire de recherche IBM Institute for Business Value en collaboration avec de hauts dirigeants.

## Une conférence mondiale des radiocommunications, sur le "règlement des radiocommunications"

LA CONFÉRENCE MONDIALE des radiocommunications qui est organisée par l'UIT - conférence internationale, dont les travaux débouchent sur un document ayant valeur de traité, examinera le cadre réglementaire qui régit, sur le plan international, les radiocommunications (le "Règlement des radiocommunications") et le révisera, si nécessaire, compte tenu de l'évolution rapide des technologies de l'information et de la communication (TIC), afin de mettre des services de radiocommunication fiables à la disposition de tous, partout et à tout moment; c'est grâce aux travaux de cette conférence qu'il est possible de vivre et de se déplacer en toute sécurité et en bénéficiant de services de radiocommunication très performants.

## L'ISIC lance un nouveau master spécialisé en « Production des contenus audiovisuels et numériques »

DÈS LA RENTRÉE prochaine (2015-2016), un nouveau Master spécialisé en "Production des Contenus Audiovisuels et Numériques" ouvrira ses portes à l'Institut Supérieur de l'Information et de la Communication (ISIC);

destiné aux lauréats l'ISIC (diplôme et licence) et aux titulaires d'une licence en journalisme et communication ou tout diplôme équivalent, justifiant d'une bonne connaissance de l'environnement de l'audiovisuel.

## Un incubateur de start-ups au positionnement unique, dédié au secteur aérospatial



Eutelsat s'appuiera sur ce nouveau partenaire pour renforcer ses positions auprès de start-ups développant des services et des applications (Photo: CR Shutterstock)

EUTELSAT COMMUNICATIONS A annoncé la conclusion d'un partenariat avec Starburst Accelerator, un incubateur de start-ups placé au service de l'innovation dans l'industrie aérospatiale; créé en 2013, Starburst Accelerator favorise l'innovation dans le secteur aérospatial, en comblant le fossé qui sépare les start-ups des grandes entreprises, des organismes publics et des sociétés de capital-risque.

## La conférence IBC2015 examine « l'avenir des médias à l'ère de la disruption »

LA CONFÉRENCE IBC est un lieu unique à l'échelle mondiale pour le réseautage, la discussion et les débats; elle propose une combinaison entre discours visionnaires, tables rondes et master-classes avec les leaders d'opinion et les innovateurs les plus influents dans leurs domaines.

« La télévision est-elle prête à affronter l'ère de l'internet ? »

## L'Union Africaine des Télécommunications prend une mesure en faveur de la conférence CMR-15

JOHN GIUSTI, CHEF adjoint pour la réglementation chez GMSA s'est exprimé sur les résultats de la réunion finale de l'Union Africaine des Télécommunications (UAT) qui a eu lieu à Nairobi, précédant la Conférence Mondiale des Radiocommunications (CMR-15); il a dit « La prochaine Conférence Mondiale des Radiocommunications qui aura lieu à Genève déterminera les bandes de fréquence qui seront consacrées aux services mobiles. »

« Nous recommanderons fortement à tous les gouvernements africains de réclamer vigoureusement un spectre mobile plus grand pour concrétiser les ambitions visant à parvenir à une économie digitale et à créer une société véritablement connectée. » -

John Giusti, chef adjoint pour la réglementation chez GMSA

## AdaptiveMobile lance sa division Threat Intelligence Unit (TIU) pour la sécurité mobile

ADAPTIVEMOBILE LANCE SA division Threat Intelligence Unit, qui fournira aux opérateurs de réseau des renseignements sur les menaces actuelles et émergentes pour leurs réseaux; les études menées par AdaptiveMobile ont montré que des atteintes au SS7, jusqu'ici considérées comme théoriques, ont été activement détectées sur les réseaux des opérateurs mobiles dans le monde entier.

« Le lancement de la division TIU d'AdaptiveMobile est fondamental car l'environnement des menaces pour la sécurité mobile a changé »

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## Events / Événements 2015

### OCTOBER/OCTOBRE

12-15	ITU Telecom World	Budapest, Hungary	telecomworld.itu.int
14-16	ICDE	Sun City, South Africa	www.unisa.ac.za
18-22	GITEX	Dubai, UAE	www.gitex.com
21-22	Banking & Mobile Money Accra	Accra, Ghana	aitecafrica.com
26-27	CN4IoT	Rome, Italy	cloudniot.org
26-29	SecureComm	Dallas, USA	securecomm.org

### NOVEMBER/NOVEMBRE

2-3	TV Connect Middle East & North Africa	Dubai, UAE	mena.tvconnectevent.com
2-27	World Radiocommunication Conference	Geneva, Switzerland	www.itu.int
3-4	Location & Context World	Palo Alto, USA	locationandcontextevent.com
9-12	OTT World Summit	London, UK	ottworldsummit.com
10-12	MVNO Networking Congress	London, UK	mvnoevent.com
17-19	AfricaCom	Cape Town, South Africa	africa.comworldseries.com
17-19	LTE Africa	Cape Town, South Africa	africa.lteconference.com
17-19	TV Connect Africa	Cape Town, South Africa	africa.tvconnectevent.com
27-28	Broadcast, Film & Music Africa	Nairobi, Kenya	aitecafrica.com
30 Nov-1 Dec	Gartner Data Centre, Infrastructure & Operations Management	London, UK	www.gartner.com

### DECEMBER/DÉCEMBRE

1-2	Messaging & SMS World	London, UK	www.capacityconferences.com
1-3	Gartner Application Architecture, Development & Integration	Las Vegas, USA	www.gartner.com
1-3	Gartner Data Centre, Infrastructure & Operations Management	Las Vegas, USA	www.gartner.com
7-8	e-AGE	Casablanca, Morocco	asrenorg.net
7-9	Gartner Identity & Access Management	Las Vegas, USA	www.gartner.com
7-10	IEEE SSCI	Cape Town, South Africa	ieee-ssci.org.za
15-16	AfriComm	Cotonou, Benin	africomconference.org

## MTN and Liquid Telecom partner to extend footprint and services

CUSTOMERS OF MTN Group and Liquid Telecom are set to benefit from a larger connectivity footprint across Africa. This follows an announcement today that the two companies have partnered to jointly offer customers access to the largest fixed and wireless footprint across the continent.

The partnership, which covers wholesale, carrier-to-carrier, high speed broadband, enterprise and fixed data services, enables MTN and Liquid Telecom access to each other's fixed and wireless networks in countries on the African continent, where one party may not currently have presence.

According to Liquid Telecom, the partnership is in response to the increasing demand from businesses across West Africa for the company's broadband service.

Nic Rudnick, CEO of The Liquid Telecom Group, said, "We have a well-deserved reputation in East, Central and Southern Africa, for providing quality broadband to businesses. We are laying

100km of new fibre every week but have decided to partner for the time being in West Africa so that we can immediately meet demand from businesses there."

The partnership enables Liquid Telecom to offer businesses gigabit-speed services accompanied by negotiated SLAs and consistently excellent 24/7 customer service. The additional countries which Liquid Telecom will now have a presence in are Benin, Cameroon, Congo Brazzaville, Ghana, Guinea Bissau, Guinea Republic, Ivory Coast, Liberia, Nigeria, Sudan, South Sudan and Swaziland.

The agreement with Liquid Telecom gives MTN the ability to service its enterprise customers in Burundi, DRC, Tanzania and Zimbabwe.

According to MTN, the partnership reaffirms its commitment to enable and inspire the growth of its enterprise customers across Africa and the rest of the world, as well as furthers its ambition to be the ICT partner of choice for customers looking to expand geographically. Elia Tsouros,

head of global sales at MTN's Enterprise Business Unit, commented, "This partnership will provide great benefits to our customers. We will be able to leverage each other's products and services to improve our offerings to carrier and enterprise customers in Africa, the Middle East and Europe. In addition, we have the opportunity to offer our customers services beyond our footprint, thanks to the combined footprints of both companies, as well as those of our partners. Furthermore, this partnership reinforces our extensive service offerings in country and internationally."

Liquid Telecom's fibre network spans 20,000km and is complemented by its satellite service for rural areas, while MTN boasts an extensive connectivity footprint, with points of presence for its Global MPLS network in 22 countries. Together, they will be able to provision networks faster and sell each other's wholesale, carrier, enterprise and fixed services on the combined network.

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Satellite rendition courtesy of the Boeing Company

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## Sony continues work with Jasco on Southern African broadcast

**JASCO BROADCAST SOLUTIONS** has renewed its partnership with **Sony Professional** as its specialist dealer through to mid-2016. Jasco Broadcast Solutions has a long-standing relationship with Sony dating back to 1996, first as a part of Spescom and later as the Jasco Group. These many years of history have enabled Jasco to cement its position as a specialist partner of Sony professional products and solutions to organisations such as the **SABC, eTV** and local houses of worship. In addition, Jasco is a Sony authorised service centre, adding value to customers by providing a one-stop shop for all of their professional broadcast needs.

“Our relationship with Sony has grown significantly over the years. The majority of this business was for South Africa, however, we also have an established footprint in the Southern African Development Community (SADC) region which has contributed to our high sales figures,” said Rupert Dalton, sales executive, broadcast solutions at the Jasco Group.

Sony’s professional broadcast and A/V products and solutions offer unrivalled quality, reliability and choice for shooting, editing, broadcasting and archiving. Jasco’s main markets for these offerings include major broadcasters, production houses, video equipment rental companies, professional videographers and various houses of worship. Jasco provides a complete, end-to-end solution offering around the Sony products. This includes pre-sales consultancy as well as after sales service and warranty coverage through the service and repair centre.

In addition, Jasco maintains stock levels of faster moving products such as media storage, to ensure fast turnaround time for customers.

Other solutions can be ordered and also configured on demand, according to varying customer requirements.

“Jasco Broadcast Solutions has been a valued Sony partner for almost two decades, and their commitment to our product offering and added value to customers is evident in their growth. Together we look forward to a successful partnership by working together and exceeding our customers’ expectations,” says Paul Martin, business head – channel marketing & sales, Sony Professional Solutions MEA.

“We will continue to develop and invest in our relationship with Sony, and we are proud to have played a role in supplying this global leading brand to the market,” Dalton added.

## Integr8 and Lenovo strengthen partnership

**SOUTH AFRICAN MANAGED services provider Integr8** has bolstered its established partnership with global PC vendor **Lenovo** to ensure that end-users derive maximum value support services.

Lenovo has successfully infiltrated several areas of ICT and brings to partnership its entire laptop/server and desktop suite of products. **Bennie Strydom, CSO of Integr8**, said, “It delivers a full range of durable appliances for our customer base. It also allows us to be even more competitive in the market when selling end-user support services.”

The partnership enables access to product and track refresh cycles and updates to firmware and software for Lenovo platforms.

## Huawei Marine works on Nigeria-Cameroon cable

**SUBMARINE NETWORK PROVIDER Huawei Marine Networks Co Ltd** has commenced marine installation of the Nigeria-Cameroon Submarine Cable System (NCSCS), Cameroon’s first wholly-owned submarine cable with investment provided by the Cameroon Government.

Spanning approximately 1,100km, the NCSCS will directly link Kribi in Cameroon with Lagos in Nigeria, delivering 12.8 Tbps of capacity to broadband users in both countries by the end of 2015.

Presiding over the installation ceremony, **Jean-Pierre Biyiti bi Essam, the Minister of Posts and Telecommunications**, said, “The Government of Cameroon has embarked on putting in place the necessary facilities to boost the demand and supply of services in quality, in quantity and at affordable prices, as well as to increase telecommunications universal access and universal service.”

The Minister stated, also, that the installation of the NCSCS further demonstrates “the willingness of the Government to implement a true broadband infrastructure development policy throughout Cameroon’s national territory”.

The NCSCS system forms part of Cameroon’s broader strategic plan for building a National Broadband Network.

The implementation of this submarine cable system is expected to significantly enhance the development of e-government, e-trade, e-education and e-health programmes and boost the economic and commercial development of Cameroon.

**David Nkoto Emame, general manager, Cameroon Telecommunications Corporation (CAMTEL)**, observed, “The NCSCS system will provide new opportunities and further the development of our network in both domestic and international markets. The NCSCS system enables us to provide users with faster bandwidth connectivity at a significantly lower cost.

“By providing direct connection to Nigeria, the cable system will also serve to enhance Cameroon’s position as the major bandwidth hub in the region and internationally to Europe and beyond.”

## GreenTouch improves energy efficiency over 10,000x

A GLOBAL CONSORTIUM dedicated to improving the energy efficiency of data communications networks, **GreenTouch** has unveiled new tools, technologies and architectures to improve the energy efficiencies of communications networks in years to come.

The new approaches can improve energy efficiencies of mobile-access networks by more than 10,000x – an achievement far exceeding the original goals of the working group.

The consortium has also announced research that will enable significant improvements in other areas of communications networks, including core networks and fixed (wired) residential and enterprise networks. With these energy-efficiency improvements, the net energy consumption of communication networks could be reduced by 98 per cent from 2010 to 2020 while accounting for significant traffic growth. These savings are equivalent to the greenhouse gas emissions of 5.8mn cars.

“It’s amazing how fast the time has flown by since the start of the GreenTouch project, but what’s most impressive are the results our international team of scientists, academics, and industry leaders have achieved, in just five short years, to chart a path to greener networks,” stated **Thierry Van Landegem, chairman, GreenTouch**. “With the public release of tools and technologies that industry and academia can use now to design and deploy more energy-efficient communications networks today and in the future. Our work will not only enable a more productive and sustainable future, but will also help many more people to connect with one another.”

GreenTouch was formed in 2010, driven by the vision and leadership of **Bell Labs**, the industrial research arm of **Alcatel-Lucent**. Its aim was to determine how to support the burgeoning growth of communications networks in a sustainable and economically viable way. At that time, the consortium determined that reduced energy consumption and increased energy efficiency can enable the practical and greater use of renewable energy.



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## CAK roles out new FTA TV licenses

THE COMMUNICATION AUTHORITY of Kenya (CAK) has issued the first commercial free-to-air television (FTA TV) licenses since the country's digital migration in June 2015.

The eight new firms issued with the licenses include the **Seventh Day Adventist East Kenya Union Conference, Akili Network Limited, Entertainment Channel, Word Music Limited, North Eastern Media and Telecommunications Limited, Namba One TV Ltd and Cosmopolitan Media Limited.**

According to CAK director general Francis Wangusi, the new licenses set in motion the process of bringing in players to the broadcasting market under the authority's regulatory regime as stipulated under the ICT sector law. The new firms were urged to follow laid down programming content standards- rich local content that reflects themes that are distinctly Kenya.

Content aired between 5.00am and 10.00pm should be clean and for family viewing.

"The Authority also required all the Commercial FTA TV licenses to uphold the local content quotas now standing at 40 per cent for the fiscal year 2015/16," observed Mr Wangusi. He added that, since the digital migration, the Authority has received 72 applications for licenses as new opportunities had

**The new licenses set in motion the process of bringing broadcast players in to the authority's regulatory regime**

opened for investors in the broadcasting sector. Other broadcast-related license application include four for cable TV, two for IPTV, three for pay TV, four for subscription management service, two for Landing Rights, one for Community TV and two for Self-provisioning Broadcast Signal Distributor license.

Meanwhile, CA has launched a child online campaign efforts to secure children from harmful content on the cyberspace.

Initiated by the Kenyan ICT Cabinet Secretary Dr. Fred Matiang'i, the campaign will educate children and parents on the need to secure children from unsuitable internet content.

"There is need to reach out on parents and teachers with the knowledge and skills on the use of the Internet in order to provide child online protection," said Dr Matiang'i when addressing participants at the recently held Kenya **Primary Schools Headteachers Association** conference in Mombasa. This, he said, will protect children against pornography, cyber fraud, violent shows, cyber bullying and cases of children being lured into terror gangs.

The campaign will involve media platforms and then progress to schools- both primary and secondary through outreach programmes such as ICT clubs, public lectures and motivational speakers. Dubbed, 'Be the COP', the campaign will follow guidelines published by the International Telecommunications Union (ITU).

