Comsol announces largest IoT network deployment in Africa

Comsol's open architecture, open platform Low Power Wide Area National network deployment, Comsol IoT, has been launched. Backed by a global alliance and driven by international giants such as Cisco and IBM, the latest generation IoT network offers low cost, long range, low power IoT connectivity, capable of supporting geolocation. The Comsol IoT network will be deployed on the back of Comsol's R1,5 Billion Open Access Layer 2 National network investment and will be available for sensor service termination by February 2017 in the major metros.

The Internet of Things (IoT) is fast becoming a reality. Forrester reports that 23% of enterprises currently use the IoT, with another 29% planning to do so within 12 months. According to recent research by CompTIA, the number of connected things is projected to grow at an annual compound rate of 23.1% between 2014 to 2020, reaching 50.1 billion things in 2020.

However, connecting these billions of devices is a challenge for traditional networks as many don't have the reach to cover vast geographical areas, and most involve high costs.

LoRa Wide Area Network (LoRaWAN) technology solves these challenges. Enabling a flexible IoT network ideal for the efficient and cost-effective monitoring and management of assets and infrastructure, these low power networks enable wireless connectivity for millions of sensors and smart devices over wide geographical areas.

These networks have already been deployed nationally in countries such as The Netherlands, South Korea, and Japan with localised deployments in other countries around the world. Comsol has now initiated the largest deployment of this technology on the African continent with the launch of Comsol IoT.

"IoT offers solutions for smart cities, smart businesses, and even many of the challenges we face as a society, for example managing scarce resources like water. By enabling smart tracking, smart perimeter control, smart agriculture, smart buildings, as well as smart city applications like metering and manhole cover monitoring, IoT is already fundamentally changing how we live. We are proud to introduce the network that is going to empower African utilities, businesses, and individuals to gain the benefits the IoT offers," says Iain Stevenson, CEO of Comsol.

Designed to avoid interference, Comsol IoT combines the wide coverage area of cellular networks with low-power radio technology to provide ubiquitous connectivity in a single, cost-effective and secure wireless network. Serving a previously unaddressed market, Comsol IoT offers broad geographic coverage – including urban and rural areas – to create an ecosystem that supports the connectivity of millions of devices.

"Comsol IoT is the ideal solution for applications where power-constrained devices are distributed over large geographical areas. So in the case of water or electricity meters, or agricultural monitoring, to name a few, the network offers wide reach as well as power and cost savings. Battery life of up to 15 years can be achieved for some of these devices due to the relatively small data sets and transmission rates enabled by Comsol IoT. The high costs associated with manual monitoring, replacement of batteries and GPS devices are also no longer factors for organisations wanting to run a smart operation," says Justin Colyn, Executive Head of IoT of Comsol.

He adds that this provides opportunities for the developers operating in the market as well as the businesses leveraging the IoT solutions being created. "By virtue of the fact that Comsol IoT is an open access, open protocol network, any IoT applications that are developed will be seamlessly enabled to the devices and sensors they are meant to serve. There's no vendor lock-in, creating a diverse ecosystem that will serve to take African IoT to the next level."

Comsol's drive to connect Africa, without limits, has extended this deployment to include securing several device distribution agreements in South Africa. And by partnering with Actility, a global leader in Low Power Wide Area network software, Comsol has enabled South African customers to benefit

from a complete solution.

"Actility is an industry leader in Low Power Wide Area Networks (LPWAN). ThingPark by Actility offers a carrier-grade IoT platform, with a growing ecosystem of partners; low-power, long-range wireless networks for sensors and devices; an operating system and middleware that enables web applications to connect seamlessly with data from different sensors; and a B2B e-commerce market featuring tested and approved IoT device, connectivity, and application partners," explains Actility CEO Mike Mulica.

"We're delighted to be supporting Comsol in rolling out a national IoT network for South Africa," Mulica adds. "Comsol is one of the most innovative communication service providers in the world today, committed to a wide range of connectivity options to create the optimum network for every application. We're very happy that Comsol has chosen LoRaWAN to complement their existing network for the incredibly diverse range of IoT use cases expected in South Africa, and that they have chosen Actility's carrier-grade ThingPark platform to enable that network."

Stevenson adds that Comsol IoT will not only provide an end-to-end solution for organisations moving into the IoT world, it offers a platform on which an entire ecosystem can be created to address the challenges the modern world faces. "IDC predicts that 25% of all IoT applications will be running over low power WANs like Comsol IoT by 2020. We are proud to be able to ensure that Africa's IoT-enabled devices are not only connected by the most reliable and cost-effective network, but that they are able to create changes in the way agriculture, resource, and conservation management are conducted. IoT will change the face of the continent, and Comsol is honored to be at the forefront of that revolution."