

Preventing COVID-19 in schools with Aranet4 PRO

Air quality monitoring





Having fresh air indoors has always been a challenge but now with COVID-19 this task has become more critical than ever. Thanks to Prof. <u>Jose-Luis Jimenez</u> and other prominent scientists we now know that COVID-19 is an airborne virus and it can remain in the air for several hours unless we ensure proper ventilation.

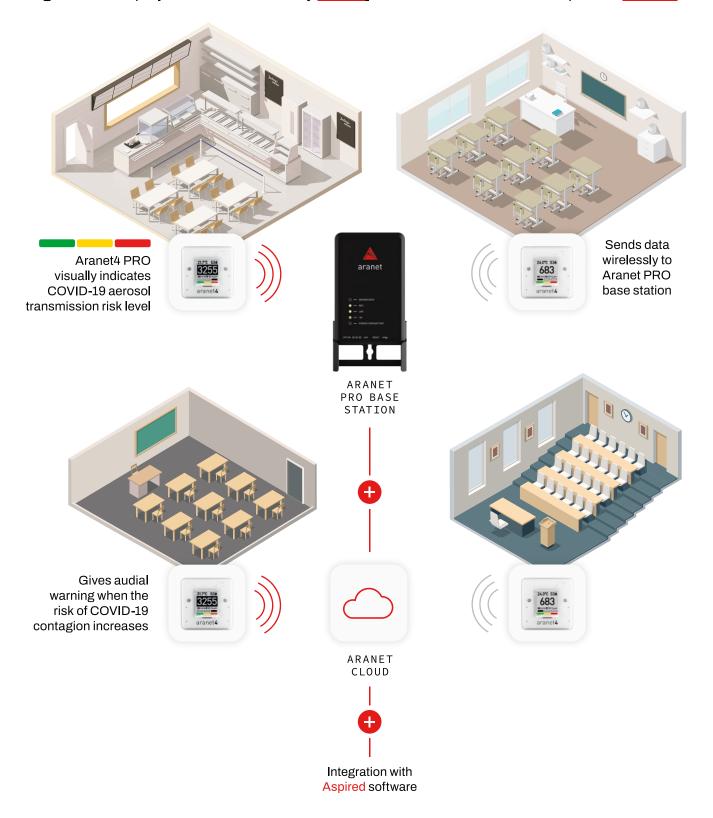
Schools, kindergartens and universities are especially difficult to tackle as you have a closed room with multiple people talking thus releasing plenty of aerosols right into the air. If any of the students or the teacher has COVID-19, these aerosols become a highly probable vector transmitting the virus.



Aranet4 PRO is a high quality CO₂ meter that alerts users when they need to improve ventilation

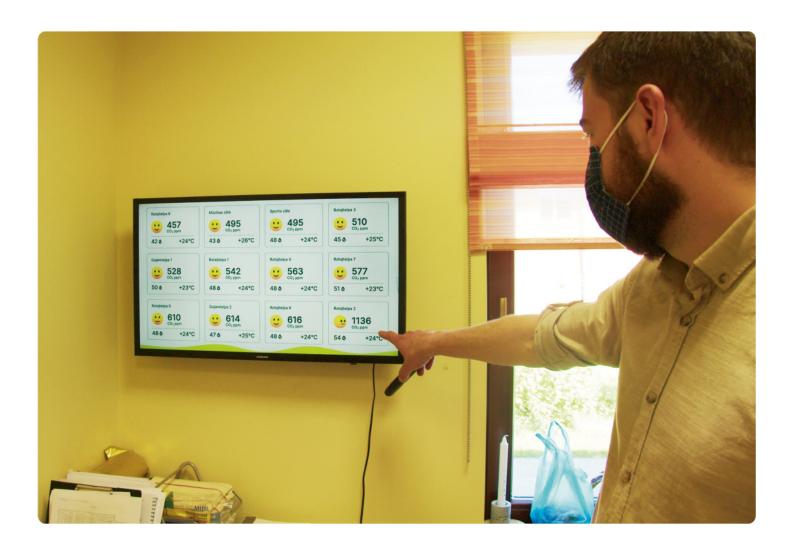
The single most effective means to decrease this risk is proper ventilation. How to do that? While your average school might not have enough funds to invest in a high-quality ventilation system, procuring cost effective CO₂ meters indicating when to open a window could prove to be a life saver!