Meanwhile, the government has developed a national cyber security strategy and put up the **Kenya Computer Incidence Response Team Coordination Centre (KE-CIRT/CC)** as a focal point for reporting all cyber related incidences. *Mwangi Mumbo*

## SoftwareONE's new connection to KKR

**MANAGEMENT SOLUTIONS FIRM SoftwareONE** has formed a partnership with investment company **KKR**, whereby KKR provides growth capital in return for a 25 per cent minority stake position in the company.

SoftwareONE is a channel partner for Microsoft, IBM, Oracle, VMWare, SAP and a further 9,000 software publishers and provides digitised platforms for procurement and self-consumption services.

Patrick Winter, SoftwareONE CEO, said, "The software industry is changing, and together with KKR, we see a unique opportunity to capitalise on those changes and continue to increase the value we bring to our customers, in particular in the areas of cloud and value-added services."

## Global mobile ad revenue reaches US\$31.9bn

ACCORDING TO THE **Interactive Advertising Bureau (IAB)** and **IHS Technology**, global figures for mobile advertising revenue which surged 64.8 per cent to US\$31.9bn in 2014 from US\$19.3bn in 2013, driven by continued shifts in consumer usage patterns and industry innovations. The global figure for 2014 is made up of the following regional shares:

- North America: 44.9% (US\$14.318bn)
- Asia-Pacific: 36.5% (US\$11.627mn)
- Europe: 16.6% (US\$5.306mn)
- Middle East and Africa: 1.2% (US\$379mn)
- Latin America: 0.8% (US\$239mn)

Mobile display again showed the highest growth at 88.1 per cent, overtaking search as the dominant segment. Display represented 47.4 percent of the total global mobile advertising revenue in 2014 at US\$15.1bn. Mobile search followed, up 55.2 per cent, taking a 46.1 per cent share at US\$14.7bn. Messaging grew 13 per cent, as users continued to migrate from operator-owned messaging services to app-based messaging platforms, with a 6.6 per cent share at US\$2.1bn.

Growth year-over-year was led by North America, which saw a 76.8 per cent leap over the 2013 figures. All regions grew by more than 50 per cent:

- North America - 76.8%
- Middle-East and Africa - 68.5%
- Latin America - 66.1%
- Europe - 58.6%
- Asia-Pacific - 54.5%

"Mobile devices are at the centre of consumers' lives across the globe and these numbers reflect brands' increasing recognition that this medium holds great power," said Anna Bager, senior vice president, IAB.

"Mobile yet again proves to be key to the continual evolution of the online advertising market. These numbers have been underpinned by the industry coming together to collaborate and create improvements to mobile advertising infrastructure," said Daniel Knapp, director advertising research, IHS. "Technology is now better explained, measurement is improving, and targeting is better aligned with other media to help advertisers reach and engage with their audiences."

## Deutsche Welle to broadcast across Africa with SES

GERMAN BROADCASTER **DEUTSCHE Welle** has signed a new long-term capacity agreement on **SES** satellites to broadcast in Africa.

Deutsche Welle will broadcast its new English-language channel across the continent via the Astra 4B and SES-5 satellites. The 24-hour news and information channel, which broadcasts events from Germany and around the world, was already launched on in June 2015 via Astra 19.2 degrees East.

Guido Baumhauer, director of distribution and technology at Deutsche Welle, said, "Deutsche Welle produces high-quality content in 30 languages for the whole world. We are very pleased that we have found, in SES, a reliable technical partner that complements our global satellite portfolio and helps us to broadcast news and information to two of the most

important regions in the world."

"We are very pleased that Deutsche Welle is once again relying on SES to expand its coverage. The latest agreement with Deutsche Welle is an example of how our global satellite network can enable broadcasters to expand beyond their domestic markets to reach international audiences on all continents," said Norbert Hoelzle, senior vice president, commercial, Europe at SES.



## La marque Intex Technologies est en Côte d'Ivoire

UNE ALLIANCE STRATÉGIQUE vient d'être conclue entre **JUMIA Côte d'Ivoire** et **Intex Technologies**. La compagnie Indienne a choisi le leader du commerce en ligne pour vendre ses produits en Côte d'Ivoire. Cette alliance ouvre à la marque le marché ivoirien de la téléphonie en forte croissance et vient renforcer l'offre de **JUMIA Côte d'Ivoire** sur un segment très compétitif.



Intex Aqua Y2 Ultra

Les deux compagnies ont travaillé discrètement pendant plusieurs mois afin de concrétiser cet accord historique. Le partenariat officiel depuis le Mardi 11 Août 2015, permet à **JUMIA** de devenir le distributeur agréé des smartphones Intex en Côte d'Ivoire. Intex entend rapidement bénéficier de l'expérience acquise par l'e-commerçant pour s'installer sur un marché qui enregistre d'excellente performance (97,5% de taux de pénétration de la téléphonie mobile) mais également une concurrence grandissante. **JUMIA Côte d'Ivoire** mettra à la disposition du fabricant indien plus de 500 000 clients potentiels, une plateforme promotionnelle, commerciale et logistique rodée ainsi que l'atout capital d'une très bonne connaissance du marché local.

## Le centre de traitement de données Tier III de MainOne est le premier Datacenter certifié PCI DSS et ISO 27001 au Nigeria

**MDX-I**, **DATACENTER TIER III** majeur de **MainOne**, est devenu le premier opérateur de Datacenter Tier III au Nigeria à obtenir à la fois les certifications **PCI DSS** (norme de sécurité des données pour l'industrie des cartes de paiement) et **ISO 27001:2013**. Cette nouvelle a récemment été annoncée par le président-directeur général de **MainOne**, **Mme Funke Opeke**, lors d'un événement tenu au siège social de la société et au cours duquel celle-ci s'est vu remettre les documents de certification.

Ces certifications garantissent la conformité du Datacenter à des normes mondialement reconnues en termes de sécurité des données client, ainsi que l'engagement de la société envers la sécurité et la protection de ses actifs informationnels. Internationalement reconnue, l'accréditation **PCI DSS** est la plus exhaustive des normes de sécurité des données et vise à promouvoir la sécurité des données sur les cartes de paiement. **ISO 27001** est quant à elle une norme de Système de Management de la Sécurité de l'Information (**SMSI**) qui précise les exigences auxquelles une entreprise doit se plier pour établir, mettre en œuvre, réviser, surveiller, gérer et maintenir des systèmes de management de la sécurité de l'information efficaces.

Le Datacenter de **MainOne** a obtenu sa certification suite à un audit **ISO 27001** approfondi réalisé par le groupe **British Standard Institution (BSI)**, un organisme de normalisation professionnelle qui aide les organisations de par le monde à faire de l'excellence une habitude. L'évaluation **PCI DSS** a été réalisée par **Digital Jewels Limited**, évaluateur de sécurité **PCI DSS** qualifié et société de chaîne de valeur informationnelle ayant également fourni un soutien de bout en bout pour préparer le Datacenter à ces deux certifications. Les audits ont mesuré les équipements du Datacenter par rapport à plusieurs critères stricts, notamment les contrôles d'accès physiques et les politiques, procédures et infrastructures relatives à la sécurité de l'information.



Chidinma Iwe, MainOne; Lynda Madu, MainOne; Adedoyin Odufa, Digital Jewels; et Akintunde Adekoya, MainOne

**Mme Opeke** a déclaré que les certifications **ISO 27001** et **PCI DSS** permettraient de consolider l'investissement de la société dans des infrastructures et des processus essentiels à la croissance de l'économie numérique de l'Afrique de l'Ouest. « Nous sommes ravis à l'idée d'être le premier Datacenter Tier III commercial au Nigeria à pouvoir garantir à nos clients les certifications **PCI DSS** et **ISO 27001:2013**. Nous avons pu voir l'augmentation continue du nombre d'opérateurs de carte de paiement. Beaucoup d'entre eux sont nos clients. Notre capacité à garantir la sécurité de leurs données client est attestée par ces certifications, ce qui signifie que nous sommes en mesure de leur offrir un niveau de sécurité équivalent à celui des meilleurs Datacenters bancaires internes. »

Commentant la double certification du **MDX-I**, **M. Adedoyin Odufa**, président-directeur général de **Digital Jewels**, déclare : « Nous félicitons **MainOne** pour cette réussite qui démontre l'engagement de la société envers l'amélioration et le maintien des plus hauts standards de sécurité informationnelle. Il s'agit d'une étape significative pour l'industrie des paiements en ligne au Nigeria et nous nous réjouissons de travailler avec **MainOne** pour réaliser ensemble de nouveaux objectifs de certification. »

## La conférence IBC2015 examine « l'avenir des médias à l'ère de la disruption »

LA CONFÉRENCE **IBC** est un lieu unique à l'échelle mondiale pour le réseautage, la discussion et les débats ; elle propose une combinaison entre discours visionnaires, tables rondes et master-classes avec les leaders d'opinion et les innovateurs les plus influents dans leurs domaines. Dans un contexte de convergence rapide entre la radiodiffusion, l'informatique et les télécoms, le thème de la conférence 2015, « l'avenir des médias à l'ère de la disruption » (*The Future of Media in an Age of Disruption*), offre un forum permettant d'explorer de nouvelles stratégies, de mieux comprendre les disrupteurs du secteur, d'évaluer les futurs progrès technologiques et d'étudier comment le secteur peut saisir les nouvelles opportunités générées par la croissance explosive de la consommation de contenus télévisés et vidéo sur les smartphones, les tablettes et les ordinateurs portables.

haque jour, la conférence abordera les multiples enjeux auxquels le secteur est confronté, avec un discours introductif qui plantera le décor. Avec la présence de hauts-dirigeants, d'experts techniques et de visionnaires venus de plus de 170 pays, dont le cœur de métier couvre tout l'éventail de la création, de la gestion et de la fourniture de contenus, ainsi que les marchés émergents et les grands disrupteurs du secteur, la conférence permettra d'obtenir de précieuses informations et de nouer des contacts utiles.

L'**IBC** est l'événement annuel le plus important pour les professionnels qui participent à la création, la gestion et la diffusion de contenu à des fins de divertissement et d'information à travers le monde. Attirant au-delà de 55 000 participants en provenance de plus de 170 pays, **IBC** combine une conférence hautement respectée évaluée par les pairs à une exposition réunissant plus de 1 700 des principaux fournisseurs de technologies médiatiques de pointe et offrant des occasions de réseautage uniques.

# Digital currency develops commercial connections at AfricaCom

Informa hosts the 2015 edition of Africa's key connectivity event, showcasing innovations that turn today's ideas into tomorrow's business successes

**I**N AN AGE where 'digital' is connecting role-players and stakeholders to one another across the globe, there is more value than ever in attending and exhibiting at specialised events and conferences. AfricaCom, the continent's largest telecoms, ICT & media conference and expo is innovating to champion the digital economy.

It is clear that there is no shortage of innovation in Africa. Indeed the Silicon Valley may have a thing or two to learn from Silicon Cape, the Silicon Savannah, the Silicon Lagoon or many of the African continent's tech hubs. With this in mind, the main theme of the 2015 AfricaCom event has been centred around: Innovation, Transformation and Leadership for Digital Africa.

Sometimes, it helps to be reminded of where we have come from as a guide to where we intend going. This event in particular is a reflection of the huge transition Africa has experienced in the past two decades. While rooted in telecommunications, the evolution of the communicating landscape has expanded in every direction. From the infrastructure over which communication travels, to how we use digital to convey concepts and products, to the innovation in digital services themselves, we have monitored these changes and adapted our offering accordingly.

## Sustaining business

Recognising that capitalising potential in this sector, is what is needed to continue driving future modernisation and originality, the AfricaCom keynote sessions focus on innovation and planning for the future of digital Africa, whether it is through investment, technology evolution, developing new business models and partnerships, or focusing on sustainability. In a bid to compare and contrast differing visions, the debates in the keynote sessions will bring together industry heavyweights (such as pan-African telecom operators Airtel, Orange, MTN, Vodacom, Milicom) who will swap ideas with market shakers (so-called OTT providers Google, Facebook, twitter) and up-and-coming innovators: entrepreneur, organisations providing support to tech start-ups, investors, etc.

In addition to the keynotes, the event's programme is designed to reflect all aspects of the digital business world, with a number of new additions to the AfricaCom agenda. Cost Efficient Operators will discuss what a lean and agile telecommunications business could look like while avoiding compromising on service delivery. Because data has been a hot subject in recent years 'New Revenue Streams' is now an independent stream, as it has become necessary for fixed line and mobile operators to explore income options beyond voice. Whereas the discussion has previously centred on ways to increase data usage (mostly through digital entertainment offerings), this year the discussion also revolves around M2M and IoT, the enterprise model and the possibility for the need to collaborate in order to remain viable and economically sustainable.

## Fintech service stakeholders

The Mobile Money stream builds on a strong showing from last time by incorporating a true ecosystem of stakeholders in mobile financial services who are shaping mobile payments development across Africa. MFS have become the great differentiator for operators, having evolved into a tool for wider economic inclusion and social enablement. MNOs have played the critical role in the development of mobile money and its



constant evolution into a revenue generating service. With over 250 deployments in 89 countries in 2014, mobile money is evolving the traditional banking channels which is why this stream boasts the presence and knowledge share of Africa's tier one operators, central bank regulators and Fintech providers.

## The digital experience

Creating new revenue streams and understanding data driven business does not only affects the operators, digital marketing and customer experience (Digital CX) sectors, but also the role of the CIO. This is explored as an imperative through the launch of CIO Forum, in partnership with ITA. The role of a CIO and the rise of the Chief Digital Officer (in all corporate and industry sectors) is changing. What does it mean to be a CIO in context of the African Enterprise and the shifting digital landscape and what are the ICT needs of these enterprises? Most importantly, CIO Forum will address how an effective ICT strategy assists in driving profitability.

## Powering and promoting the digital economy

Keeping the lights on and the equipment working has necessitated invention in the form of solar and other renewable energy solutions to SIM driven charging systems. This is especially apparent in geographically challenged areas where Connecting Africa remains difficult. A whole session will look at the role of satellite, fibre and other technologies in improving access to communication. New for this year, the session will include a debate among some of the continent's foremost regulators and ministries to discuss the role governments can play in promoting broadband access.

But in essence, what we want to achieve at AfricaCom, is to bring together the continent's innovators and to create an environment where they can find partners and investors to turn their ideas into successes. In fact, if ever there was a time to invest in, learn about and develop future-proofed digital technology, the time is now. AfricaCom 2015, to be held in Cape Town this coming November, is an imperative for anyone and everyone interested in advancing their digital economy - be it personal or on a much grander scale. ☺

To discover the full agenda and more information please see: <http://africa.comworldseries.com>

## What AfricaCom is about

TAKING PLACE AT the Cape Town International Convention Centre (CTICC) from 17-19 November 2015, AfricaCom is now in its 18th year. AfricaCom is Africa's largest communications conference & exhibition. The conference programme covers the most strategic issues affecting companies in Africa's digital market - services, efficiency, profitability, customer experience, partnerships, policy and more - and features four co-located events: VSAT Africa, TV Connect Africa, LTE Africa and Apps World Africa.

To register:

<http://africa.comworldseries.com/register>

## Airtel Madagascar continues rural partnership with Guanomad

TELECOM NETWORK OPERATOR Airtel Madagascar continues to work with Guanomad, the largest producer of Bat Guano fertiliser in the Africa-Indian Ocean area, to help Guanomad's clients develop their businesses. Launched in March 2015, this successful collaboration involves the extension of the Airtel money service to Guanomad branches. The Airtel money service also promotes farmers' access to bank services through mobile banking, in line with rural development policy and support the emergence of professional business activity in the rural areas.

"With over 10 branches covering 12 regions of Madagascar and more than 200 retailers, using the Airtel money service in our business is of paramount importance. Now we need to encourage farmers to change their behaviour and help them learn to use the service," said Guanomad MD Erick Rajaony.

