



## Wireless Sensors Use Case: HVAC Monitoring

### The Problem:



Monnit was contacted by the owner of a large property management company that owned an office building complex. They came across Monnit's wireless sensor solution while looking for a way to lower costs associated with managing and maintaining heating and cooling for their properties.

Recently, they had an issue with one of their buildings where an air conditioning unit had failed during one of the hottest weeks of the summer. The HVAC failure resulted in major costs for repair and complaints from tenants located in the office building. Their facility maintenance manager identified Monnit's system as an ideal solution for monitoring their buildings for preventive maintenance, allowing them to fix issues before they occur.

### The Solution:



Monnit provides a reliable remote monitoring solution that includes wireless temperature sensors as well as a variety of other useful sensors. The company deployed wireless temperature sensors throughout the building to monitor both room temperatures as well as duct output temperatures. They placed temperature sensors and accelerometers on air circulation fans to detect temperatures and vibration levels (if a fan is starting to go, the motor will get hot and vibrate more than normal).

The sensor data is sent wirelessly to a MonnitLink™ gateway in the maintenance office (located in one of their central buildings). Due to the steel and concrete construction of the buildings, they placed a couple of wireless range extenders to relay data from the building to the central gateway. The gateway sends the information to iMonnit™, the online sensor monitoring system. The temperature sensors and accelerometers were set to take readings every hour and notifications were setup to alert the staff if readings signify any potential issues, allowing them to respond immediately.

