



Metro, Rail and Airport Fire Detection

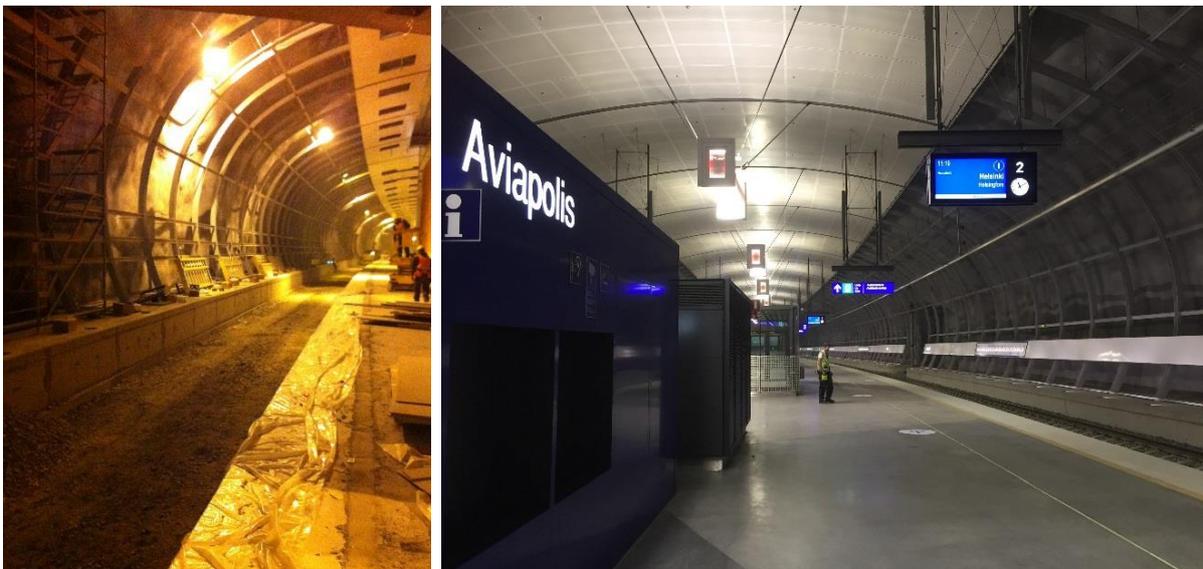
Helsinki, Finland

Within the 42-acre Vantaa airport region in Helsinki, four metro stations with connecting tunnels required a solution to monitor the infrastructure for fires. AP Sensing's Distributed Temperature Sensing (DTS) Linear Heat Detection (LHD) system was selected, including SmartVision asset visualization software and alarm management system.

The four underground stations nearest to the airport are Viinikkala, Aviapolis, Lentoasema, and Ruskeasanta. In addition to monitoring the stations themselves and the 8 km of tunnels connecting them, each station has a separate service tunnel that is also monitored. Together this stretch is known as the Kehärata link, and it connects these stations to the main Helsinki City metro line.

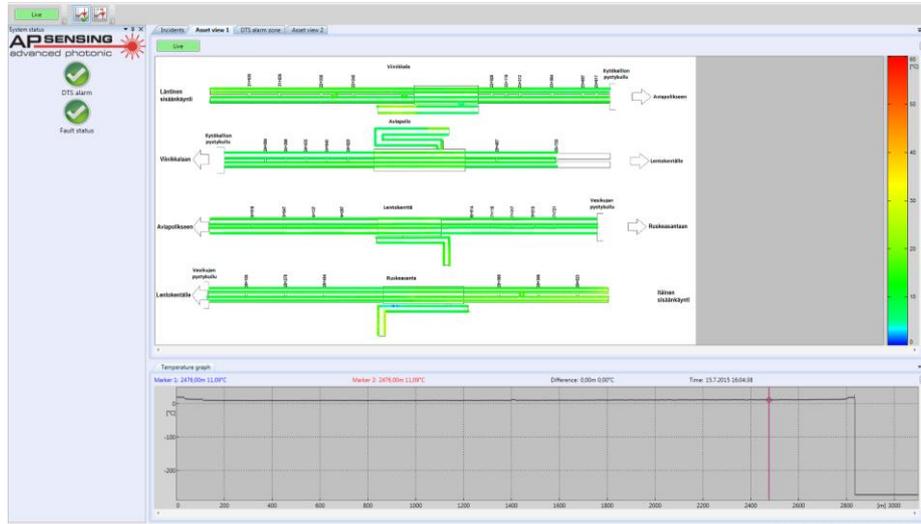
Altogether eight AP Sensing Linear Heat series DTS devices were installed, two for each station. Two-channel devices were selected to enable a fully redundant and secure configuration that would continue to function even in the unlikely event of a fiber break.

A total of 26 km of AP Sensing's "safety" sensor cable was installed along the ceilings of the tunnels and inside the stations.

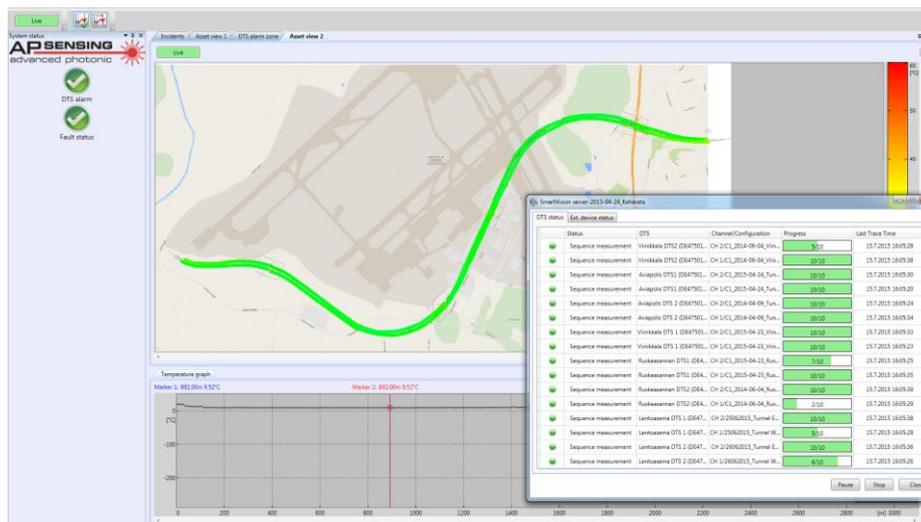


Aviapolis metro station (before and after) is now monitored by AP Sensing

AP Sensing's SmartVision asset visualization and alarm management system gives the operators a complete schematic overview on one easy-to-read screen, with color-coded temperature levels:



SmartVision software suite enables operators to select their view



External relays are used (up to 40 available on each DTS device) to ensure that all relevant data is passed to the fire panel and the SCADA system. All important standard protocols are available for communication over Ethernet (TCP/IP).

AP Sensing offers the industry's most comprehensive set of certifications and product tests, professional support and services, and expert regional partners; the Helsinki operators have attained the highest possible level of environmental and passenger safety for this valuable infrastructure.