"The Airtel money service offered at Guanomad branches is a much safer means of payment using virtual transactions. Transactions that will probably give users (farmers) and Guanomad network retailers, security and confidence," said Airtel Madagascar MD Maixent Bekangba.

## Alcatel-Lucent, Telefónica carry out 100G upgrade of PENCAN undersea cable systems

THE CABLES SUBSIDIARY of Alcatel-Lucent, Alcatel-Lucent Submarine Networks (ASN) has been working with network operator and digital solutions provider Telefónica to upgrade the PENCAN-7 and PENCAN-8 undersea cable systems linking landing points on the Spanish mainland to Gran Canaria and Tenerife in the Canary Islands. The 100 gigabits-per-second (Gbit/s) upgrade will offer a more than tenfold increase of the current system capacity, allowing to meet growing demand for broadband services and connectivity.

The PENCAN-7 and PENCAN-8 systems, which are both 1,400km in length, respectively connect Chipiona in Cadiz Province (Spain Mainland) to Las Palmas/Altavista in Gran Canaria, and Conil also in Cadiz Province to Candelaria in Tenerife, offering high resilience for traffic protection.

These two submarine cables are part of the Telefonica PENCAN Network which links the



PENCAN-8 (Source: TeleGeography. Data)

Peninsula (Spain Mainland) with Canary Island. The PENCAN Network, which comprises four geographically diversified, state-of-the-art, fibre optics submarine cables - namely PENCAN-6, PENCAN-7, PENCAN-8 and PENCAN-9, enables Telefonica to provide any kind of ultra-broadband robust services between Canary Islands and the rest of the Spain.

Maria Jesus Almazor, regional director for Southern Spain at Telefónica, said, "PENCAN Submarine Cable Systems have a proven track

record of operational excellence based on optimum network performance and further scalability via seamless upgrades. The additional capacity available with ASN's advanced technology will contribute significantly in meeting the ongoing demand in the markets served by these systems."

Philippe Dumont, president of Alcatel-Lucent Submarine Networks, said, "We are pleased to support Telefónica their expansion of connectivity between Spain mainland and the Canary Islands, enabling the expansion of capacity to boost broadband traffic. ASN's unique submarine technology provides operators like Telefónica an easy upgrade path and scalability to multi-terabit capacity, with staged migration combining technological and economic benefits. This allows quicker service turn-up to meet the end-user's expectations for anywhere, anytime ultra-broadband access to applications, storage and computing."

## Cobham Wireless enhances cell-edge performance in heterogeneous networks with TM500 tester

CONNECTIVITY SOLUTIONS COMPANY Cobham Wireless offers the TM500 network tester family to help mobile operators to accelerate the deployment of high capacity networks. Already supporting key LTE-A features such as carrier aggregation of two and three component carriers, TDD/FDD carrier aggregation, and eICIC, the TM500 now also supports Coordinated Multipoint transmission/reception (CoMP), a major feature of 3GPP LTE-A Release 11.

Where carriers are deploying small cells, they often do not deliver the expected user experience and this is slowing HetNet deployment. One of the primary reasons for users seeing a degraded quality of service with HetNets is poor cell-edge performance due to the lack of traffic coordination and interference management between small cells and macrocells.

The Cobham Wireless TM500 is already

addressing cell-edge interference issues with eICIC (Enhanced Inter-cell Interference Coordination), empowering mobile network operators to achieve better overall network capacity. With the addition of CoMP it will go one step further, by coordinating transmission and reception between different transmitting and receiving cells. It achieves this through the use of load balancing, coordinated scheduling, and the management of signal power and interference.

In the downlink, each mobile terminal sees improved data throughput, especially near the cell edges, due to reduced interference and an increase in received power. Similarly, for the uplink, received signal quality and cell edge coverage is improved by simultaneous coordinated reception from different receiving points on the network side.

"CoMP offers enormous benefits to network

operators, but it is very challenging both to configure and to validate," said Nicola Logli, product manager at Cobham Wireless. "It requires tight synchronisation among multiple transmitting and receiving points. The TM500 network tester can emulate and validate realistic CoMP usage scenarios in both uplink and downlink. It enables operators and vendors to perform lab and field trials incorporating realistic performance tests for this powerful new LTE-A feature. This helps them maximise throughput in their HetNet deployments, and improve user experience under challenging cell edge and interference conditions."

Cobham Wireless provides the tools that enable network infrastructure vendors and operators to roll out the high capacity and data rate services promised by the latest releases of the 3GPP LTE-A standard.

## BCSG works well with HP Helion

IT SERVICES PROVIDER BCSG is now a recognised HP Helion Ready partner, signifying that its product is tested and will be supported by us when working with HP Helion OpenStack.

The HP Helion Ready Program recognises ISVs and SaaS vendors that have tested and proven solutions to run on HP Helion OpenStack or HP Helion Development Platform. These solutions cover multiple

environments from public, private, hybrid, virtual and managed cloud, all of which are included in the HP Helion Ready ISV Solution Catalog. The programme lets customers confidently deploy HP Helion OpenStack in heterogeneous environments with hardware and software solutions that are certified and supported.

Tom Platt, commercial director at BCSG said, "We are excited by the commitment and

drive that HP is showing around cloud services, and the encouragement that they are offering service providers globally to get on board. We help complete their offering around SaaS marketplace provisioning for SMBs and hence it seems like an obvious partnership. Becoming a part of their rapidly expanding ecosystem of certified ISVs and SaaS vendors, shows that we are a supported provider and a brand that companies can be confident in."

## 451 Research cites Ericsson as "literally many years ahead of the cloud crowd"

ERICSSON CLOUD TURNS IT into a differentiator for organisations by modernising infrastructure, applications and data under one operational and economic architecture. Security and integrity, automation and governance, all coupled with accessibility are the key foundations and requirements for future cloud adoption. Ericsson Cloud is creating a unique offering to deliver on that.

The key technologies that form Ericsson's cloud infrastructure portfolio are key to the strength of the company's open developer eco-system, which includes strategic partners Apcera, Guardtime, Cleversafe and Intel.

Anders Lindblad, head of business unit cloud & IP, said, "Cloud technology is rapidly disrupting the ICT industry...Combining our Networked Society vision and long experience of designing, deploying and running the world's most advanced communication systems, makes us a highly relevant ICT change-maker as the transformation of the industry accelerates."

451 Research supports this view, finding that with the its HDS 8000 datacentre system, Ericsson is just doing what everyone else is talking about. "What is very different is its timing: real systems this year, literally many years ahead of the crowd." said Peter Christy, research director, networking at 451 Research.

In support of openness in telecom transformation, Ericsson has recently joined the Intel Network Builders community and has also showed innovative network functions virtualisation (NFV) and software-defined networking (SDN) solutions. The members of the Intel Network Builders programme collaborate on accelerating network transformation through the adoption of SDN and NFV.

## Cisco IoT system provides a firm foundation for the digital, device-led transformation of industries

TECHNOLOGY GIANT CISCO estimates that 50bn devices and objects will be connected to the Internet by 2020. Yet today, more than 99 per cent of things in the physical world remain unconnected. To capitalise on the unprecedented opportunities presented by this wave of digitisation, companies and cities are increasingly deploying Internet of Things (IoT) solutions.

However, digitisation is complex. Customers are often connecting devices and objects - or converging unrelated networks - at previously unprecedented scales. Furthermore, they can only realise the value of these connections through the application of advanced data analytics, and even then, customers often still need to create a new class of intelligent applications capable of accelerating new business models or increasing productivity. Of course, all of this has to happen without ever sacrificing security at any point in the system, from the device to the data centre and via the cloud.

The new Cisco IoT System addresses the complexity of digitisation with an infrastructure that is designed to manage large scale systems of diverse endpoints and platforms, and the data deluge they create.

The new Cisco IoT System comprises six critical technology elements or 'pillars' which - when combined together into an architecture - help reduce the complexities of digitisation. Cisco also announced 15 new Internet of Things products within the following six pillars:

- **Network Connectivity:** This pillar includes purpose-built routing, switching, and wireless products available in ruggedised and non-ruggedised form factors.
- **Fog Computing:** 'Fog' is a distributed computing infrastructure for the Internet of Things, which extends computing capability - and thereby data analytics applications - to the 'edge' of networks. It enables customers to analyze and manage data locally, and thereby to derive immediate insights from connections. Cisco predicts that 40 per cent of IoT-created data will be processed in the fog by 2018. Over 25 of Cisco's network products are enabled with Cisco's fog computing or edge data processing platform, IOx.
- **Security:** The security pillar of the IoT System unifies cyber and physical security to deliver operational benefits and increase the protection of both physical and digital assets. Cisco's IP surveillance portfolio and network products with TrustSec security and cloud/cyber security products allow users to monitor, detect and respond to combined IT and Operational Technology (OT) attacks.
- **Data Analytics:** The Cisco IoT System provides an optimised infrastructure to implement analytics and harness actionable data for both the Cisco Connected Analytics Portfolio and third party analytics software.
- **Management and Automation:** The IoT System provides enhanced security, control and support for multiple siloed functions to deliver an easy-to-use system for managing an increasing volume of endpoints and applications, field operators need an easy-to-use management system.
- **Application Enablement Platform:** Offers a set of APIs for industries and cities, ecosystem partners and third-party vendors to design, develop and deploy their own applications on the foundation of IoT System capabilities.

Doug Davis, senior vice president and general manager, Internet of Things Group at Intel, said, "IoT is a significant opportunity but one that needs interoperability and scale to fulfill industry predictions of billions of connected devices. The IoT pillars, jointly defined by Intel and Cisco serve as a strong foundation for companies to build IoT solutions that can be seamlessly interconnected and achieve the scale that delivers value promised through IoT."

Noriyasu Okitani, general manager, IoT Business Creative Division, Industrial ICT Solutions Company, Toshiba Corporation, commented, "Toshiba sincerely welcomes Cisco to introduce clear guidance for IoT development. Toshiba is working to generate new values by connecting energy, healthcare, and storage products and services by using cloud computing and big data technologies, with the aim of realising a safe, secure, and comfortable Human Smart Community. By combining cloud technology with IoT, M2M, and edge computing, we will apply Human Smart Community to a broader range of devices, expanding it to manufacturing systems, traffic/transport systems, and Smart Cities."

## Coriant CloudWave Optics enables new levels of flexibility, efficiency, and scalability

A GLOBAL SUPPLIER of SDN-enabled end-to-end transport networking solutions, Coriant offers CloudWave Optics, a suite of photonic layer technologies that brings a new level of flexibility, efficiency, and scalability to next-generation optical transmission networks. A key enabler of the Coriant Dynamic Optical Cloud Solution, Coriant CloudWave Optics features best-in-class photonics, software programmable line side modulation, tunable spectral allocation, and channel frequency flexibility. These carrier-grade capabilities significantly enhance service flexibility and network scalability in metro, regional, LH, ULH, and Data Center Interconnect (DCI) transport applications.

Coriant's portfolio of packet optical transport platforms, including the Coriant hiT 7300 Multi-Haul Transport Platform and the Coriant® mTera Universal Transport Platform, among others, CloudWave-powered flexi-rate transmission enables network operators to achieve the highest degree of optical performance at the lowest cost per bit. Key features and benefits of Coriant's flexi-rate solutions portfolio include:

Flexible, multi-functional provisioning of service capacity with a single, compact and software-programmable line side interface that can dynamically adapt to a wide range of metro, regional, LH, ULH, subsea, and DCI transport applications  
Cost-optimised capacity, reach and service performance based on a unique combination of flexi-rate and super-channel features with dynamically adjustable modulation formats (eg QPSK, 8QAM, 16QAM), flexible bit rate transmission options (100G, 200G, 300G, 400G), and state-of-the-art RAMAN with up to 25.6Tb/s per fibre in meshed optical networks.

Lower total cost of ownership via industry-leading power and space efficiency, increased spectral efficiency (up to 33 per cent), increased fibre capacity (up to 166 per cent), and reduced sparing requirements

Optimal utilisation of optical channel capacity with an innovative, software-programmable system architecture that maximizes client/line-side interconnectivity and throughput efficiencies

Seamless interworking with all legacy and third-party infrastructure (eg fixed, colorless, directionless, gridless, 40/80/96 channels, etc), all major fibre types, and across Coriant's metro, ULH/LH, and DCI-optimised packet optical transport platforms.

"Our programmable flexi-rate capabilities are specifically designed to help service providers and data centre operators efficiently and cost-effectively scale their service infrastructure in the face of continued demand for network capacity and highly unpredictable traffic patterns and transport connectivity requirements," said Ken Craft, executive vice president, products and technology at Coriant.

## Gemalto enables service providers to offer trusted crypto in the cloud

SECURE DIGITAL SOLUTIONS provider Gemalto has brought to market its SafeNet Luna SA 6 hardware security module (HSM), purpose-built for service providers to offer on-demand crypto processing, key management and key storage in the cloud. The new SafeNet Luna SA delivers the performance and scalability required to protect the most demanding cloud applications and allows service providers to offer the highest levels of trust for their cloud environments by giving businesses total ownership of their encryption keys.

For many organisations, the option of purchasing and managing encryption keys on-premises does not align with their vision of using cloud-based infrastructure as on-demand services. In addition, service providers that want to offer higher levels of data protection are required to manage encryption solutions on behalf of their customers, which means increased liability and risk in terms of data access and complying with customer compliance requirements. As a result, these challenges have prevented many security conscious companies from migrating sensitive data to the cloud.

Gemalto's SafeNet Luna SA platform changes the way service providers and organisations can manage and store encryption keys in cloud environments. With the new SafeNet Luna SA, cloud companies can provide all of the security, compliance and trust of an on-premises HSM appliance while their customers realise the cost, flexibility and performance benefits of the cloud yet still maintain complete ownership of their keys. Organisations can now also benefit by being able to choose the appropriate data encryption strategy for their business whether that be on premise, cloud-based, or hybrid key management and storage solutions.

"Gemalto's SafeNet Luna HSM for service providers addresses a current gap in the market for encryption and key management," said Garrett Bekker, senior security analyst at 451 Research. "Enterprises that are looking to move more resources to the cloud are realising the need for encryption and key management, but often lack the resources to deploy and manage their own

encryption key management infrastructure. By packaging SafeNet Luna HSM for service providers, enterprises of all sizes can maintain control of their sensitive keys while taking advantage of the benefits the cloud provides."

The SafeNet Luna SA can be separated into 100 cryptographically isolated partitions, with each partition acting as if it were an independent HSM. Within each partition, a given customer can assign multi-tiered levels of administrative access. The partitions themselves are designed to protect key material from other tenants on the same appliance, meaning different customers - or different lines of business within a single organisation - can leverage the same appliance without fear of losing their keys to other tenants. In addition, service providers have no access to key material stored on any HSM partition, giving their customers the confidence that only they have access to their sensitive cryptographic keys.

"When encryption and key management can be offered conveniently as a service by cloud providers, but with the same high-grade protections as if it were fully on-premises, organisations of all types can reach new levels of efficiency and security," said Todd Moore, vice president of product management Encryption Products at Gemalto. "With our new SafeNet Luna SA, we are opening up a significant opportunity for service providers to grow revenue by offering customers the ability to control their keys and thereby bring more sensitive data and workloads to the cloud."

The new SafeNet Luna SA expands Gemalto's portfolio of encryption, key management and crypto management products that can be deployed by service providers to enable greater levels of security in their cloud environments. Along with the SafeNet Luna SA, Gemalto also offers the SafeNet ProtectV and SafeNet Virtual KeySecure products which provide robust full-disk encryption for virtual instances and attached storage volumes and secure key management for data encrypted by ProtectV or other third-party cloud or on-premises encryption solutions.

## Migration to a customer-centric and software centric network

MOBILITY SOLUTIONS SPECIALIST Mahindra Comviva, in association with Ovum Consulting, has published research on the role of software intelligence in network transformation, encapsulating the uptake of faster and increased innovative services with shift from hardware-centric to software-centric networks.

