Supporting Information:

- 2 Contribution of HONO to the atmospheric oxidation capacity at an industrial zone
- in the Yangtze River Delta region of China
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20 Reaction scheme of conversion of HONO into Azo dye before being detected:

$$SO_{2} - NH_{2}$$

$$+ NO_{2}^{-} + 2H^{+}$$

$$N \equiv N^{+}$$

$$(SA)$$

$$(Diazonium)$$

$$SO_{2} - NH_{2}$$

$$NHCH_{2}CH_{2}NH_{2}$$

$$NHCH_{2}CH_{2}NH_{2}$$

$$SO_2 - NH_2$$
 $NHCH_2CH_2NH_2$
 $NHCH_2CH_2NH_2$
 $NHCH_2CH_2NH_2$
 $N=N$
 $N=N$