

Interactive comment on “Negative pressures in full-scale distribution system: field investigation, modelling, estimation of intrusion volumes and risk for public health” by M. C. Besner et al.

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This paper summarises the results to date of a 5 year investigation into the occurrence of negative pressures in a real distribution system, and the potential health risks of these events. This is an exceedingly difficult topic to investigate, and I think the authors have made impressive progress through detailed and rigorous scientific investigations.

While I believe the paper is ready for publication in its present form, I would like to make the following optional comments:

1. Page 135, Line 12: Leakage rates in excess of 10 % are very common in many countries, and thus this statement is somewhat superfluous. A stronger statement on
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the high rates of leakage in most distribution systems might be more appropriate.

2. Page 135, Line 27: Concrete is not a suitable material for pipes unless reinforced. Thus I assume the authors are referring to asbestos cement, fibre reinforced or pre-stressed concrete pipes. Be more specific.
3. Page 136, Line 22. Transient events have a very high frequency, and a measuring frequency of 1 to 4 Hz is likely to have missed many of the minimum pressure spikes occurring in the system. I would like the authors to address this point and the likely impact this factor might have had on the results of the study.
4. Page 142: Conclusions: I don't think the Conclusion section does justice to the many significant findings of the study. It would benefit the paper if it is expanded.

Interactive comment on Drink. Water Eng. Sci. Discuss., 3, 133, 2010.