With the advent of software-centric networking models, CSPs will be able to offer services that are differentiated by the flexibility of the network. The key to the value delivered by this network transformation is the integration of software intelligence with SDN/NFV technology. The study finds that with implementation of SDN and NFV technologies CSPs will accrue agility to enable flexibility, scalability, automation, and on-demand service. With this capability, service innovation is put back into the hands of the telcos.

Speaking on the growing recognition of software-centric networks, Aditya Dhruva, head of messaging and broadband solutions at Mahindra Comviva, said, "Telecom operators need to look at deploying Software Defined Intelligent networks to provide agile service delivery through integration of policy, analytics (intelligence), and service orchestration."

# Combatting more criminal mobile connections

Ghanaian communications agency introduces an interconnect clearing house to check SIM box fraud

**F**OLLOWING A SPATE of arrests made by Ghana's telecommunications regulator, the National Communications Authority (NCA), and the country's police, the Ghanaian government has decided to introduce an interconnect clearing house (ICH), which will ultimately monitor all incoming foreign calls and thereby find a solution to the multimillion fraud that is being perpetrated against government and the telcos which both have lost millions of dollars each year. Industry insiders and tax authorities are estimating that the fraudsters last year alone made US\$40mn through their illegal activities, while those arrested since January 2015 are said to have illegally made at least US\$30mn.

## Criminal conversations

The form of fraud committed, through subscriber identification modules (SIMs), utilises voice over Internet Protocol (VoIP) technology, which allows telephone calls to be made over computer networks like the Internet, converting analogue voice signals into digital data packets and supporting real-time, two-way transmissions of conversations using IP. These calls can be made on the Internet using a VoIP service provider and standard computer audio systems - or, alternatively, through ordinary telephones, which use special adapters to connect to a home computer network based on the H.323 technology standard.

In an earlier bid to plug the huge revenue losses, the Ghana Revenue Authority (GRA) contracted Subah Info Solutions in 2010 to electronically monitor revenue generated by the telcos to enable GRA calculate and collect the right taxes from the companies. The contract was worth US\$100mn per year.

Subah Info Solutions subsequently brought into the country a superior tracking technology that led to the arrests earlier in 2015, where the fraudsters were alleged to be in possession of tens of thousands of SIM cards of various local telcos even though the law requires that every SIM card sold should be duly registered to the user using only state generated identity cards - driver's license, voter's identity card or an international passport - and cannot be



SIM cards must be registered by the users using approved identification documents

activated unless the registration process is done to activate the cards.

The authorities are therefore worried about how single entities in the SIM-box business came to possess thousands of activated but unregistered SIM cards without the requisite official registration processes.

In the view of Ghana's Communications Minister, Dr Omane Boamah, the chain of relations between service providers and the fraudsters in the acquisition of the SIM cards cannot be overlooked. His view has been

**The slimmer the profit gap, the smaller the market space for the SIM Box fraudsters to survive profitably**

supported by several industry experts who have concluded that the highly lucrative underground multi-million dollars SIM-box business cannot possibly be perpetrated without active collaborators from the mainstream telecom sector and possibly from the NCA.

"We cannot at this stage extricate the chain completely from this (SIM box fraud) because every telco must have the responsibility for every SIM card that it produced for its operations," Dr Boamah said.

However, Kwaku Sakyi Addo, chief executive officer of the Ghana Chamber of Telecommunications, the industry's mouthpiece, has denied that any telco is actively involved in SIM box fraud. He said, "I can say on behalf of my members that no network operator is actively participating in this illegal business."

He rather blamed the lax verification regime of Ghanaian identity cards, saying, "When people buy SIM cards and when they submit ID

cards the SIM card vendor or network operative agent cannot determine the validity or otherwise of the ID card that the individual is presenting.

“They don’t have any way of verifying whether or not the ID card is authentic, so the problem that we are seeing regarding identification is a manifestation of a deeper problem and it is not peculiar to a network operator.”

Before this arrest, there was a rising resentment about the operations of Subah, which some have attributed to fears that the company will expose this illegitimate business being run by some highly influential Ghanaians. According to industry experts, the SIM box fraud is perpetrated in such a way that incoming international call numbers are displayed on mobile phones as local calls because the incoming foreign call is handed over to the recipient’s phone by another local number from an illegal SIM Box being operated in the country.

These SIM Boxes bypass the licensed and approved telecommunication gateways to hand over to the recipient’s number using the Internet. SIM Boxes use VoIP technology which is used in applications such as Viber, Skype, WeChat, Line, Facebook Messenger and many others.

### Closing the gap

According to experts, the main reason for the fraud is the difference between the International Call Rate (US\$0.19 per minute) and the Local Call Rate (US\$0.03 per minute) and they believe a reduction in the difference will discourage the fraudsters from engaging in this illegal business.

However, the NCA thinks irrespective of the amount of the call rate difference, SIM Box fraudsters will always ply their trade. Obviously, creating a gap of profit for the fraudsters to deem it a trade of bountiful returns is the evil head that must be cut off by all parties losing revenues. The slimmer the profit gap, the smaller the market space for the SIM Box fraudsters to survive profitably. This is while they cite Nigeria and South Africa where this rate gap is negligible (US\$0.04 and US\$0.00 respectively), as examples as to why SIM Box fraud is non-existent. This business, according to the NCA, is only possible locally because of the international cooperation from the countries where the calls originate from and the best way to check it is to investigate the call-source parties so they will not be able to terminate the calls via the Internet. The NCA has called for preventive gateways the government can use to reduce or discourage people from engaging in SIM Box fraud as the equipment used are imported as a computer component and are therefore asking for stringent controls over their importation and

registration with more information on the importer, their line of businesses and purposes of importation while the security agencies must ensure that these devices are used for the approved services. They pointed out that since every telecom device is supposed to be certified by the NCA it is within the power of the regulator in association with the security agencies to make sure that these devices are imported by identifiable entities for the approved uses.

## SIM Boxes use VoIP technology which is used in applications such as Viber, Skype, WeChat, Line, Facebook Messenger and many others

Though all SIM cards must be registered by the users using approved identification documents, many were surprised and will want to know how the suspects were able to purchase up to 3,000 SIM cards from retailers which show that there is a loophole in the registration process which must be sealed. The Communications Minister agreed and suggested that people should be limited to register up to 10 SIM cards but the registration process must be critically monitored and must have security tiers so names that have a certain number of cards registered to them will be checked with the numbers used to terminate the international calls.

### Identifying data

Eyome Ackah, an industry professional, believes that Ghana needs a centralised database for all registrations hosted by NCA as this will reduce the porous nature of the existing registration process so that “every registration is recorded in that database so if a single ID card is registering multiple numbers, this could be detected easily”.

One solution the telcos have come up with is for their customers to report those numbers used to hand over the international calls to them by sending a text to a short code provided by the NCA where the reported numbers will be given to the respective telcos for deactivation. The government is thinking, however, about long-term issues, as it has decided to license a qualified entity to set up its interconnect clearing house, which will among other things provide a common, independent mechanism for the billing and settlement of interconnect accounting traffic for all existing and future operators in a particular country or region.

In order to ensure that this service is non-

discriminatory, the ICH must be independent and it should be mandatory for all service providers to connect through the ICH the rationale being to take advantage of a centralised national platform to address other industry challenges such as lack of technical redress to the issues of stolen phones, uncertain subscriber identity, and to facilitate connectivity with other platforms.

The licensed ICH which shall be maintained independently from other licenses will also prevent capital flight and loss of revenue to government by localising required value added services currently being provided by interconnect exchanges outside the country.

It shall also monitor volumes of all traffic for service providers including routing or switching of traffic between them, routing or switching international traffic between international carriers and international gateway operators and also routing of Short Messaging Service (SMS), Voice Message Service (VMS) or any other value added services or applications.

The ICH will in addition provide International Mobile Subscriber Identity services, Equipment Identity Registry services and provide anti-fraud management and revenue assurance systems including a common infrastructure for government agencies to host ICT systems and applications to store confidential data among many others. It will also account for revenues to government and also provide technical support to enforce all telecommunications tax revenue laws, plug leakages and under-declarations in government revenue and also monitor mobile financial transactions including mobile money.

However, ICH critics have raised concerns about the implementation of the idea insisting the project must be thoroughly discussed and a national consensus reached bearing in mind that telecommunication licenses are national assets and the citizenry ought to be assured by Government that all such assets will be harnessed and put to proper use to enable the nation to gain optimum benefit.

Though they praised government’s efforts to push the local content participation and capacity building in business sectors forward, they also expressed their misgivings because they “are currently not convinced that the process of developing and implementing the ICH policy has been thoroughly thought through believing that engaging an ICH potentially runs contrary to the legal regime governing interconnection since the law makes no room for a centralised ICH. So far, the government’s response has been to publish an advertisement inviting bids from potential operators of the ICH and such a business entity that wins the job will be majority owned by Ghanaians. ☺

*Kafui Gale-Zoyiku*

# End-to-end automation for effective interconnection

How a single, unified network solution can be deployed in order to support profitable wholesale business models

**H**OW DO CARRIERS elevate the business of wholesale telecommunications to new levels of profitability by automating their operations? What do they gain by putting billing, trading and routing in one integrated, function-rich data warehouse? With technology partners such as Telarix, a carrier can consolidate its entire wholesale operation onto a truly end-to-end - operations to billing to engineering - solution combining a single, global business-to-business information exchange service platform, and a broad suite of fully-integrated automation software tools for the wholesale industry.

## Generating business from service platforms

The Telarix neutral information exchange platform iXLink automates the interconnect process, end-to-end, between providers of voice, data, SMS, and video traffic. A carrier can gain a holistic, accurate view of how its business is performing – and how efficiently it is working with its telecom wholesale partners.

## With technology partners such as Telarix, a carrier can consolidate its entire wholesale operation onto a truly end-to-end solution

### Integrated automation tools

Telarix's interconnect business suite, iXTools, is a suite of back office solutions that integrate to form a reliable intelligence backbone for an entire wholesale business allowing each department engaged in wholesale - from engineering and sales to finance and audit – to collaborate around one common data warehouse. With this level of integration and sophistication, a carrier can truly operate a wholesale business efficiently and gain the necessary intelligence in 'real-time'.

### Modular management of carrier capabilities

Within the Telarix portfolio, iXLink is a neutral information exchange platform that enables carriers, resellers and emerging market providers to automate interconnect processes and electronically share documents. It was originally designed in 2007 to deliver a common price list exchange for a few carriers to trade price lists with each other. However, in recent years, the majority of large operators around the globe have rallied around iXLink, making it the de facto industry standard. Today, iXLink is supported by over 3,000 service providers with roughly 40,000 documents being exchanged and distributed monthly.

With respect to its role as a neutral telecom exchange, iXLink provides additional data intelligence, financial screening, and accuracy checking for carriers adopting iXLink as the front-end to their wholesale back office. In this regard, several modules support enhanced capabilities for wholesale carriers.

Carriers can automate the buying of voice and data termination, validating and processing offers, so that rates can be confirmed immediately. They can also simplify and streamline the interconnect sales process by quickly distributing out price lists - utilising a central repository and CRM email tracking capabilities. It is possible, too, to



Photograph: Simon Berry/Flickr

Solutions like iXTools process 150bn voice, SMS and data minutes each year

validate incoming bills from vendors, calling out any billing errors and inconsistencies, and notifying billers and payers immediately via multi-media alerts. Such solutions also enable the quick conversion of accounts receivable into cash by distributing validated bills in customer-preferred formats.

With modular solutions such as iXLink, carriers can manage and automate contract negotiations, and conduct full audit trails and electronically sign documents. It is also possible for wholesalers to control and optimise their business operations and settle payments with partners.

Currently processing over 150bn voice, SMS and data minutes each year, solutions such as iXTools offers invaluable transparency and strategic insights over business and interconnect processes. As a result, users are able to streamline operations to achieve lower operating costs and higher productivity. Modules within solutions such as iXTools enable communications companies to automate routing and decision-making in support of complex bi-lateral agreements, hubbing deals, quality of service (QoS) requirements and least cost routing with global dial-code precision.

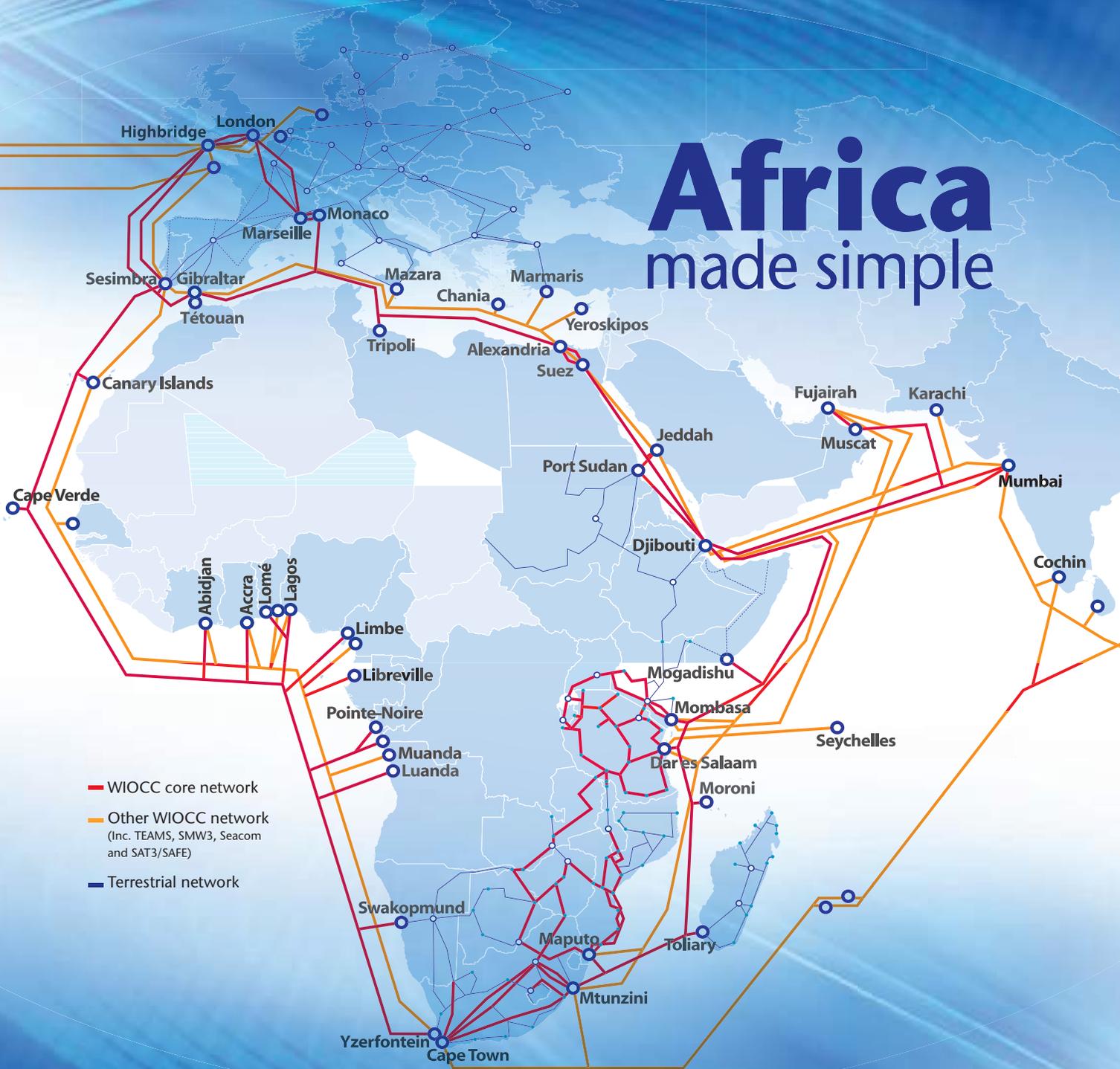
Advantages of such modular packages is that carriers can automate purchasing and selling processes, protecting carriers against arbitrage and other unfair selling processes. Companies like Telarix can also offer robust interconnect billing systems, designed with revenue assurance built in. Leading and aspirational carriers appreciate a solution that can guarantee that usage for calls, content, and data records is captured, rated and accurately invoiced.

carriers need to address concerns over cost management, auditing and dispute management. Telarix and its contemporaries offer systems to manage settlements, validate interconnect invoices, and automatically reconcile charges. Telarix, in particular, can extend its engagement with a carrier by also offering carrier and contract management in a module acting as a data warehouse that aggregates and houses partner details and agreements - including a wide variety of wholesale business data from network infrastructure elements and products. ©

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[www.WIOCC.net](http://www.WIOCC.net)

# Functional data centre service infrastructure

Current trends in data centre solutions are driven by cost pressure, evolving technology, and security concerns

**T**HE DATA CENTRE has become one of the most critical infrastructure elements in the modern business. As requirements and technology have evolved, so too has the data centre, and a number of trends are currently evident around this business-critical solution. The over-arching trend affecting data centres currently is a move away from organisations owning their own physical data centre infrastructure. This is a result of a number of challenges, including cost, rapidly evolving technology, security concerns and others. The data centre of today and the future paints a vastly different picture to this technology in the past, and we are sure to see further evolution in years to come.

