

This study conducted observational and modeling analysis of baseline ozone in oceanic air at Sheshan Island (SSI), which is located to the east of Shanghai city. The authors reported a six-year measurement of ozone concentration at SSI and its ozone level is much higher than the value of downtown site in Shanghai. They further highlight the importance of understanding the interaction between urban plume and oceanic inflows in ozone pollution. In particular, their modeling results show that ozone in the oceanic inflows can enhance urban ozone by 20-30%.

Overall, this manuscript is well structured and fits in the scope of this journal. Recent studies have increasingly focused on urban ozone pollution in China, but study on background ozone is still very limited. As such, this study could enrich our understanding of ozone pollution in China, particularly for coastal cities. Although this manuscript is publishable, the current version should be improved in terms of presentation and clarification. I would like the authors to address my following comments.

-This study shows observed ozone levels in a remote site and urban site. In fact, urban ozone in Shanghai are available from Chinese measurement network. It will be great if the authors could have more ozone measurements in this study. For example, Figure 8 is a good place to show more urban ozone data.

- This study gives daily mean of ozone in both observational and modeling calculation. I am wondering if the authors can show more results for MDA8 ozone. Since MDA8 ozone is the standard air quality metric for ozone.

-Line 27: “production” might be more appropriate than “oxidation”.

-Line 89: please spell out months.

-Lines 252-253: will this ratio be helpful in this study?

-Line 293: “few” looks not reasonable, since you still saw an increase trend of 1.12ppb yr⁻¹.

-Lines 346-348: is there any changes in ozone production sensitivity in response to NO_x control?

-Line 397: remove space before “%”.

-Line 492: α should be <0.05 according to Table 3.