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REVIEWER REPORT(S):

Referee: 1

Comments to the Author

In this paper, the authors report the synthesis of the arene-stabilized  $\eta^5$ -Cp\*-bound antimony dicationic compound  $[(\eta^5\text{-Cp}^*)\text{Sb}(\text{tol})][\text{B}(\text{C}_6\text{F}_5)_4]_2$  (1) by double chloride abstraction of  $\text{Cp}^*\text{SbCl}_2$ , which exhibits strong Lewis acidity and reactivity with different Lewis bases to give either a Sb(I) monocation or a Sb(III) trication. The antimony-based compounds are well characterized by techniques such as NMR spectra, X-ray diffraction and DFT calculation. Overall, this paper is very impressive and is quite suitable for ChemComm after minor revision.

1. Consider adding Angew. Chem. Int. Ed., 2018, 57, 5408 as reference. It's an update of ref. 4.
2. Please note that there are some errors in the Page 3, right column, line 14 and 19.

Referee: 2

Comments to the Author

This manuscript describes the synthesis and characterization of four interesting compounds, and spectroscopic studies of interesting reactions of the key compound.

Compound 1 is new, but is derivative of previous work from this group in ref 9a and 9b.

Compound 3 has been previously reported in ref 10. Why is the crystal structure reported again?

Compound 4 is new. The formation of 4 looks like a reduction of  $\text{Sb}^{3+}$  to  $\text{Sb}^+$ , and this should be discussed.

Compound 6 has been previously reported in ref 5a and 5c. Why is the crystal structure reported again?

Elemental analysis data is not reported.

There are a number of typographical refinements required.

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