## Technologies and trends

While the data centre is essential, it is also expensive to build and maintain, and is often physically tied to a location, hindering the agility of a business in terms of their ability to move. This is resulting in a growing trend whereby many organisations are exploring alternative solutions to the bricks and mortar data centre building. The influence of this trend is driving data centres in a number of different directions. Shared data centres are becoming increasingly popular, enabling co-location of different vendors, providers and customers in a single physical infrastructure, providing economies of scale, best practice security, increased cost efficiency and more. Virtualisation of infrastructure is also on the increase, whether in on premise or shared and hosted data centres, as software-defined data centres come to the fore. By adopting software defined services in a shared data centre, organisations can now access a variety of technology, from storage and servers to backup and recovery solutions from a service provider or multiple service providers without the requirement to build, manage or maintain their own infrastructure.

In addition, as a result of cost and economy pressures, organisations that do require their own physical data centre infrastructure are adopting modular solutions that can be easily deployed and self-powered. Many organisations still require ownership of certain functional areas, making hosted or virtualised data centre services impractical. However, the challenge of the physical construction of infrastructure remains. Pre-built, containerised modular data centres are thus emerging as an alternative solution. These data centres are pre-built and then assembled on site in a matter of a couple of months, rather than the years it has taken in the past to build a traditional data centre. Furthermore, supplementary capacity can be incorporated with the addition of another data centre container module, improving data centre agility and scalability.

## The driving factor for the majority of data centre decisions is cost efficiency.

### Provisioning services and solutions

The driving factor for the majority of data centre decisions is cost efficiency. The latest developments within data centres highlight this, including the emergence of software-defined data centres and a growing trend toward hosted services in a shared data centre. Organisations are increasingly looking toward service providers to drive economies of scale through converging technologies, a solid skills based and sound managed services, enabling reduced costs, increasing numbers of software services, and consumption-based services that move technology from a capital expense to an affordable monthly fee.

When looking to outsource data centre services, organisations need to examine the total cost of the data centre and the infrastructure. If there is no benefit to maintaining this infrastructure in-house, and the services provisioned out of it are not core business solutions, then the decision is simple in terms of cost versus risk. In other situations, organisations must carefully weigh the benefits and risks to determine the applicability of outsourcing these services.

Data centre solutions delivered as a service offer a number of benefits aside from agility, scalability and a predictable monthly fee. With electricity tariffs on the increase, power consumption is a major cost factor in the data centre. Hosted data centres will not only be more likely to incorporate the latest in energy efficient technology, they also share the cost of power consumption between customers, and this is incorporated as a fixed monthly cost into the services bill. Increasing capacity will thus have far less of an impact on power consumption, as customers do not have to pay for the full infrastructure and the full increased cost of electricity. In addition, organisations can leverage fast provisioning of new services, agility, scalability, shared infrastructure costs, and best of breed solutions in terms of heating, cooling and more.

As data demands continue to increase and more devices become smart and connected, the data centre will play an even more pivotal role in the future. Hosted, shared and virtualised data centre solutions offer organisations access to new and innovative services while addressing the combined pressures of reducing cost and improving agility and scalability, and as a result, will continue to grow in popularity in future. ©



AJ Hartenberg, portfolio manager:  
data centre services, T-Systems

# Plus de moyens pour envoyer des millions de messages

Telegram a connu un gain de popularité lorsque Facebook a annoncé le rachat de WhatsApp

LORSQUE FACEBOOK A annoncé le rachat de l'application WhatsApp, de nombreux utilisateurs ont eu un a priori selon lequel puisque l'appli devient la propriété de Facebook, ils pourraient craindre pour leurs vies privées. De ce fait, l'annonce du rachat de WhatsApp par Facebook a plus ou moins profité à quelques concurrents.

Et parmi ceux-ci, il y a Telegram. Avant l'annonce de ce rachat, l'année dernière, Telegram était une application assez modeste. Mais comme l'expliquaient nos confrères de TechCrunch en avril 2014, Telegram a été téléchargé 8 millions de fois après cette annonce. En substance, Telegram est un peu devenu l'anti-WhatsApp.

## La sécurité et la confidentialité

L'appli, qui permet d'envoyer des messages privés, a été créée par Pavel Durov (le créateur de VKontakte, le Facebook russe). Et si elle n'offre rien de vraiment spécifique, son point fort, c'est la sécurité et la confidentialité.

En tout cas, l'Electronic Frontier Foundation a trouvé que Telegram était plus sécuritaire que WhatsApp puisque celui-ci remplissait 5 des 7 critères pris en compte par la fondation tandis que WhatsApp n'en remplissait que 2. Et mieux

encore, le mode « secret chat » de Telegram remplit les 7 conditions, à savoir :

- Les données sont-elles chiffrées durant le transit ?
- Est-ce chiffré pour que le fournisseur de service ne soit pas en mesure de lire le contenu ?
- Peut-on vérifier l'identité des contacts ?
- Les anciennes communications sont-elles sécurisées si votre clé de chiffrement est volée ?
- Le code est-il accessible pour une étude indépendante ?
- Au niveau de la sécurité, le design est-il proprement documenté ?
- Le code a-t-il été audité ?

## Des milliards de messages

Par ailleurs, on apprend aujourd'hui que les utilisateurs de l'application Telegram envoient maintenant pas moins de 10 milliards de messages par jour alors qu'en décembre, l'appli n'atteignait qu'un milliard de messages par jour.

« Nous avons lancé notre application iOS il y a exactement deux ans. Maintenant, nous envoyons plus de 10 milliards de messages par jour – qui est plus ou moins le nombre de notifications push envoyés par Telegram

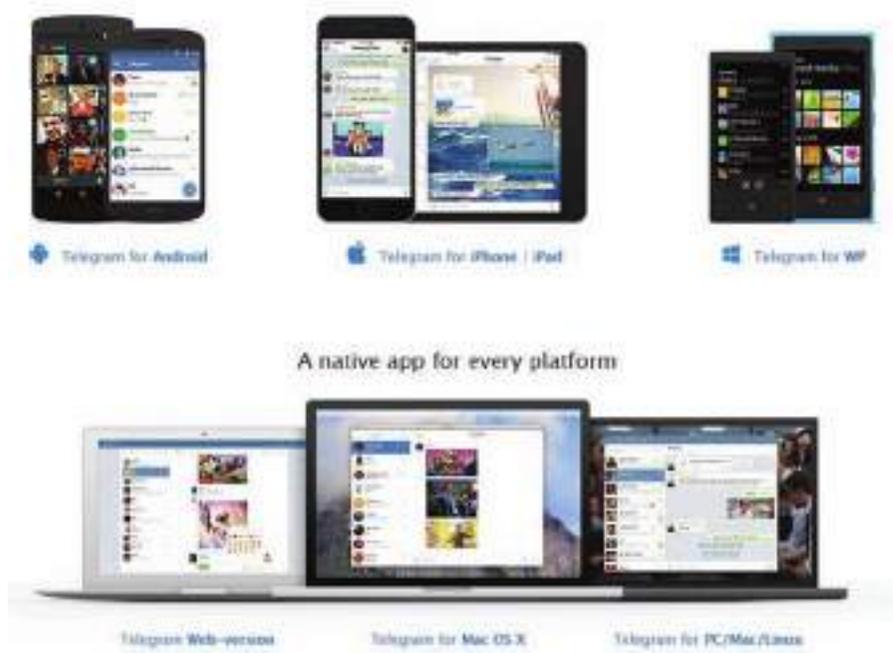
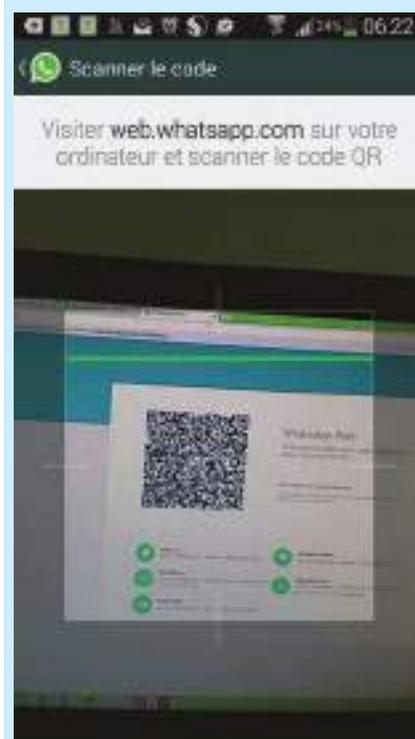
chaque jour. Tout cela grâce à vous », lit-on dans une publication de blog.

On est certes loin des 30 milliards de messages par jour revendiqué par WhatsApp au mois de janvier, mais pour une application qui ne date que de deux ans, il faut admettre que 10 milliards de messages par jour, c'est déjà un bon score. Telegram est actuellement disponible en version web, pour Android, iOS, Windows Phone, Windows, Mac OS X et même Linux. ☺

## Les utilisateurs d'iOS pourront enfin utiliser la version web de WhatsApp

UTILISER WHATSAPP SUR son navigateur n'était pas encore possible pour les utilisateurs de l'application sur iOS.

Si vous utilisez WhatsApp sur un mobile sous iOS, vous l'ignorez peut-être : cela fait un moment qu'il est possible d'utiliser WhatsApp sur un navigateur. Initialement réservée au navigateur Google Chrome, la version web de WhatsApp est même devenue accessible sur Firefox et Opera.



# As satcom evolves so African economy grows

Without the means for domestic and business populations to interact between various locations, will mean that progress will remain slow. Satellite communications are improving the picture

**S**ATCOMS INFRASTRUCTURE AND technology have evolved in recent years and now offer mobile operators in Africa more viable ways of delivering profitable services to user segments and communities, which would previously have been neglected.

One company, using a vendor and operator-neutral business model to further satcoms underpinning of communications advances across Africa is iDirect. The company partners with operators at all levels, whether multinational mobile firms or single-country operators, as well as local integrators working across Africa. Communications Africa (CA) spoke to the company, whose director of market development, Richard Deasington, concurred that Satcoms infrastructure had, indeed, made 'steady progress in the past years'. He cited achievements such as iDirect's DVB-S2 – designed to improve bandwidth efficiency and service quality – and the company's efforts to reduce roll-off down to five per cent [to avoid adjacent channel interference, signals transmitted to a satellite are run through a filter and roll-off determines 'how gradually or abruptly the transmitted signal drops off after being filtered. The higher the roll-off factor the more gradual the drop off, and by improving the roll-off factor from 20 per cent to five per cent, service providers are able to either transmit more Mbps over the same amount of leased bandwidth, or lease less MHz from a satellite operator while still offering the same Mbps to their customers']. As another recent advance, Deasington also mentioned iDirect's 2D 16-State inbound coding, which provides greater efficiency due to its average 1dB gain and payload size choices. He then went on to say that, "The introduction of High Throughput Satellites (HTS), which offer the promise of higher throughputs and lowers costs, will likely lead to the biggest economic change. However, key changes have also happened in the cellular mobile industry with the introduction of lower cost, less power-hungry small cells. When combined with HTS carrier-class satellite backhaul, these changes help bring down the point of entry for communities sized from 50–300 people."

This last point has always been a bugbear from African operators, whether to spend vast



Richard Deasington, iDirect's director of market development

amounts of money to deliver unprofitable services to just a few hundred people with very low ARPUs, or to wait until technology will make such efforts more viable. Well, the technology has arrived so such obstacles are being removed.

As for Deasington's views on the technical challenges, which remain for satcoms infrastructure providers if they are to support African mobile operators better, he told CA that, "The key challenge is power efficiency. You want to be in a position where the satellite terminal and the cell base station are both efficient enough to be powered from small solar/wind plus battery solutions. This goes hand-in-hand with solar charging stations for local devices, such as mobile phones. We've

**As another recent advance, Deasington also mentioned iDirect's 2D 16-State inbound coding, which provides greater efficiency due to its average 1dB gain and payload size choices**

seen some interesting work from companies like Ericsson to combine the solar requirements of a base station with that of a village shop, or even a solar-powered water pump."

From challenges to solutions, he added that with 'most people in this context will not have laptop or desktop computers and as the data-centric world makes its way to the most remote parts of the continent, the low-cost smart phone will be the key enabler for the digital revolution'. With this in mind, iDirect's Deasington had this advice for new mobile entrants in Africa, "This means that the best option for most new networks will be a leap straight to 4G LTE, leapfrogging 3G. It provides higher speeds, better efficiency and wider coverage for the same power budget. Until recently, the cost of handsets has been a handicap, but this concern is being reduced due to the fact that newer phones are now built with multi-standard chips."

As to how increasing demand for high-bandwidth services in rural regions has impacted satcoms providers, he said that 'the arrival of higher bandwidth demands, driven by the move to 4G and the data revolution, has coincided with the deployment of new generation HTS satellites that can deliver an order of magnitude more bandwidth for essentially the same costs as older broad-beam satellites'. The point here, he said, is, "This means that the costs to service each user will stay close to the same, despite the capacity needed per person being projected to rise rapidly."

When it comes to the geo-political and business challenges that face companies trying to conduct business in regions of Africa in need of satellite-based telecoms services, Richard Deasington said that, "Many of the most economical HTS services are provided by satellites that land their traffic in a different country, or even continent, from the originating country and then return it via fibre. At times, regulators have demonstrated a reluctance to permit this topology for 'security reasons'. This type of set-up is common in Europe and, in any case, end-to-end encryption can be applied to the traffic." He added that it is, however, now time for regulators to take a new look at this situation.

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High Throughput Satellites (HTS) offer the promise of higher throughputs and lower costs

### Playing its Part in Africa

As for iDirect's involvement in delivering satcoms-based communications in Africa, Deasington said this is one of his company's fastest growing markets, with 'many established networks deployed – some of which have been quietly operating for many years providing GSM communications in countries such as Cameroon. iDirect is currently working with newer networks being deployed in South Africa, Benin and DRC.

"We are involved in just about every country in Africa, delivering services to enterprises and carriers through a range of different operators and service providers. These services range from Internet cafes to bank branches and ATM machines, and remote oil and gas installations. The company also provides connectivity to remote and rural cellular sites, which range from high-bandwidth 3G systems, installed in South Africa, to voice-only GSM systems in Ghana.

"We have a fairly large number of 3G base stations from Huawei installed across South Africa; originally, customers in this region tried to deploy base stations using a consumer Internet satellite system, only to find that this didn't work. Once we persuaded them to try

**The 2G and 3G optimisation that was previously sold bundled with the Altobridge proprietary base stations has now been licensed to other firms**

our system they found that a carrier-class 3G system works fine – and that it wasn't a problem intrinsic to satellite that had stopped their original trial."

As for some of the technological differentiators that come into play, Deasington said, "The iDirect system provides carrier-class services and allows operators to meet their service level agreements (SLAs) for various technical parameters. This can make the difference between a service working well, or not at all. Our systems are built to work in a telco environment; for example, the X1 Outdoor remote is commonly used for cell backhaul. The fact that it is outdoor-mounted (IP67 rated, -40 to +60 degrees operation) and also available with -48v DC and +24v DC (as well as AC) power supplies makes it an ideal choice for these environments. This makes it easy to integrate with modern cellular equipment, and with either telco or solar power supplies."

