Comment on essd-2021-80
Jacob Yde (Referee)

Referee comment on "Programme for Monitoring of the Greenland Ice Sheet (PROMICE) automatic weather station data" by Robert S. Fausto et al., Earth Syst. Sci. Data Discuss., https://doi.org/10.5194/essd-2021-80-RC2, 2021

The authors present a well-structured technical description of the PROMICE AWS variables and instrumentation. The presentations of the data processing chain, the measured variables and each instrument are all robust, and it is easy for readers to find relevant information in the text and tables. I did not notice any technical or scientific issues that need to be addressed. However, the text could be improved as shown by my list of linguistic comments below.

1,3: Change “is” to “are”
1,4: Change “to” to “of”
1,13: Change “in” to “by”
1,14-15: Too many brackets. This is a general issue throughout the manuscript
1,17-18: This statement should be supported by one or more references
2,17-18: Be consistent with respect to the usage of capitalized letters in “Greenland Ice Sheet” or “Greenland ice sheet”. Please check the entire manuscript for consistency
2,25: Insert space before “The”
3,16-17: This sentence regarding maintenance visits seems to be misplaced as this subchapter concerns the design of the tripod. Consider moving this sentence to the last paragraph in section 2.2
4,6: Change to “encodes”
4,17: Typo in “production”
5,5: It would be more informative for the readers if the name of the barometer manufacturer is mentioned in the body text
7,13: Insert “Figure” before “2”
7,17: Insert “of” in “... in-/outflow of antifreeze ...”
7,18: Insert “Figure” before “2”
8,21: Insert a hyphen in “Post-processing”
9,13: Typo in “respectively”
9,18: Be consistent throughout the manuscript in whether “Van” should start with a lowercase or uppercase letter
9,18: Change “;” to “and”
9,27: Insert a comma after “m” and change “are” to “is”
9,28-29: Rephrase this sentence to make it understandable
10,12: Use past tense here – change to “emphasized”
10,13: Who are “they”? Rephrase this sentence
10,18-19: Change to “For a horizontal radiation sensor, the direct beam ...”
11,15: Change “are” to “is”
11,16: Insert “.” after “AWS”
11,19: Typo in “manufacturer” and change to “estimates”
11,22: Be consistent in the use of “Fig” or “Figure”
11,28: Insert “the” before “field”
12,13: Change to “Eighteen out of 26 stations ...”
12,27: Use lowercase first letter in “piteraq”
13,17: It would be good with more consistency in the comma usage. For instance, the authors use comma after “Also, ...” (13,14) and “Below, ...” (13,15), but no comma after “Here ...” (13,17)
15,13: Move “e.g.” to the bracket
15,18: Insert “of” before “26”

Table 1: Could you be more specific with respect to the MM or DD of the last visits?
Table 2: The caption text is wrong

Table A1: Reconsider the use of uppercase letters in column 1 - this comment is also relevant for other tables. I would also recommend left-aligned text in column 1. Use lowercase first letter in “barometric” in the caption
Table A2: Use lowercase first letter in “hygrometer” in the caption
36,4: Insert a comma after “shield”
41,2: Delete “:”
41,5: Use more formal language instead of “… that allow us to …”
41:9-11: Rewrite this text into full sentences.