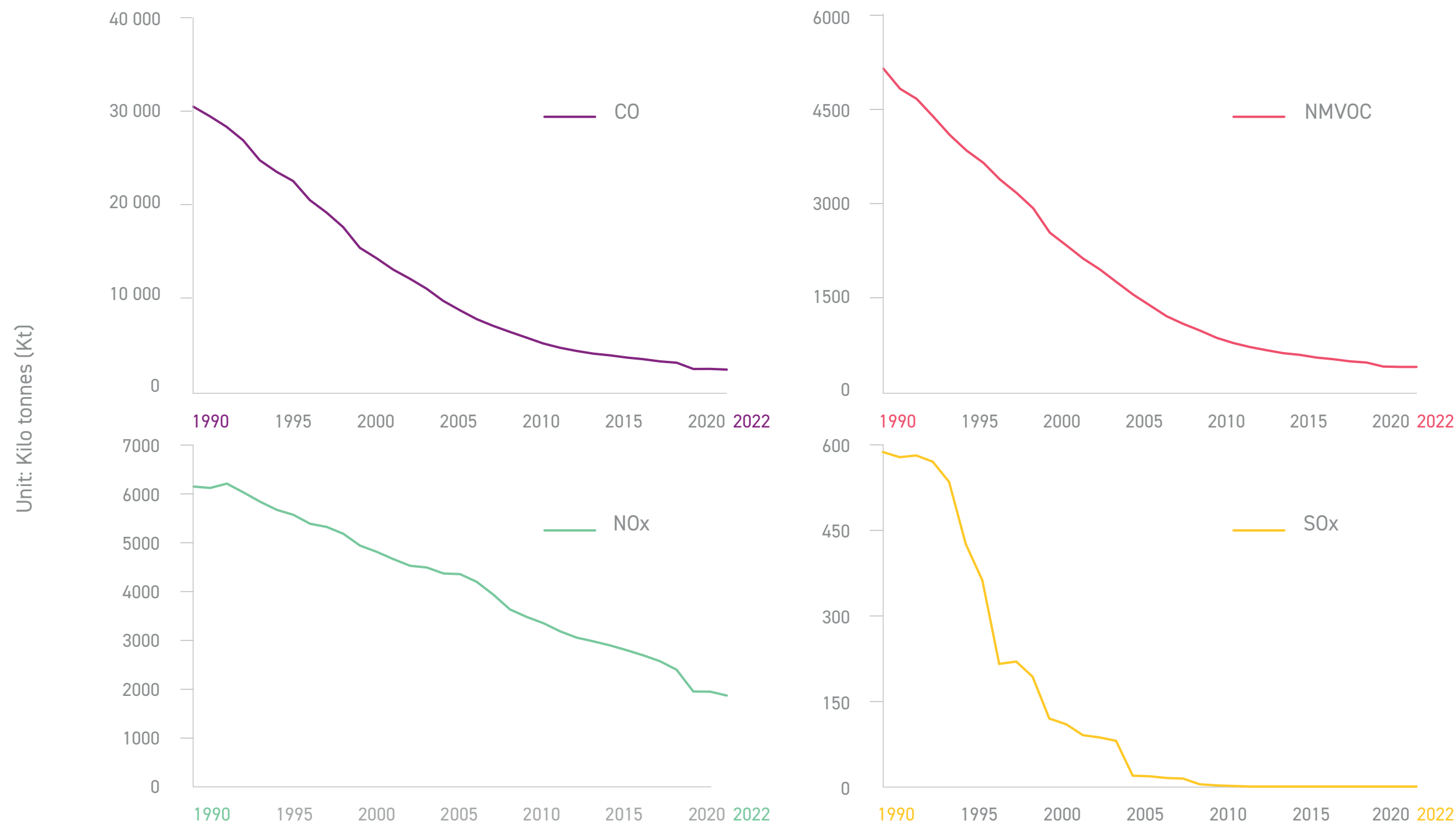


FIGURE
38.b

SINCE 1990, FUELS ARE PROGRESSIVELY BECOMING CLEANER
RESULTING IN EXHAUST EMISSIONS REDUCTION BY OVER 80%

Source: European Environmental Agency



Since 1990 the refining industry has contributed to cleaner exhausts by today containing 99% lower SOx, over 90% lower NMVOC & CO, and 62% lower NOx emissions.

These significant improvements are the result of the partnerships with the automotive industry aiming at improving the fuel-engine efficiency and leading to multiple environmental benefits. The travel restrictions imposed due to the Covid pandemic caused a significant reduction in emission values. However, despite travel restrictions being lifted and vehicles returning to the road, emissions have continued to decrease compared with pre-pandemic values. CO emissions have decreased by 22%, NMOC by 14%, and NOx by 22% between 2019 and 2022. SOx emissions have plateaued since 2012.