Reviewer’s report

Title: Airport sentinel surveillance and entry quarantine for dengue infection following fever screening program in Taiwan

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Reviewer: Lasse Vinner

Reviewer’s report:

Summary
The manuscript contains a clearly stated objective. The introduction supports the stated objective. However, as in the first manuscript the result section suffers from inconsistent data and poor figures (see below). The discussion appears much better than the results section; adequate and relatively easy to follow.

Major Compulsory Revisions (which the author must respond to before a decision on publication can be reached)

Materials and methods:
The case definition of a confirmed Dengue case requires detection of RNA, antigen or antibody titre increase in sequential samples. In the materials and method section it remains unclear if cases were in fact confirmed as the authors write that antibodies “and/or” RTPCR was used to confirm infections.

Results:
The first sentence of the result section does not make sense unless there is a reference to table 2. Secondly it contains inconsistent numbers:

“By implementing airport fever screening, fever prevalence detected by NCIT ranged between 0.46 and 2.58% (TABLE 2) and between 31.5 and 50.9% (3706-5656/11,121-12,553) of the incoming febrile travelers, who underwent blood sampling for laboratory confirmation (i.e.: only categories of febrile passengers returning from southeastern or southern Asia endemic countries were detected for dengue infection); of these, ranged from 1.3 to 3.3% (72-129/3706-5654) were confirmed as dengue infection, 2007-2010 (Table 1, Fig 1A).”

As the first manuscript was compromised by inconsistent or even missing numbers in several figures/tables it is problematic that the numbers in the text are still apparently inconsistent: In one parenthesis the range is 3706-5656 in the next it is given as 3706-5654! Maybe a simple mistake, but re-checking the calculated prevalence I get a different result in 2 cases compared to the authors 3706/12553 =29.5% NOT 31.5% and 129/3706=3.5% not 3.3%.

Why are the fever prevalence given with 2 decimals whereas others are with only 1 decimal?
In my opinion Figure 1 lacks the quality required to communicate the data. (E.g. (1) Colors; light blue is picked for the very two lines that are closest together. (2) No logic in what axis is to be used, (3) title on axis almost covers the scale (4) Figure legend fails entirely in describing what is shown on the figure and (5) even a spelling mistake (trvelers)).

Ironically the figure appears twice, although this may be related to the uploading system and may have nothing to do with the authors.

It appears confusing that panels 2A, 2B and 2C are not presented as a single figure instead of one with separate panels.

Figure 2A: The figure is not communicating the data. To some extend the reader has to guess (e.g. (1) Numbers on X-axis is not visible. (2) the blue dotted line is probably the total (?) number of imported cases (3) how does the figure show “the positive relationship RX(t-2):Y = 0.56 or RX(t-3):Y = 0.46 “ as indicated in the legend.)

Discussion

It is not clear what relevance the calculate linear relationship in Figure 2B has.

Minor Essential Revisions (such as missing labels on figures, or the wrong use of a term, which the author can be trusted to correct)

In figures: Either provide the n, R2 and P values in the legend OR on the figure. Not both places. In the text carefully consider if all values must be mentioned.

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Acceptable

**Statistical review:** Yes, but I do not feel adequately qualified to assess the statistics.

**Declaration of competing interests:**

I declare that I have no competing interests.