Manhole Monitoring Platform:
Bandgi Technologies helps in monitoring Manhole Systems:

The Challenge:
A utility company in North America was facing a critical need to remotely monitor their Manhole System (MMS) in a big metropolitan area. Accidents related to manholes in winter months created substantial financial liability and a bad business name for the client.
The previous attempt to put smart sensors around the manhole was unsuccessful, and costs piled up. The client approached Bandgi Technologies to help them with their IIoT platform to monitor the MMS.

The Approach:
Bandgi Technologies developed a small Proof of Concept (POC) scheduled for 10 devices to demonstrate end-to-end communication with sensors and their IIoT platform. They worked with network and security vendors to create a secure channel between sensors and the IIoT platform. They also created an interactive dashboard with map layers for sensor location, active alarms, sensor data history, and customized graphs and reports for end-users.
The POC provided an impetus to the end client as one of the leaders in adopting IIoT in the MMS area. Within three months, there were 1,100 devices on the platform. The client ordered 8,000 devices with enhanced capabilities of IR and VS images, power harvesting, and real-time monitoring of the MMS system with customizable user alarms.

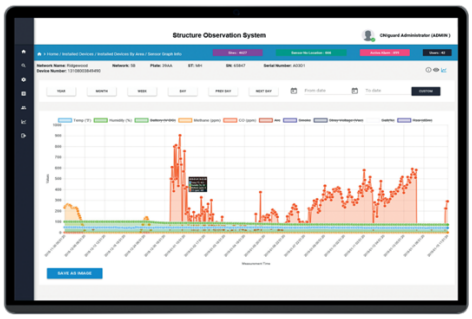

Figure 1:Dashboard

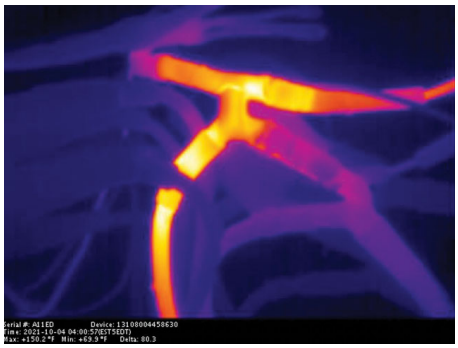

Figure 2: IR Image processing

The Solution:

The IIoT platform created by Bandgi Technologies helped the client monitor their MMS remotely and provided valuable insights into the MMS system. The client was able to identify patterns and predict future incidents, enabling them to take proactive measures to prevent accidents related to manholes.
The real-time monitoring and customizable user alarms also helped the client to respond quickly to any incidents related to the MMS system. Bandgi Technologies' IIoT platform helped the client to reduce their financial liability and to improve their business name by preventing accidents related to manholes.
The platform also helped the client increase efficiency by monitoring their MMS system remotely and identifying and resolving issues in real time.