

To stay ahead of fast-growing wireless traffic, Ooredoo Tunisia turns to CommScope for rapid-deployment concealment solutions



Customer

Ooredoo

Country:

Tunisia



It's a paradox being played out around the world: the most densely populated cities where wireless traffic is growing fastest are also the most difficult places to add network capacity, with few available options for new antenna sites. In Tunisia, wireless operator **Ooredoo Tunisia** is using CommScope concealed tri-sector antenna systems to add new network capacity without building new towers, and stay ahead of the rapid growth of wireless in the capital city of Tunis.

Ooredoo Tunisia's fast-growing wireless traffic encounters a roadblock

Founded in 2002, Ooredoo Tunisia is Tunisia's first privately-owned telecommunications company and is now the nation's largest mobile operator, and one of its most recognized brands. Each day, Ooredoo's truly national network delivers a range of prepaid and postpaid voice and data services to more than five million individuals and businesses across Tunisia.

Driven by an unprecedented increase in wireless traffic in Tunisia, providing additional network spectrum and improved spectral efficiency have become critically important to Ooredoo's ability to deliver excellent wireless service to its customers. However, planning and zoning restrictions make it nearly impossible to deploy new antenna sites using traditional tower

architecture in the large capital city of Tunis where demand for wireless service is highest. This has led to an increasing need for flexible, customized antenna solutions that can be concealed within the urban environment with minimal aesthetic impact and fewer permitting issues.

"Concealment solution is supporting Ooredoo to solve site acquisitions issue and to provide coverage in urban sensible areas for normal site deployment."

> Hedi Dellagi, associate director of Deployment Department, Ooredoo TN

— Issam Riahi, RF Engineering team leader, Ooredoo TN

CommScope concealed antennas keep Ooredoo's network growing

Ooredoo Tunisia is a long-time CommScope customer that has relied on CommScope solutions to enable its rapid network expansion and delivery of high-quality voice and data service. Leveraging this long-term partnership, Ooredoo chose **CommScope concealed tri-sector antennas** for deployment on billboards, light poles and other existing street structures in greater Tunis.

The CommScope tri-sector system consists of three five-band antennas with 15- to 20-degree azimuth independent panning capability for each sector. Installed in a cylindrical shroud, the system includes built-in remote electrical tilt (RET) to enable precision antenna adjustment without the need to visit the site or climb the tower.

Other key benefits of the CommScope concealment solution include:

- Ability to **customize the system** to meet the individual requirements of each site
- Fast, simple installation—just one day with a two-person crew instead of the usual two days
- **Logistical simplicity**—a single part number covers the entire bill of material for the site
- Quality assurance—each antenna is fully tested at the factory for PIM, isolation and return loss to ensure it fulfills the specified values, with no need for further testing in the field



Now you see it...

Now you don't.

Ooredoo Tunisia installed this CommScope tri-sector antenna system between two existing billboards to expand wireless service without adding new towers to the urban landscape.



Lower labor costs and easier permitting

Minimizing the number of technicians needed and the amount of time they spend onsite is critical. Not only does the CommScope solution reduce typical installation time by 50 percent, but, with factory pre-testing, it also reduces the likelihood of future field visits to replace failed components. With simplified installation and no need for field testing, Ooredoo saves on labor costs and is able to deploy workers to perform other network maintenance and troubleshooting tasks as needed.

Since they are mounted within existing urban street structures, CommScope's concealed antenna systems typically make it much easier to get the necessary permits from local authorities. This enables Ooredoo to install new sites in places where before it was difficult or impossible to obtain permits.

By the summer of 2016 Ooredoo had installed CommScope concealed tri-sector systems at 10 sites in greater Tunis, with additional installations scheduled. Similar CommScope concealment solutions are also being deployed in Europe, as well as at other sites around the globe, as demand for wireless outpaces the availability of new antenna tower sites in urban areas.

"CommScope specializes in customizing solutions to help our customers find suitable solutions in difficult deployment areas. In this case, with CommScope Concealment Solutions, Ooredoo managed to overcome site acquisition blocking and avoid any delay in their rollout to increase the coverage."

Sayf Shehatha—regional manager North Africa, Lebanon & Iraq

Your network runs on CommScope

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