

Supplementary material

Formation of polyaromatic hydrocarbon (PAH)-quinones during the gas phase reactions of PAHs with the OH radical in the atmosphere

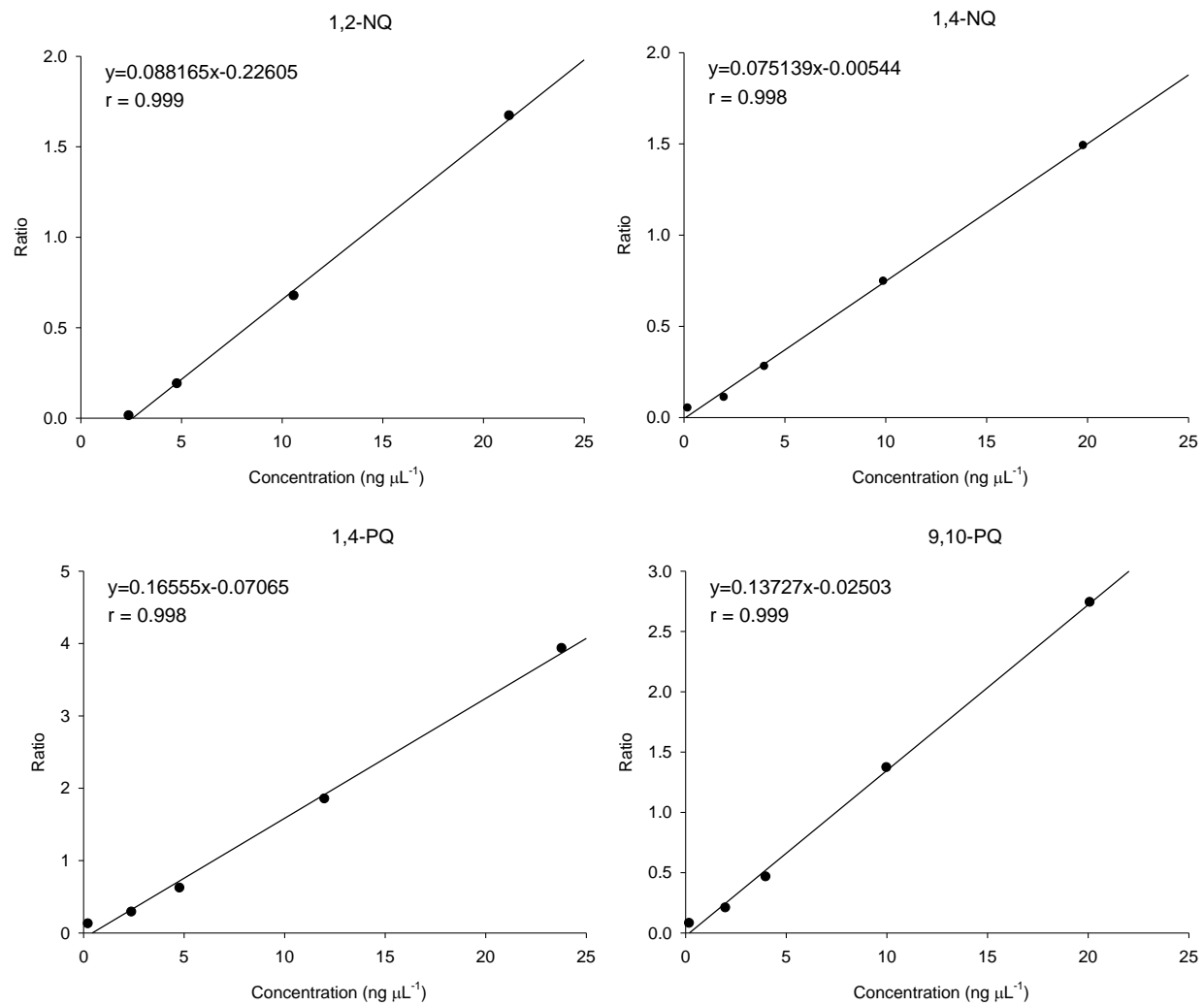
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(a)

