

Interactive comment on “Development and testing of a large, transportable rainfall simulator for plot-scale runoff and parameter estimation” by T. G. Wilson et al.

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Response to comments from Anonymous Referee #3

Tiffany G. Wilson

18 August 2014

Thank you very much for your comments. Here are our responses to your individual concerns.

“However the low cost of the installation in terms of materials and time has to be better proven.”

The overall cost of the rainfall simulator was less than \$1000. This cost, in addition to further details on the components of the rainfall simulator, have been included in a re-write of Section 2.1. Referee #2 also brought up this concern; please see the response to those comments for the new content of this section.

“The role of the vegetation coverage is not clearly explained...this can affect the results”

The authors agree that vegetation has an impact on the infiltration results. In fact, the choice of a vegetated plot was intentional, as future work with

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this rainfall simulator is to assess the effect of vegetation on the infiltration parameter estimates. This effect was not investigated in the present work since the goal was simply to establish the rainfall simulator and the parameter estimation method. This acknowledgement of will be added to section 4.1 describing the field site.

“Some information about the root zone of these plants should also [be] provided”

The root zone of the grasses is approximately 15 cm. This detail will be added to the section describing the TDR probes.

“Please justify the 30° angle of the CS616.”

The TDR probes were inserted at this angle to avoid the rocks present below the depth of 15 cm. Referee #1 brought up this concern; please see the response to that comment for the addition to Section 2.2.

Again, thank you very much for your comments. We hope you find that the responses are adequate and improve the manuscript.

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