

CONNECT

Advanced Communication System



About

CONNECT provides NB long-range remote water meter reading solutions, with fast and simple infrastructure deployment, significantly faster than the solutions currently available in the market. **CONNECT** offers stable UHF AMI/AMR communication over time, lowering the costs of installation and maintenance, along with minimal communication equipment positioning throughout the city.

The **CONNECT** Network offers a reliable, responsive, and economical, two-way communications secured and accurate meters reading, eliminating the need for drive-by remote meter reading.

The **CONNECT** provides hourly, time-stamped data to help utilities improve their business operations.

The **CONNECT** RF Network's AMI radio architecture consists of the following components:

- Integrated METER TRANSITION UNIT (MTU)
- CONNECT SUPER COLLECTOR UNIT (Gateway)
- CONNECT NANO REPEATER

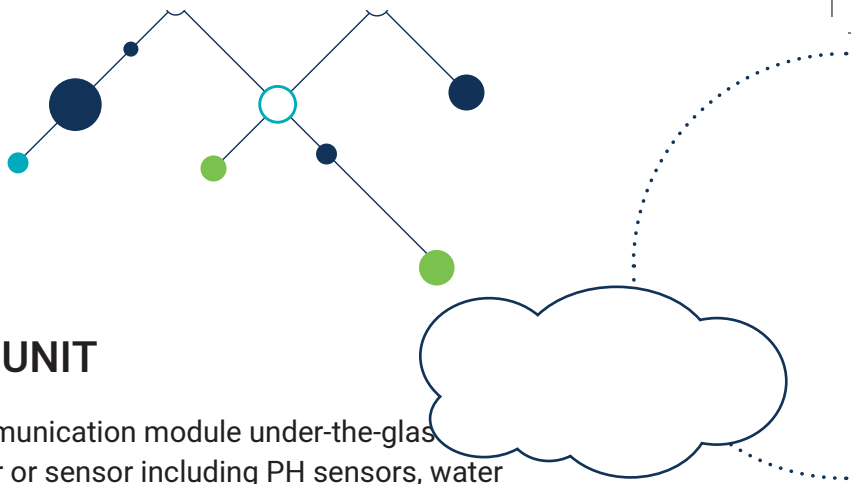
For data management and analytics Gaon Technology offers **CITYCOM**, a state-of-the-art control & management water system (MDM) CityCom was developed in an Open concept, with the ability to easily interface with various meters and sensors of different communication standards. The **CITYCOM** is a powerful and innovative control and management system that provides accurate water consumption information, convenient graphical data presentation and a user-friendly interface, BI analytics reports, advanced and flexible alarm system with SMS and emails notification.

The collected data can be used for a wide variety of applications including:

- Billing
- Revenue assurance
- Leak management
- System capacity planning
- Consumer engagement



ANY COMMUNICATION •
ANY METER •
ANY APPLICATION •



CONNECT

CONNECT METER TRANSMISSION UNIT

CONNECT offers integrated water meters with communication module under-the-glass external universal communication unit for any meter or sensor including PH sensors, water quality sensors, pressure control sensors, as well as utilities such as gas, electricity, and more. The transmission unit (internal or external) provides utility with accurate and timely data to increase efficiency, conserve water, and improve customer service.

CONNECT MTU provides a complete system read with all the necessary information including leakage and theft alerts and reduces NRW. The collected enables all parties to make better decisions reducing costs and strain on the grid.

can transmit its data as far as 5 KMs line of sight, and up to 1.5 KM, in urban normal deployment.

This long range is achieved by two key features:

- a dedicated, licensed FCC frequency
- highly sensitive receiver



CONNECT SUPER COLLECTOR UNIT

The **CONNECT SUPER COLLECTOR** radio super collector is a NB long-range device that receives signals both from **CONNECT MTU** and collectors then forward them to the communication management Head-End Transceiver.

The **CONNECT SUPER COLLECTOR** is a super collector that stores and communicates the data collected from end points and standard collectors through a wireless link. The unique NB output and high-speed communication is ideal for managing large scale communication networks, extending transmission distances and system capacity. The RMR can expand a localized radio network to a countrywide system due to the equipment's extensive connectivity, modular design, and smart programming.

The **CONNECT SUPER COLLECTOR** is expandable taking the system design today while preparing for the growth of the future with the ability to operate on either VHF or UHF channels simultaneously.

is a true end-to-end RF solution. Third party communications such as Cellular and NB-IoT, Internet connection, or Fiber Optic can be utilized as backup/s. Therefore, data flows to the MCM software instantaneously.



CONNECT NANO REPEATER

Bidirectional, compact, radio module for automatic meter reading

The **CONNECT NANO REPEATER** is designed to collect meter data in periodical interval or communicate on demand to the **CONNECT SUPER COLLECTOR UNIT**

Critical events like alarms are lead automatically through the radio network in less than 20 minutes when immediate alarms are supported by the radio endpoints.

CONNECT NANO REPEATER work as a relay station for the received radio transponder modules and forward the data over longer distances to **CONNECT SUPER COLLECTOR**

The **CONNECT NANO REPEATER** uses an integral lithium battery and doesn't need external supply voltage. It can transmit over a longer distance because its higher output power

RF Radio protocol Standard 450-470 MHz