A good example is Ventspils, a city on the western coast of Latvia. Its city council wanted to protect their children's health and decided to install a networked CO₂ meter solution in 19 of its schools and kindergartens. The project was carried out by Aranet in collaboration with its local partner Aspired.



Each of 19 schools and kindergartens had an Aranet4 PRO base station that collected data from all the Aranet4 PRO sensors placed in the classrooms. This data was then sent to Aranet Cloud allowing a centralized view of all kindergartens and schools via integration with Aspired software. Altogether we installed 475 Aranet4 PRO sensors and 20 Aranet PRO base stations.

Aspired not only installed the equipment, but also integrated the Aranet Cloud data stream into their own system. They built a centralized view of all the schools and their maps as well as put up screens with animations in the classrooms alerting teachers when they need to open a window. In addition, they coached the school and kindergarten staff by sharing materials on the importance of indoor air quality and how to use the CO₂ meters to ensure timely ventilation.



"The installation process was easy and straight forward. You don't need to be an IT expert to install Aranet4 devices," – says Davids Egle, CEO of Aspired. "API allowed us to access data from Aranet Cloud and ensured easy integration with our software."

The impact of our project was immediate. After seeing Aranet4 PRO device indicator turning red (i.e. CO₂ concentration exceeded 1400ppm), the staff were able to quickly react and open the windows thus bringing the CO₂ levels back to normal and ensuring a healthy environment for the children. Shockingly, on one of the days a kindergartens' sleeping area recorded a staggering 4000ppm which is something that no one would ever even think about unless they had measured it with a CO₂ meter!

Reflecting upon the project, Diana, one of the pre-school teachers, remarked that "when air quality decreases indoors, we can clearly see that children become sleepier and more apathetic. I think that air quality control devices give the opportunity for children to live in a better and cleaner environment, and we have to do all what is in our capabilities to provide that".

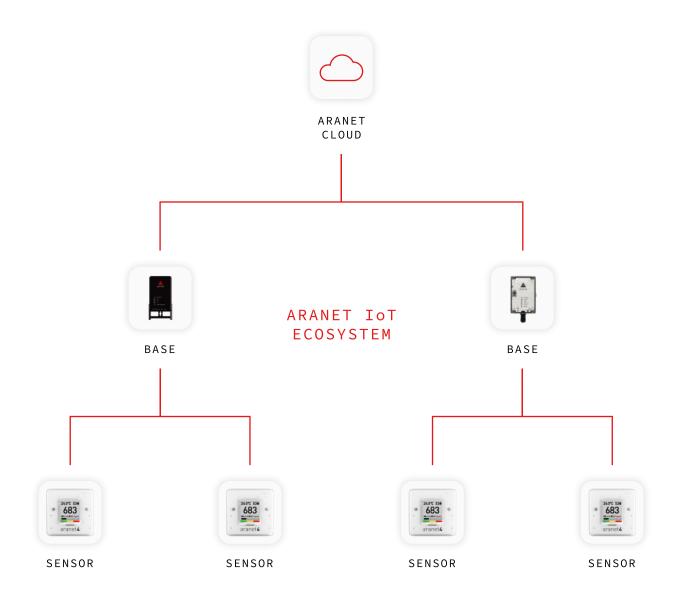


Aranet4 devices been on the front line fighting airborne COVID-19 in many schools around the world by alerting teachers and keeping classrooms safe. It is trusted by prominent institutions such as Harvard, Caltech, Stanford and smaller local communities just like Ventspils. Whatever your size or needs, we can offer a solution that's right for you.

If you want to learn more about how to protect your kindergartens, schools and universities from airborne COVID-19, please visit Aranet4 PRO for Educational Facilities or drop us a line on info@aranet.com and we will be happy to help!

Smarter than others





Sensors

A variety of wireless sensors that monitor conditions indoors

Base stations

One or multiple base stations that gather and store data from sensors

Cloud

A cloud service to access, view and analyze all your data in one place