

The district of San Borja has areas of high traffic and trade that require optimal safety systems operating continuously, so Netkrom the municipality has provided a wireless video surveillance system, consisting of a network of surveillance cameras strategically located.

In order to observe the impact of these areas, the cameras located in different parts of the district are controlled with a wireless network that operates on free frequencies (900 MHz and 5GHz). This network also consists of 4 nodes, which house, each an average of 10 cameras, which are relayed to a central node, which completes the video surveillance system.

# **TECHNICAL DETAILS**

Client: Municipality of San Borja Location: District of San Borja. Region Lima, Peru.

#### Solution:

Remote Video Surveillance System over Wireless Platform

WebSite:

www.munisanborja.gob.pe

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## **CUSTOMER DESCRIPTION**

The district of San Borja is characterized as one of the most exclusive areas of Lima, Peru's capital city. Surrounded by parks and gardens, San Borja is a place where families feel safe to share moments of leisure, enjoying the planned urban development that is reflected in the landscape, order and tranquility.

San Borja is bordered on the north by the districts of La Victoria, San Luis and Ate north to northeast, with grooves and Surquillo the south, and San Isidro in the west. For the district crosses the electric railway so the movement of people has increased considerably in recent months.

To provide the necessary security to the residents of the district, the City of San Borja has a complete wireless platform that has the ability to meet the needs of video transmission in real time to a central security. For the optimal implementation of this solution has included a wide range of products Netkrom as MB-ROMB or AIR-PTP500AH.

## **PROJECT DESCRIPTION**

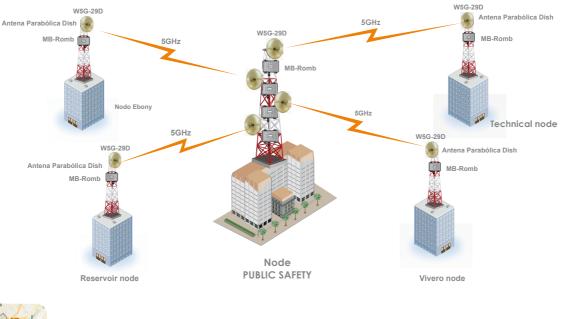
The solution provided to the Municipality of San Borja was the implementation of the team that makes up the video surveillance system and its adaptation to specific customer needs. Therefore Backhaul system is used Multiband, which handles a lot of point to point links necessary to structure the network into different segments to maximize the performance of the platform TCP / IP. Because of these characteristics are sought to implement a user-friendly system, network management and control, so the teams were set up that provide access to the network at Layer 3 of the OSI model.

This need was covered entirely by Netkrom teams, whose ability to work under this demand was added to the Switch's manageable use of layer 3 at each node, making constant vigilance to be able to view any camera from any node. Thus, by implementing Netkrom Multiband teams that make up a robust and secure, professional video system implemented for the client meets the requirements of reliability and availability 24 hours a day, with high quality and maximum rate images per second.

Furthermore, the solution allows to implement various video applications, including a review of incidents in conjunction with continuous recording work 24 hours a day, 365 days a year.

Video quality is also assured with the MPEG4 standard, which is based on the movement and efficient compression techniques can achieve resolutions CIF, 4CIF at 25/30 2CIF and frames per second, thanks to IP video encoding used in Netkrom the service provided.

The project was implemented by Netkrom SAC Technologies, a subsidiary in Peru Netkrom Technologies Inc. (manufacturer of radio link), which acted as an integrator and / or contractor directly through a highly qualified team of engineers and technicians.





San Borja Municipality Location: Latitude: 12° 06' 00'' Longitude: 76° 59' 29''

## **BENEFITS**

- Citizens have the security and confidence to move about the streets of the district without fear of being victims of criminal acts.
- Monitoring, recording and display local and remote
  simultaneously, unrestricted by geographic location of equipment, thanks to the IP platform.
- Ability to review previous recordings without interrupting real-time recording.
- Remote configuration of all devices in the network.
- Ability to set privileges and access levels for the overall system and individually for each device.
- The wireless network architecture implemented allows you to install safety devices in widely separated locations.

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