

Interactive comment on “Updated atmospheric mercury emissions from iron and steel production in China during 2000–2015” by Qingru Wu et al.

Anonymous Referee #1

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Authors estimated mercury emission from China’s iron and steel production (ISP) during 2000-2015 by using a technology-based emission factor method. They presented trends of Hg input to and emission from ISP and further differentiate them into detailed sectors, and noted that Hg emissions from roasting plant and coke oven cannot be overlooked.

The paper is technically good. My primary concern is that the paper is lack of enough innovation. Actually, authors recently presented anthropogenic mercury emission from all sectors including ISP (Wu et al., 2016, ES&T), and in this paper, authors basically follow the ideas and methods to further update mercury emission of ISP in the past 15 yrs. Hg emission of ISP peaked at 35.6 t in 2013 and is not a major contributor to the total Hg emission of 530t in 2014 as estimated in authors’ previous work.

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Compared with previous studies, this updated ISP inventory included consideration of roasting plant and coke oven, counting for 22%-34% of ISP's emissions. I think authors should include some words in introduction to highlight this consideration and stress that these two processes are potentially important in shaping the trends of ISP Hg emissions.

In Wu et al 2016 ES&T paper, authors noted that the Hg emissions from ISP are quite possible to increase, however, in this updated ISP inventory, authors argued that Hg emission from ISP are expected to decrease. I think authors should explain this point clearly and included some discussion in section 3.4.

It seems that Hg release rates used in this study (Table S1) are simply averaged by all available data, why?

Other specific points:

Line70, many studies.

L102, "filed experiment" should be "field experiment", some other places should be also revised.

L206, Table S3

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