Last year, the company absorbed some of the pioneering technology from former remote community communications specialist, Altobridge, into its portfolio. Until now, little of how this 'acquisition' has gone has been revealed. With several deployments and users in Africa, understanding the future for those stakeholders is important and Deasington decided to reveal to CA what exactly is being done with the technology and IP acquired.

"Altobridge had the most efficient 2G and 3G base stations on the market, as well as other suitable technology for optimising all kinds of backhaul – not just cellular. However, iDirect didn't acquire the hardware aspects of their business, preferring to maintain a vendor-neutral position in the market. We're now ready

**iDirect is currently working with newer networks being deployed in South Africa, Benin and DRC**

to release the first fruits of this integration work called iDirect Sathaul™. Initial focus will be on making the 4G experience more economic, as well as providing a better user experience over satellite. Due to the fact that 4G typically uses larger links, this is where the biggest savings are to be made in the short term. This will be followed with software to optimize 3G small cells. The 2G and 3G optimisation that was previously sold bundled with the Altobridge proprietary base stations has now been licensed to other firms. This will enable previous users of Altobridge equipment to move forward and grow their networks or to build new networks where ultra-high bandwidth efficiency and low power consumption are key."

### The Future

As to what's next for Africa in terms of satcoms delivering personal communications to remote regions, Deasington said, "the combination of small cells and satellite means that a single satellite link can be shared by hundreds of users, each with their own access device. When you couple this with HTS capacity and the new iDirect SatHaul™ optimization software being released, the economics and the user experience are greatly enhanced." ©

# La réglementation des TIC dans le monde

L'édition de 2015 du rapport 'Tendances des réformes dans les télécommunications' présente un écosystème des TIC de plus en plus complexe, où se côtoient acteurs traditionnels et acteurs de nouvelle génération

**L**A DERNIÈRE ÉDITION du rapport détaillé de l'UIT sur l'évolution de la réglementation des TIC dans le monde Tendances des réformes dans les télécommunications dévoile un paysage des TIC en pleine mutation, dans lequel les dispositifs et les services se multiplient, la connectivité large bande devient omniprésente et le monde hyperconnecté du "tout-Internet" est en passe de devenir réalité.

Aperçu le plus complet au monde des tendances et des enjeux de politique générale auxquels les régulateurs des TIC d'aujourd'hui doivent faire face, l'édition de 2015 de cette publication de l'UIT présente de très nombreuses données et analyses qui aideront les régulateurs, les analystes des TIC et les journalistes techniques à appréhender les questions se rapportant à la réglementation des TIC dites "de quatrième génération".

La réglementation des TIC de quatrième génération, qui se caractérise par une complexité accrue et des répercussions sur de multiples secteurs vise à maîtriser les importants bouleversements socio-économiques que provoquent les TIC. Le rapport préconise une réglementation souple et légère, ainsi que la reconnaissance des droits tant des entreprises que des consommateurs lors de l'élaboration de nouveaux cadres dans l'environnement numérique mondial qui se fait jour.

"Les TIC peuvent rendre le monde meilleur de bien des manières", a déclaré Houlin Zhao, Secrétaire général de l'UIT. "Dans un monde numérique, il est indispensable de créer les conditions qui permettront à une économie fondée sur les données de prospérer, et il est pour ce faire impératif d'instaurer un environnement réglementaire favorable".

Pour faciliter la tâche des régulateurs et des décideurs du secteur des TIC, l'UIT a élaboré l'outil de réglementation des TIC, nouvel outil d'analyse employant des données factuelles qui aide à mettre en évidence les avantages et les inconvénients des interventions du régulateur. Comme indiqué dans le rapport, cet outil de suivi montre que l'association judicieuse d'un petit nombre de mesures réglementaires capitales a bien souvent un effet catalyseur sur l'essor du marché des TIC.

## L'Internet des objets (IoT)

L'édition de 2015 des Tendances des réformes dans les télécommunications confirme que le trafic correspondant aux communications de machine à machine (M2M) généré par des milliards de dispositifs, produits et capteurs connectés représentera une part croissante du trafic sur les réseaux futurs, les communications M2M sur les réseaux cellulaires mobiles apparaissant déjà comme le service TIC enregistrant la plus forte croissance en termes de trafic. Au total, 1 milliard de dispositifs IoT hertziens de toutes sortes devraient être commercialisés en 2015, soit une augmentation de 60% par rapport à 2014, ce qui signifie qu'il y aurait 2,8 milliards d'objets connectés d'ici à fin 2015. Quant aux objets connectés portables, selon les estimations, leur nombre avait atteint les 109 millions début 2015.

D'après les prévisions, pas moins de 25 milliards de dispositifs en réseau seront connectés d'ici à 2020, associés, pour une grande partie, à des entités en contact avec le public (entreprises, hôpitaux, collectivités locales et autres organismes et instituts), et dans une moindre mesure, à l'industrie manufacturière, aux entreprises de services collectifs et au secteur des transports. Sur le plan des recettes, le marché de l'Internet des objets devrait progresser pour atteindre 1 700 milliards USD d'ici à 2019, devenant ainsi le premier marché d'appareils au monde.

En ce qui concerne les dispositifs, la demande de tablettes devrait atteindre 234,5 millions d'unités en 2015. Et si les ventes mondiales d'ordinateurs personnels et d'ordinateurs portables devraient connaître une baisse chronique, les analystes prévoient qu'en 2015, 1,4 milliard de téléphones intelligents seront vendus dans le monde et que les ventes de ce type de téléphones dépasseront les ventes cumulées d'ordinateurs personnels, de téléviseurs, de tablettes et de consoles de jeux, que ce soit en nombre d'unités vendues ou en montant des recettes.

Pour nombre de consommateurs des marchés en développement, l'Internet sera indissociable du téléphone intelligent, et ce d'autant plus que l'on prévoit une forte croissance du segment des téléphones intelligents bon marché. La nette progression

du déploiement de l'Internet des objets sollicitera en outre fortement le développement des infrastructures de réseau, domaine dans lequel de nombreux marchés sont déjà en butte à des difficultés de financement.

"Cette édition des Tendances analyse les répercussions de l'évolution actuelle de l'écosystème numérique sur les consommateurs et sur les entreprises, ainsi que sur la société dans son ensemble," a déclaré Brahima Sanou, Directeur du Bureau de développement des télécommunications de l'UIT, à qui l'on doit cette étude annuelle. "Ce rapport, qui traite de thèmes couvrant tous les aspects de l'élaboration de politiques relatives aux TIC, porte sur des questions aussi importantes que délicates.

## Un monde de plus en plus social

Le rapport montre qu'avec la multiplication des applications, les consommateurs deviennent des communicants numériques, des communicants numériques et des agents vecteurs de changement dans un contexte de transformation numérique qui déferle actuellement sur le secteur des TIC.

En janvier 2015, on recensait dans le monde plus de 2,07 milliards de comptes actifs sur les médias sociaux, dont 81% sur un appareil mobile. Comme les utilisateurs actifs des médias sociaux passent en moyenne près de deux heures 25 par jour sur ces plates-formes, les conséquences économiques de ce temps passé sur les médias sociaux n'ont pas échappé à l'attention des professionnels du marketing et des publicitaires.

Ce mélange des genres entre le monde réel et le monde virtuel ouvre, certes, de nouvelles perspectives économiques mais pose également nombre de nouvelles questions et de nouveaux défis sur le plan social aux régulateurs. Les consommateurs, qui ont accès à de nouvelles possibilités grâce à un choix plus vaste de dispositifs, de services et d'applications en ligne, mais ils s'exposent également davantage au risque de ne plus être maîtres des informations confidentielles et personnelles les concernant. Il est essentiel de définir des mesures politiques et réglementaires volontaristes venant s'ajouter aux solutions et aux initiatives de corégulation ou d'autorégulation. ©

# Dragging on digital distribution

Why and how African nations have missed the UN broadcast switchover deadline, and what should happen now

**T**HE JUNE 17 deadline set by the UN's International Telecommunication Union (ITU), for television programmes to be transmitted only digitally, came and went leaving many African countries failing to make the switch. The deadline was agreed in 2006 by 101 countries in Europe, Africa and the Middle East at the Regional Radio Communications Conference (RRC-06).

But as the deadline approached, even the largest television markets on the continent such as Nigeria, South Africa and Kenya found themselves lagging behind. Indeed, it was only after a tortuous round of legal battles earlier this year, which ended in the Supreme Court, that Kenya finally went digital.

However, the switch was far from plain sailing and not all sides agree that the changeover in the country was a 'success'. The Communications Authority of Kenya says that 60 per cent of TV consumers in Kenya have now acquired digital TV. But local media houses say, shockingly, that up to 90 per cent of Kenyan viewers have now been left without access to television viewing.

In light of the difficulties that were acknowledged by the ITU - even in 2006 - a large number of African countries were at the outset granted exemptions for five years. These include: Algeria; Burkina Faso; Cameroon; Congo; Cote d'Ivoire; Egypt; Gabon; Ghana;

Guinea; Mali; Morocco; Mauritania; Nigeria; Chad; Sudan; Togo and Tunisia.

The 2020 date was also agreed for those African countries that were not present at the 2006 meeting: Benin; Central African Republic; Eritrea; Ethiopia; Guinea-Bissau; Equatorial Guinea; Liberia; Madagascar; Niger; Democratic Republic of the Congo; Sao Tome and Principe; Sierra Leone and Somalia.

## Southern Africa

It was the southern African countries at RRC-06 that were mainly in favour of adhering to the 2015 deadline. However, by June 17 only four countries in the sub-region - Namibia, Malawi, Tanzania and Mauritius - had completed the migration to digital broadcasting. Zambia finalised its switching in July but Zimbabwe will not complete the migration until March next year.

**The eventual global migration is seen by the UN as a vital initiative that will free up enormous amounts of valuable frequencies.**

Obert Muganyura, the CEO of the Broadcasting Authority of Zimbabwe (BAZ), said that his country's migration process faced "numerous challenges" relating to funding, delivery of digital equipment and the delays in implementation of civil works for the installation of the transmission network.

He said that the country requires about US\$125mn to complete the process, which entails replacing all very high frequency (VHF) analogue television bands with the Ultra High Frequency (UHF) digital platform. The funding issue was only resolved after BAZ signed a funding deal with Huawei International early this year.

Such has been the extent of the delay in Zimbabwe - and elsewhere in the region - that at a meeting in June, the Southern African Development Community (SADC) countries agreed to move the date for compliance by 12 months to June 2016.

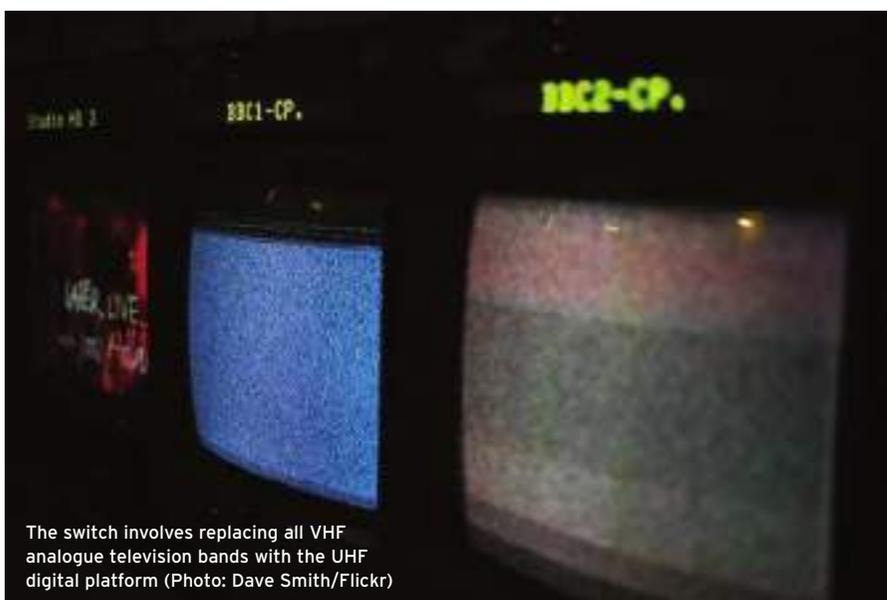
Zimbabwe's Financial Gazette reported the SADC ministers of information and communications technology as saying that the need for the new target became obvious when it became clear that the majority of countries that had agreed to abide by 17 June 2015 were, in reality, in no position to do so. The situation, according to the paper, will be reviewed again in December as there are doubts that even South Africa will be able to fully make the switch until 2017.

## Vital initiative

Although African countries are struggling to make the change from analogue signals to digital the eventual global migration is seen by the UN as a vital initiative that will free up enormous amounts of valuable frequencies.

Analogue signals are very noisy and inefficient and take up a lot of room. By contrast, digital signals are a much more efficient method of communicating as dozens can fit into the same 'space' occupied by the old analogue signal. They are also quieter.

However, the reason that many African countries have - thus far - failed to adhere to the 2015 deadline is not hard to fathom. Making the switch is not cheap. Benin, for example, will require an estimated additional US\$110mn for infrastructure upgrades in order to complete the migration.



The switch involves replacing all VHF analogue television bands with the UHF digital platform (Photo: Dave Smith/Flickr)

South Africa's Communications Minister Faith Muthambi has set aside US\$400mn to subsidise the digital rollout to 5 million of the country's poorest households. But even this large amount may not be enough to complete the project.

Alastair Fairweather, chief technology officer for Machine, an integrated advertising agency, says that if it is assumed that each South African set-top box will cost around US\$40 – a figure which many believe to be on the low side – then the devices alone will cost US\$200mn.

And that is before the cost of educating the millions of people about the change and distributing these devices to every corner of the country, which could run to more than \$8 per device and will easily surpass the total amount that has been set aside.

Meanwhile, a court in Uganda has overturned a ruling by a local magistrates' court that could have effectively hamstrung the switchover. The migration started on June 15, two days ahead of the UN deadline, with the move due to take place in stages, the first of which covering a 60 km radius from the capital, Kampala.

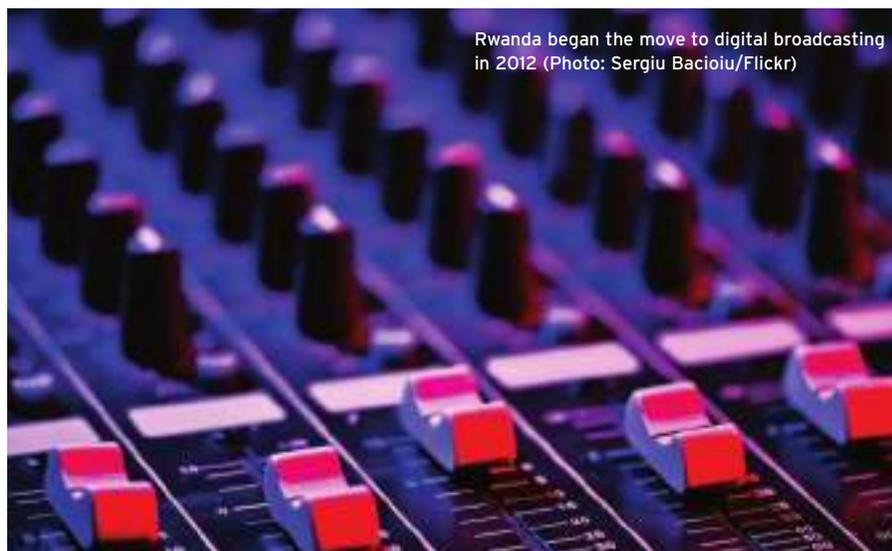
However, on June 17 a city lawyer, Enoch Mugabi, filed an application with the magistrates court in Mengo objecting to the haste of the switch being made by the Uganda Communications Commission (UCC). The Court in Mengo then issued an interim order restraining UCC "from interfering with the broadcasters' transmission of analogue TV signals ...pending determination."