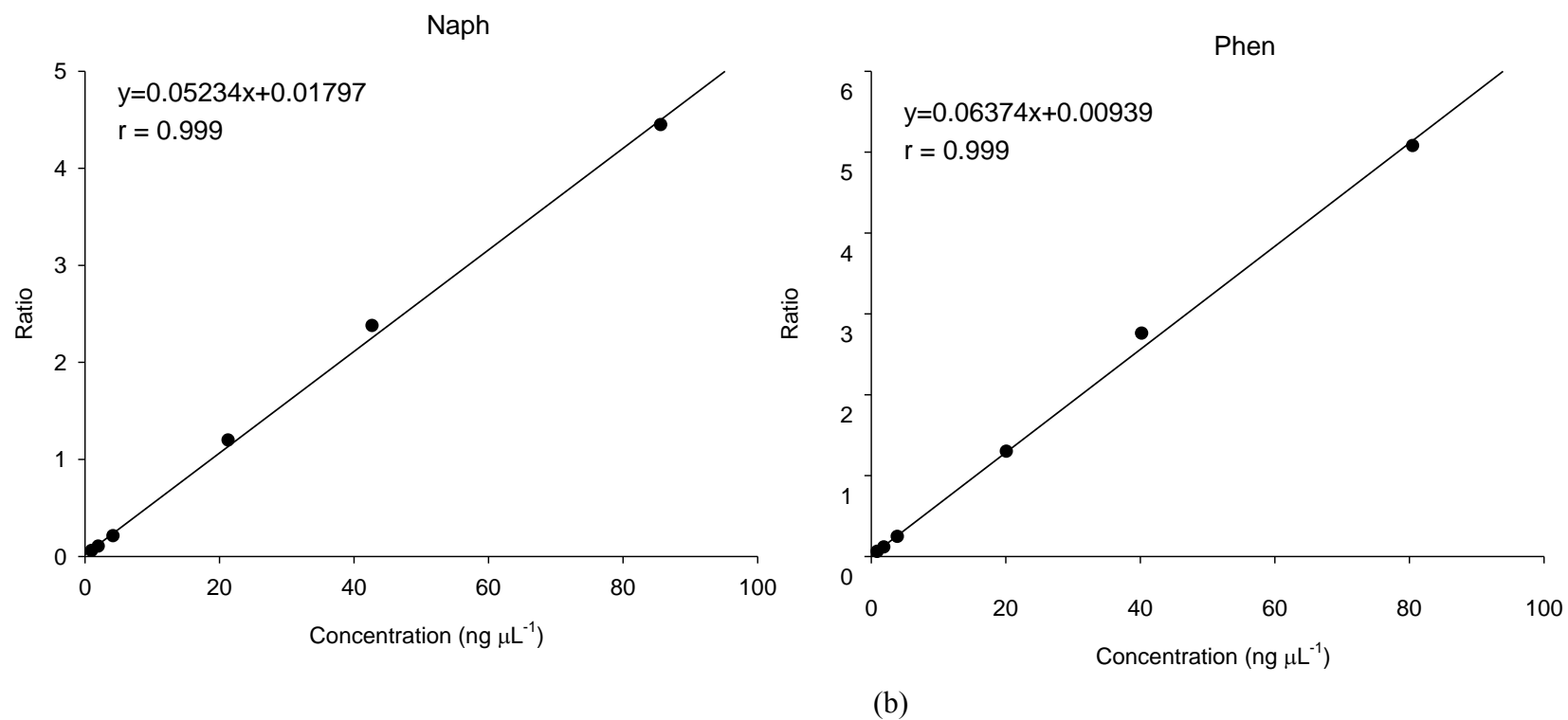
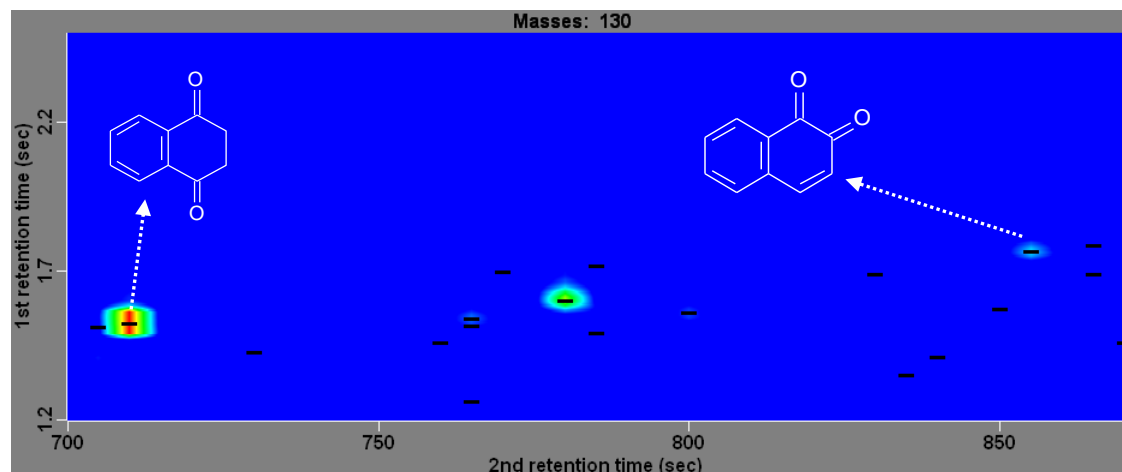
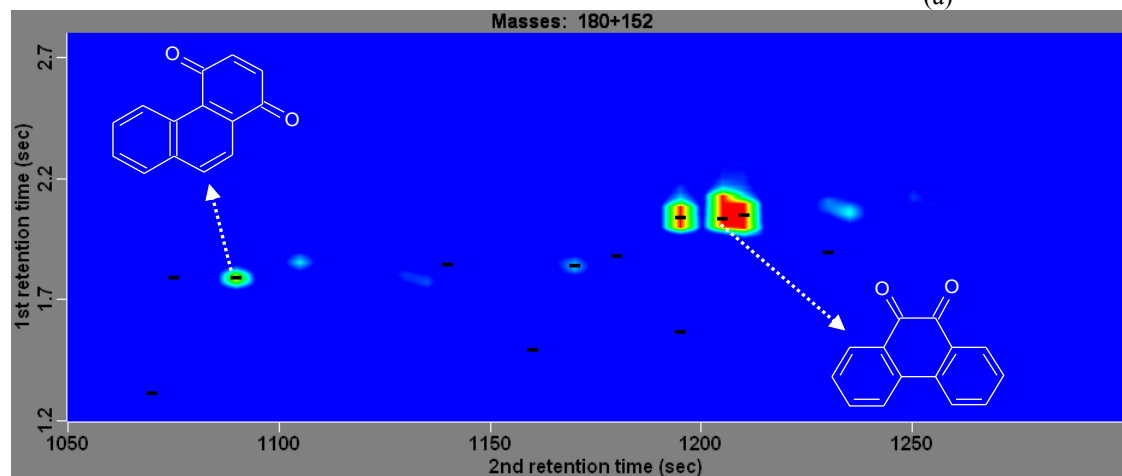


Fig. S1. Calibration curves of (a) four quinones and (b) the two reactants from which they were derived.



(a)



(b)

Fig. S2. Multidimensional gas chromatography–time-of-flight mass spectrometry (GCxGC-TOFMS) ion chromatograms of (a) m/z 130 for 1,2-naphthoquinone (NQ) and 1,4-NQ, (b) m/z 152 + 180 of 1,4-phenanthrenequinone (PQ) and 9,10-PQ from the filter sample after 30-min irradiation. x -axis is time (s) in the vapour pressure dimension and the y -axis is time(s) in the polar dimension. Colour represents peak intensity according to the scale to the right of the plot.