

Interactive comment on “A general treatment of snow microstructure exemplified by an improved relation for the thermal conductivity” by H. Löwe et al.

H. Löwe et al.

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Dear Reviewer,

thanks for your comments and suggestions. Point-by-point replies are given below.

Minor comment 1

The range of correlation lengths, their ratio and the size of the samples will be given. We cannot rule out that our samples sizes give rise to finite size effects. But we expect both, simulations and model to be influenced by them likewise. See also our answer to
C3056

comment #6 in the other review.

Minor comment 2

There are two sides of the coin. First, the bound is good enough to deduce an expression for the conductivity which has lower scatter than a parametrization solely based on the volume fraction. Second, the bound must be linearly corrected and hence it is not good enough to go without any empirical modification.

Minor comment 3

Will be done.

Editorial comments

All will be corrected.

Interactive comment on The Cryosphere Discuss., 6, 4673, 2012.