Two weeks later, though, Mengo Chief Magistrates Court overturned its earlier order, directing Uganda Communications Commission (UCC) to immediately switch back to the old television signal transmission of analogue from digital signal transmission. The changeover is now continuing.

### Studying success

In contrast to the legal challenges faced by the digital migration project in Kenya and Uganda, the switchover in Tanzania to wide-band digital video broadcasting (DVB) has been relatively trouble free. The capital, Dar es Salaam, switched off its analogue transmission at the end of 2012 and most cities now receive their TV programmes via DVB-T - terrestrial digital broadcasting via antenna. The remote parts of Tanzania receive broadcasts via satellite.

**Digital signals are a much more efficient method of communicating, as dozens can fit into the same 'space' occupied by the old analogue signal.**



Rwanda began the move to digital broadcasting in 2012 (Photo: Sergiu Baciou/Flickr)

John Nkoma, the director of Tanzania's Communications Regulatory Authority (TCRA), says that Tanzania's success, which has been widely praised throughout the rest of Africa, can be put down to solid government support for the move. Taxes on the decoders were set at a minimal rate and the price itself was subsidised. As a result, Tanzanians can get a decoder for the affordable price of US\$30 each.

Secondly, because the public was accustomed to accessing free-to-air channels the TCRA mandated that in the digital broadcasting platform five of the popular channels must be available as free channels. Hence, viewers at least have five channels to fall back on when their subscriptions expire.

Another migration that has been touted in some quarters as a success is Rwanda, which was an early mover to digital TV. The process began in 2012 and the final regions of the country completed the switchover on 31st July 2014.

However, statistics from the Rwanda Utilities Regulatory Agency (RURA) suggest that television penetration in the country is only 6%. Yet even with this low level of viewer-ship there were technical challenges associated with the migration away from analogue TV.

In contrast to other East African countries that are working to implement the advanced DVB-T2 technology, Rwanda, chose to make the switch to digital using older DVB-T, before upgrading to newer technology. This has been criticised by some experts as being the more expensive option.

Meanwhile, neither neighbouring Burundi nor Malawi further south is likely to be in a position to deliver on their digital TV commitments before the early part of 2016. This is despite promises made in March this year by Chimwemwe Banda Malawi's Principal Secretary to the Ministry of Information, Tourism and Culture that her nation would be ready by the 17 June deadline.

Critics say that Malawi and Burundi, in

**Tanzania's success, which has been widely praised throughout the rest of Africa, can be put down to solid government support for the move.**

common with many other countries in Africa, failed to make the case for digital TV in time and have generally not made their populations aware of the need to changeover.

Indeed in contrast to other regions of the world, there has been a distinct lack of coordination among the various players in Africa; a lack of consistency in government action; lack of incentives for commercial actors to cooperate and confusing messages about the timetable.

Moreover, many African households have other pressing needs and paying for the new equipment ranks low in their budget priorities. Infrastructure providers in electricity-poor sub-Saharan Africa are also faced with having to find the means to accommodate the greater electricity consumption required for digital set-top boxes.

Nonetheless, the die was cast on June 17 this year and there is no going back. There is now no longer any international protection for the analogue TV spectrum, which means that there could be signal interference and degradation if other users are allowed into the spectrum.

The saving grace is that from a signals perspective Africa is one of the least 'crowded' areas on the planet. And that, more than anything else, will work in the favour of those regimes that are scheduled to make the switch in 2020. ©

*Nnamdi Anyadike*

## Kantar, GeoPoll launch media measurement

MOBILE SURVEY PLATFORM **GeoPoll** and media and marketing insights specialist **Kantar Media** are collaborating on a joint product, **Kantar-GeoPoll Media Measurement (KGMM)**, which builds on GeoPoll's existing media measurement service by adding Kantar Media's research expertise and technology tools to GeoPoll's mobile data collection methods.

This launch follows the forming of a strategic partnership between GeoPoll, Kantar Media, and **TNS Global**. This is the first joint product between the three companies.

GeoPoll released its media measurement service in June 2014, becoming the largest provider of overnight audience data for TV, radio, and print in Africa. In the past year, GeoPoll has built on its flagship product by adding tools for media planning and post-campaign evaluation, allowing brands and agencies to assess the performance of their advertisements in almost real-time. The joint product with Kantar

Media will refine the mobile data methodology that GeoPoll has used to collect daily audience data.

James Eberhard, CEO of GeoPoll, said, "Over the past year, clients have used GeoPoll's media data to view audience shifts in real-time, assess the performance of their advertisements, and monitor viewership of one-off events including the World Cup. KGMM will further disrupt the marketplace by bringing a reliable, real-time solution to audience measurement that has been vetted by researchers at both GeoPoll and Kantar Media. We look forward to adding extra capabilities to the product and expanding into additional countries in the coming years."

KGMM is currently available in Ghana, Kenya, Nigeria, Rwanda, Tanzania, and Uganda. The service runs off of GeoPoll's multi-modal survey platform, which sends surveys to a database of 200m users via SMS, voice, and mobile web.

## Aviwest's rental Web portal for mobile newsgathering equipment

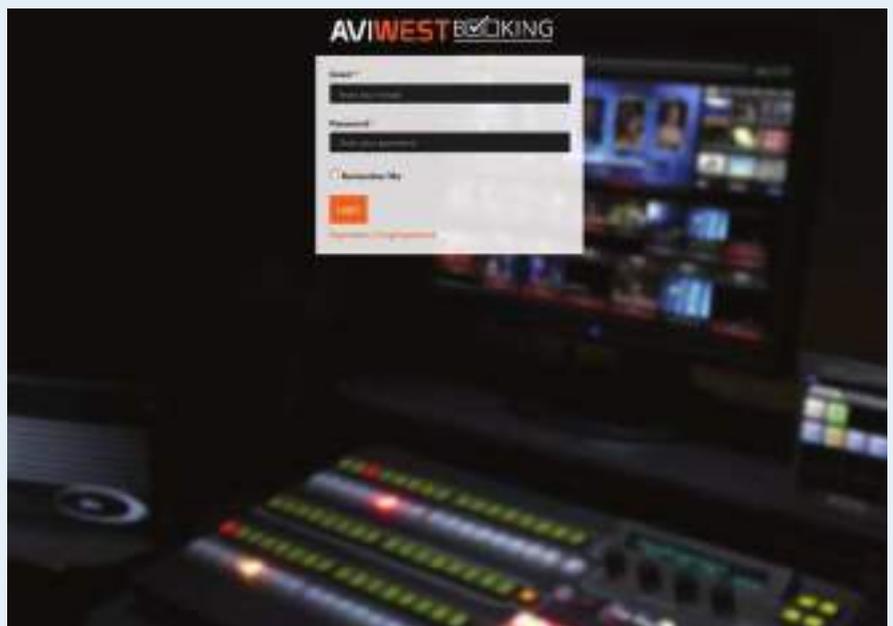
A GLOBAL PROVIDER of video contribution systems, Aviwest has launched a new Web portal, at [www.aviwest-booking.com](http://www.aviwest-booking.com), for broadcasters and video service providers looking to rent the company's digital mobile news gathering (DMNG) solutions. The website, which is free to use for all Aviwest customers and partners, will also include a Q&A forum where broadcasters can discuss the company's DMNG systems as well as other related topics, and receive feedback from a community of users.

"Our new Web portal is designed to connect broadcasters with video service providers so that they can quickly find the digital mobile news gathering solutions and services they need to provide a superior quality of experience to their viewers," said Erwan Gasc, CEO of Aviwest. "The site is interactive and easy to navigate, ensuring an optimal user experience for our customers."

Aviwest's new Web portal is geared toward providing broadcasters and video service providers with a variety of relevant information. Navigating the website, broadcasters can view a complete list of Aviwest equipment suppliers and the services offered by those providers. The portal puts broadcasters in direct contact with video service providers, allowing them to respond to posts for offered services and initiate service requests.

The portal for video service providers looks slightly different, providing instant access to a list of broadcasters seeking professional video services. With a few simple clicks, providers can answer service requests and advertise their offered services.

The Web portal will also host a forum that allows users to share valuable information and advice. It will feature a variety of discussion boards including: Aviwest products; Q&A about Aviwest products and solutions; events; Q&A about past and



upcoming events; travels; and Q&A about local cellular networks and regulations in each country.

A user login and password are required to access the Web portal. To sign up, please visit [www.aviwest-booking.com](http://www.aviwest-booking.com).

### Bringing the news from a backpack

Earlier this year, at 2015 NAB, At the 2015 NAB Show, Aviwest introduced a specially-designed backpack to the mobile newsgathering industry, which enhances the functionalities of the company's DMNG PRO video uplink system. The versatile backpack solution, which can be worn on the back or front, enables in-the-field news crews to carry the DMNG PRO gear for live newsgathering applications with ease.

"Aviwest provides broadcasters with advanced, easy-to-use technologies that enable the capture and delivery of live SD and

HD video over multiple networks, including bonded 3G/4G cellular wireless, Wi-Fi, Ethernet, and satellite, from any remote location around the world," said Mr Gasc. "The new backpack for DMNG PRO is an ideal accessory, streamlining the live newsgathering process further by making it easy for broadcasters to carry and use our equipment in the field."

The backpack is perfectly suited for broadcasters utilizing the DMNG PRO with a handheld camera. The DMNG PRO backpack includes multiple compartments and pockets capable of holding all the necessary video uplink equipment, a notebook or tablet, and any required cables. Two compression straps located on each side of the rear zipper allow broadcasters to attach a lightweight tripod to the backpack. Additionally, a protective rain cover keeps equipment safe in the event of poor weather conditions.

## DK-Technologies adds video monitoring to an audio meter

BROADCAST SOLUTIONS SPECIALIST DK-Technologies has expanded its T7 Series meter with a new product variation; The DKT7 Waveform Monitor. The T7-WFM is based upon the new T7++ motherboard and runs software directly ported from DK's popular PTO800 Video Series.

The T7-WFM features three different parade modes supporting R, G, B, Y, Cb, Cr and Vector Scope with user definable magnification. Outstanding resolution and precision has been achieved on the waveform presentation by utilizing a 256 tap FIR reconstruction filter in the waveform processing, guaranteeing the capture of all data in the analysed video stream.

Besides being a state-of-the-art waveform monitor, the unit will operate in all audio modes available in the previous DKT7 software packages including, multi-channel metering, and multi-set of LKFS loudness metering, signal test generator and much more. The T7WFM draws only 12 watts, and is completely noiseless, a major advantage when used in control room audio listening and editing environments.

Purchasers of the Audio version of the T7 can order the meter "video ready" at the time of purchase as the T7++, and add the Video Option at a later date by ordering the Video Software Key that activates the waveform functions.

"The addition of waveform monitoring is a great addition to the T7," said Ed Simeone, DK Technologies sales agent in the US, "It shows the real power in the hardware platform. Customers can choose to view audio only, video



only, or both simultaneously, all in a one inch thick, fan-free package."

DK-Technologies has been developing high end audio and video monitoring and metering products for more than 20 years and is renowned for the extreme accuracy and quality of its products. In recent years it has led the market in Loudness metering technology, particularly in portable and affordable solutions such as those exemplified by the DK Meter family – a range of audio and loudness metering products that have been exceptionally well received by broadcasters and post production facilities around the world.

## Globecast's tailored portfolio, supporting production for multi-national media

GLOBECAST INCREASES BROADCASTER'S profitability by providing highly efficient media management, distribution, monetisation and contribution solutions. We enable our customers to reach any audience on any platform globally, including OTT, satellite and cable, while only delivering content to Globecast once. Globecast provides a seamless global service with expertise and operational facilities on the ground in London, Paris, Singapore, Los Angeles, Rome, and Johannesburg, with Media Centers - featuring full media management and playout services - in London, Singapore and Los Angeles. Our global approach allows customers to contract once for a turnkey end to end global solution tailored to support their business objectives.

**Globecast provides a diverse range of delivery and distribution solutions, covering satellite, PoP reach and Internet connectivity**

The media solutions presented by Globecast at IBC 2015 are tailored to support the business objectives of each customer whether that's global expansion, increased monetisation, streamlined workflows or greater audience engagement (or a combination of them all). Globecast will have a team of experts on hand throughout the show to

**Globecast increases broadcaster's profitability by providing highly efficient media management, distribution, monetisation and contribution solutions**

help broadcasters find the best solution to support their business needs. As presented at IBC 2015, the company's most recent offerings include: Media Factory; localisation & Edge playout; packaging; creative and compliance services; creative and compliance services, OTT; and delivery.

### Media Factory

Media Factory is Globecast's cloud approach to handling and preparing content for any kind of distribution. Media Factory breaks down the traditional siloes related to separate content preparation workflows for different distribution approaches or different regions and allows customers to provide content to Globecast once and then deliver to linear playout, OTT and Video on demand platforms. Media Factory allows Globecast's three media centres in London, Singapore and Los Angeles to seamlessly work as a single operation.

### Localisation & Edge playout

Localisation enables broadcasters to increase revenues and get more value from their existing content and channels by localising them on the edge for different regions or platforms.

### VoD packaging

Globecast VOD packaging allows broadcasters to seamlessly deliver VOD content to some of the biggest TV platforms across Europe and Asia. The solution removes the complexity in the broadcaster

caused by the different metadata and technical standards required by VOD platforms globally.

### Creative and compliance services

Globecast offers an unparalleled range of creative, production and post-production services for broadcasters, content creators and clients with post production needs: from channel branding and graphics, through to regulatory compliance, language versioning, editing and promo creation.

### OTT

**TV Everywhere:** Globecast provides an end-to-end solution for the management and delivery of live and on-demand content. The modular solution allows Globecast experts to work with customers to tailor a solution to support their business objectives including: encoding, origin servers, CDN, application design and analytics.

**Monetisation:** Globecast provides broadcasters all the tools needed to understand the performance of their multi-screen strategy and monetise their content through subscription and transactional payment options.

### Delivery

Globecast provides a diverse range of delivery and distribution solutions, covering satellite, PoP reach and Internet connectivity. Broadcasters can reach a variety of content receiving communities (FTA DTH, DTT and DTH, cable, IPTV, OTT Pay TV platforms). The company developed its portfolio of services in the US through a new satellite position: AMC11 which will be used in combination with ground services to support customers from the LA Media Centre at Culver City.

## Adobe's stock content service integrates directly into content creation

THE RECENTLY-LAUNCHED ADOBE Stock is the media industry's first stock content service to be integrated directly into the content creation process and the tools creatives use every day. Available through Adobe Creative Cloud, this new service radically simplifies buying and using stock content, including photos, illustrations and graphics.

"Adobe Stock extends Creative Cloud's value as a vibrant global marketplace," said David Wadhvani, senior vice president, Digital Media, Adobe. "Eighty-five percent of customers who purchase stock images use Adobe creative tools. The deep integration with our latest Creative Cloud desktop apps, including Photoshop and InDesign, makes buying and using stock photos incredibly easy. At the same time, our customers – the best photographers and designers on the planet – will have the opportunity to contribute millions of new photos and images to Adobe Stock. This is really going to raise the bar in the world of stock content."

Adobe Stock, a curated collection of 40 million-and-growing high-quality images, is deeply integrated into the latest releases of Photoshop CC, InDesign CC, Illustrator CC, Premiere Pro CC and After Effects CC. Designers can launch Adobe Stock directly within CC desktop software, add watermarked images to their Creative Cloud Libraries, and then access and work with images across multiple desktop tools. When creatives are ready to license the image for finished work, they can do it directly within the desktop software they are working in. Thanks to Creative Cloud's signature CreativeSync technology, all edits made on a watermarked image are automatically applied to the newly licensed image, saving hours of potential rework.

## IneoQuest innovates video quality monitoring, reporting and analysis

MEDIA SOLUTIONS FIRM IneoQuest Technologies now offers a its comprehensive suite of video analytics solutions providing the foundation for video Customer Experience Management (vCEM) systems.

