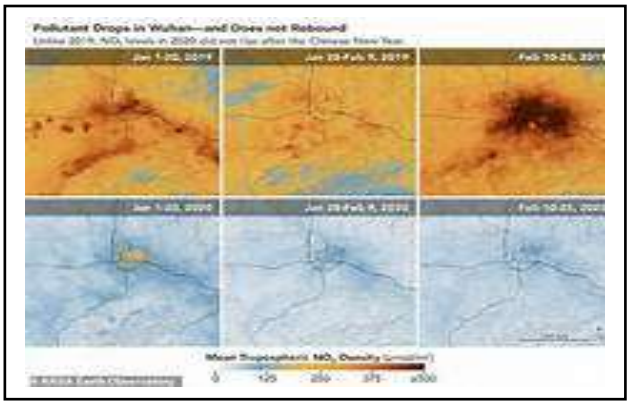
The Covid-19 litmus test

Is it true that 'Every cloud has a silver lining'? Remembering back to being bombarded daily with negative statistics for Covid-19 – infections and deaths up, stock markets down – was there any positive take-away from the pandemic?

Well yes, there was one very notable plus amongst all the minuses. Some remarkable data came out of Wuhan, in China (the birthplace of Covid) which showed a very significant decrease in air pollution when comparing 2020 to 2019. The American Space Agency (NASA) and The European Space Agency (ESA) produced maps that provided a graphic display of dangerous airborne gas pollutants (carbon and nitrogen oxides) which were significantly reduced after the 2020 Covid lockdown. This air quality comparison related to less road vehicles: cars, buses, and trucks that burnt petrol or diesel fuels.



The stats came about as the result of an unanticipated (and hitherto impossible) large scale practical experiment to confirm prior scientific knowledge. In addition to a reduction in carbon dioxide, there was also a remarkable drop in levels of nitrogen oxides: gases which have damaging effects on air quality, the ecology we depend on, and our personal health. These emissions can cause smog and acid rain, which destroys the natural balance of flora and fauna and have a toxic impact on human respiratory systems.

These NASA/ESA maps act as a huge, world-wide wake-up call for governmental authorities and industry, to get more serious about correcting and reducing exhaust fumes from vehicles. It suggests an urgency for better monitoring to support more stringent controls on emissions. This is an opportunity provided almost by chance, that offers one means amongst many, of understanding and tackling the climate crisis.

Anywhere on the globe which has a dense population, and thus a heavy demand for transport, faces the same sort of exhaust emissions issue as we saw in Wuhan. Currently, some deal with it better than others, usually related to their stage of industrial development: recently emerging industrial powers (such as China and India) generally have less control measures in place than say the *Industrial Age* countries of Europe or North America, while urban 'hot-spots', such as Nairobi in Africa, or Rio in Brazil, can be much more limited in response to pollution problems.

If the Covid-related maps can lead to a wider and more accurate assessment of both carbon and nitrogen pollutant levels around the world, then Covid-19 has in effect provided us with a very practical **litmus test** of air pollution: an extremely useful tool to assist in the massive task of tackling the climate crisis, with innumerable side benefits related to environmental sustainability and personal well-being.

With such information to support their case, regions affected can remedy the situation by injecting new methods into the mix, such as electric vehicles, better public transport systems and free mass-transit networks.

This is not rocket science, or beyond our reach. Everyone can be involved by helping to push governing bodies and businesses to upgrade transport systems, so we end up with less toxic gases around us. And of course, we can change too, by walking to the shops, taking a train instead of the car to work; or changing our gas-guzzling V8 motor for something small and cute … or electric!

Duncan Gregory

www.whittlingourniche.com