IneoQuest's solutions begin by measuring, monitoring, and aggregating video delivery performance and audience behavior in real time from multiple points across an ever-evolving array of distribution and delivery networks. Unrivaled analysis capabilities are then unlocked through a marriage of this performance intelligence and detailed viewer behavioral data, allowing IneoQuest to provide the deepest, most comprehensive understanding of video performance and correlated audience response in the industry.

"Increasing competition for a finite universe of viewers has made the quality of the viewer experience a critical currency in the rapidly expanding multiscreen video market," said Kurt Michel, VP of Marketing at IneoQuest.

"The ability to accurately monitor and report on delivered video quality and audience response in real time down to the device level is critical to managing the delivery infrastructure and the overall customer experience. We look forward to showing video business leaders at ANGA COM how IneoQuest's industry-leading video analytics tools can help them build the customer loyalty and relationships that are critical for business growth."

With over 700 customers around the world, IneoQuest is an established partner in video monitoring, reporting and analytic solutions.

## Intelsat enables easier navigation of maritime broadband networks

SHIP OPERATORS WELCOME the prospect of higher performance and throughput from new high throughput satellite (HTS) networks and the host of new applications that this technology will enable. To meet this demand, service providers are searching for cost efficient models to best incorporate HTS into their existing network infrastructures, particularly given constrained budgets.

Satellite services provider Intelsat SA has introduced IntelsatOne Flex, a customizable, managed mobility service that allows service providers to easily and cost effectively launch services across the maritime, aero and government verticals, as a complement to Intelsat's existing broadband services to the sector. For maritime service providers, IntelsatOne Flex is an enterprise grade, wholesale Mbps service with tiered Committed Information Rate (CIR) plans that allow service providers to offer unique and tailored services.

With Intelsat's global Ku-band satellite fleet and Intelsat EpicNG high throughput satellite platform, service providers using IntelsatOne Flex will benefit from both wide beam and high performance spot beam coverage that combine to deliver high quality, global connectivity with smaller antennas, improving accessibility and user economics. Intelsat's global terrestrial infrastructure, including teleports, shared hubs and fiber, connects service providers everywhere to the world's largest integrated hybrid satellite network. IntelsatOne Flex uses iDirect Velocity®, a ground infrastructure platform designed for large-scale global HTS networks, which has been fully optimized for Intelsat EpicNG to provide scalability, performance and higher throughput. Leveraging iDirect Velocity, IntelsatOne Flex incorporates features that have been optimized to the Intelsat EpicNG environment including next-generation remote and hub processing capabilities that enable significantly higher throughput rates and global bandwidth management ensuring seamless connectivity across multiple spot-beams, and very fast beam switching features. IntelsatOne Flex is fully integrated with Velocity's companion network management system, Pulse®, enabling service providers to develop differentiated service offerings, create customized applications and system integration through open APIs and provide visibility for real-time monitoring, tracking and adjustment of vessel service levels. "In order to meet increasing broadband demands, both ship operators and service providers alike need to embrace and leverage the power of the high throughput



Intelsat EpicNG is optimised to provide scalability, performance and higher throughput

satellite technologies that are coming to market. However, not all high throughput platforms are the same and not all are able to scale and integrate HTS cost effectively into existing network infrastructure," said James Collett, head of mobility and energy services, Intelsat. "With IntelsatOne Flex, service providers have a new option that will provide a flexible, global managed service that easily scales to meet growing broadband requirements, optimizes bandwidth allocations and ensures available and secure delivery of bandwidth where and when it is needed. Importantly, the power, accessibility and efficiency of Intelsat EpicNG will ensure that service providers future-proof their network with reduced upfront capital expenditure and are able to address fast changing market demands."

## Les Trophées Sesames : des innovations qui préfigurent les usages de demain

ORGANISÉS DANS LE cadre de Cartes Secure Connexions, les Trophées Sesames récompensent les 10 meilleures innovations technologiques des secteurs de la carte à puce, de la sécurité numérique, de l'identification, des transactions sécurisées et des technologies sans contact.

Pour cette 20<sup>ème</sup> édition, les participants provenant de 15 pays soumettent leurs projets au regard critique et aiguisé d'un jury d'experts internationaux, tous impliqués dans le développement des « smart » et « secure » technologies.

### Les Trophées Sesames : la catégorie « Banking & Payment Application » largement représentée

Label incontesté, les Trophées Sesames qui fêtent en 2015 leur 20<sup>ème</sup> année d'existence, récompensent comme tous les ans les projets qui reflètent la dynamique d'innovation de l'industrie des technologies de la confiance et de la sécurité.

Une large participation marque l'édition 2015, tout comme l'arrivée au programme de deux nouvelles catégories : la première « Best Joint Initiative » récompense les réalisations élaborées à partir de la collaboration de plusieurs entreprises ayant des objectifs économiques et sociaux communs, la seconde « Best Connected Objects Applications » rend compte du développement fulgurant des objets connectés ces dernières années.

Olivier Trebucq1 membre du jury, catégorie « Discovery » constate que : « Les Trophées Sesames 2015 ont cette année encore connu un large succès. En termes de technologies et d'applications, ce sont celles de la catégorie « Best Banking & Payment Application » qui se taillent la part du lion, avec près de 50 propositions. De nombreux projets également pour les catégories « Best IT Security Solution » et « Best Identification Application » répondent aux besoins grandissants de sécurité et de vérification de l'identité dans les échanges et le commerce en ligne.

D'une façon générale, les innovations présentées correspondent aux attentes des opérateurs de réseaux et prestataires de services qui doivent prendre en compte le nomadisme des usages ».

### Un concours, à la fois vitrine de l'innovation et tremplin médiatique

La compétition 2015 qui recense des entreprises provenant de 15 pays différents était ouverte à tous les projets innovants, aux exposants comme aux non-exposants du salon Cartes Secure Connexions. Ce concours gratuit, accueille tous types de sociétés, depuis les start-ups, les PME, jusqu'aux grands leaders mondiaux.

Les lauréats de cette 20<sup>ème</sup> édition seront dévoilés lors de la cérémonie de remise des prix qui se tiendra le 17 novembre prochain, jour même de l'inauguration de Cartes Secure Connexions.

A l'issue de cette cérémonie, les vainqueurs de chaque catégorie ont l'opportunité de présenter leur innovation lors des « Innovation Breaks » sur « l'innovation TV », le plateau de télévision installé sur Cartes Secure Connexions. Pendant toute la durée du salon, les images seront diffusées en offrant ainsi aux gagnants une notoriété et une légitimité inégalée comme en témoignent les lauréats de l'édition 2014.

Mareike Neumayer, Senior Communications Manager, business Solutions Division - Morpho, a dit : « Etre gagnant d'un Sesames en 2014 avec MorphoTablet, nous a permis de présenter notre nouveau produit à une audience pertinente et a augmenté la notoriété de notre marque. Nous avons bénéficié de canaux de communication supplémentaires grâce à CARTES Secure Connexions. La communication faite autour des Sesames a apporté beaucoup de visibilité à notre produit. Notre produit primé, MorphoTablet™, a été déployé en quantité importante dans plusieurs pays à travers le monde. Une tablette biométrique nouvelle génération va sortir bientôt. La compétition Sesames représente une formidable plateforme permettant à Morpho de montrer son esprit d'innovation. »

## Apple présente le meilleur iPod touch à ce jour

UNE ENTREPRISE INNOVANTE au monde avec l'iPhone, l'iPad, le Mac et l'Apple Watch, Apple a présenté le meilleur iPod touch à ce jour, et dévoilé une nouvelle gamme de couleurs pour tous les modèles d'iPod : gris sidéral, argent, or, rose et bleu. Ultra-portable, l'iPod touch est doté d'un nouvel appareil photo iSight 8 mégapixels pour prendre de superbes photos, d'une caméra FaceTime HD améliorée pour des selfies encore plus réussis, de la puce A8 d'Apple aux performances graphiques 10 fois supérieures pour une expérience de jeu plus immersive que jamais, et de fonctions de fitness enrichies grâce au coprocesseur de mouvement M8. Avec le tout nouveau service Apple Music, les membres peuvent profiter de playlists concoctées par de talentueux experts musicaux du monde entier, se tenir informés de l'actualité musicale grâce à la radio Beats 1 diffusée 24 h/24 et 7 j/7, ainsi que commenter et aimer les photos et vidéos de coulisses de leurs artistes préférées sur Connect.

« L'iPod touch permet à nos clients du monde entier d'accéder à Apple Music, à l'App Store et à iOS, le système d'exploitation mobile le plus avancé au monde, à partir de 239 », a déclaré Greg Joswiak, vice president of iPhone, iPod and iOS Product Marketing d'Apple. « Grâce aux avancées



L'iPod touch

majeures comme la puce A8 et l'appareil photo iSight 8 mégapixels, les clients peuvent profiter des jeux de dernière génération, prendre des photos encore plus somptueuses et profiter de leur musique et de leurs séries TV et films préférés. »

Avec la puce A8, la même puce que celle du révolutionnaire iPhone 6, les utilisateurs peuvent se plonger dans des jeux encore plus immersifs des heures durant, tout en bénéficiant d'une autonomie remarquable. L'iPod touch offre une expérience de jeu mobile parmi les plus appréciées au monde. Son écran Retina de 4 pouces et son catalogue exceptionnel de jeux tirent encore mieux

parti des performances graphiques exceptionnelles. L'iPod touch permet aussi de profiter de milliers de jeux optimisés avec Metal. Avec l'appareil photo iSight et la caméra FaceTime HD de pointe, les utilisateurs d'iPod touch bénéficient pour la première fois de fonctionnalités populaires comme le ralenti et le mode rafale, et immortaliser un moment sous forme de magnifiques photos et vidéos. Le Wi-Fi trois fois plus rapide permet aux clients de garder le contact avec leurs proches en passant des appels FaceTime, ou encore de télécharger facilement des films et séries TV.

**Jouve Digital Publishing offre une application pour distribuer et consulter les livres numériques enrichis au format EPUB3**

ENTREPRISE DE SERVICES numériques, Jouve propose une nouvelle offre dédiée à la distribution et la lecture de livres numériques. Composée d'une plateforme de gestion de diffusion des publications et d'une application de lecture pour EPUB3, Jouve Digital Publishing permet à tous les lecteurs d'accéder aux contenus enrichis et à jour.

Les éditeurs, les entreprises et les administrations souhaitent diffuser en toute liberté leurs publications numériques et interactives sur tablettes et smartphones. Alternative aux offres de kiosques publics, la dernière innovation du Groupe, Jouve Digital Publishing, répond parfaitement à ces nouveaux enjeux.

Composée d'une plateforme hébergeant tous les contenus (disponibles en mode SaaS ou mode licence) et d'une application de lecture compatible avec la plupart des terminaux de lecture et systèmes d'exploitation, Jouve digital Publishing est une solution en marque blanche disponible sous iOS et Android et Windows 8.1.

Personnalisable et hautement interopérable, cette application est pérenne car elle s'appuie sur le moteur de rendu Open Source Radium, initié par l'international Digital Publishing Forum\*.

Membres du Consortium Radium, les experts de Jouve ont donc intégré le lecteur Radium et développé des

couches applicatives permettant de garantir un rendu optimisé et ce quelle que soit la plateforme OS de distribution : Android, iOS ou Windows 8.1.

Parmi les fonctionnalités proposées :

- Protection des contenus par chiffrement et obfuscation
- Navigation avancée (sommaire textuel, en images & accès direct aux ressources)
- Recherche avancée full-text, avec mise en évidence des résultats
- Gestion d'annotations audio, texte et marque page

Le format HTML5 associé aux standards CSS3 et JavaScript permet à cette solution de gérer de manière optimisée la diffusion de publications riches et interactives.

De plus, Jouve Digital Publishing s'interface avec toute application tierce de type système éditorial, solution de gestion d'abonnement ou site web marchand.

« Le groupe Editis souhaitait pouvoir disposer d'un reader EPUB3 spécifique pour permettre l'affichage d'ebooks enrichis, plus spécialement pour le secteur de l'éducation et la jeunesse. Nous voulions personnaliser et enrichir le reader de fonctionnalités indispensables pour un usage en classe. De plus, nous recherchions une alternative aux principaux readers du marché qui ne respectent que partiellement le

standard EPUB3, afin de pouvoir diffuser sur tous les systèmes d'exploitation nos ebooks enrichis en EPUB3. Notre choix s'est porté sur Jouve Digital Publishing car cette solution s'appuyait sur l'utilisation du moteur Radium, ce qui lui assure la meilleure pérennité et un respect strict du standard EPUB3. La solution de Jouve nous permet aussi de personnaliser notre application et de gérer notre distribution en proposant des offres en abonnement par exemple. L'intégration de la solution dans notre plateforme technique de distribution s'est réalisée sans aucun problème et nous disposons pour cette rentrée d'outils robustes, simples d'utilisation pour permettre à nos clients de consulter leurs ebooks enrichis sur tous les types d'appareils » explique Sylvain Fayol, Directeur du marketing et innovation - SEJER - groupe EDITIS.

Selon Arnaud Cordelier, Directeur de l'Unité Produit de l'activité Jouve Services Editoriaux : « Jouve Digital Publishing va permettre à tous nos clients de maîtriser la diffusion de leurs publications, de diffuser de façon sécurisée leurs contenus et d'en assurer facilement la mise à jour ».

*\*Consortium international à l'origine du format de livre numérique EPUB*

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## Phase one project

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- Senegal - Côte d'Ivoire  
- Côte d'Ivoire - Sao Tome & Principe

14 countries connected on the coast,  
2 landlocked countries

## Phase two project

Phase2, under construction or planned:

- Extension from Sao Tome & Principe - South Africa

- Canary Islands - Benin - Nigeria to be operational May 2015

- Republic of Cameroon - Democratic Republic of Congo - Angola - Namibia



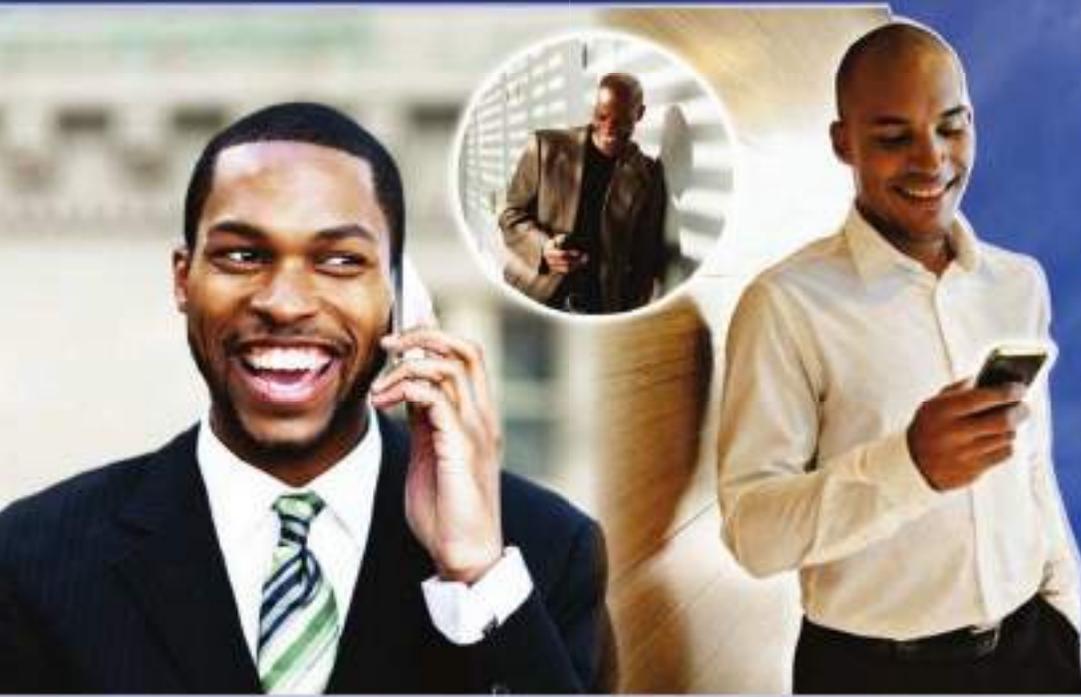
## ACE,

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