Interactive comment on "All-in-one model for designing optimal water distribution pipe networks" *by* Dagnachew Aklog and Yoshihiko Hosoi

Anonymous Referee #2

Dear Authors,

Thank you for taking time to respond to my comments. I appreciate your effort in developing a simple tool for some end users who may not have extended knowledge of the complexity and pros and cons of different optimizers for WDS optimization. Due to the same reason, these end users need to be aware the potential pitfalls of using stochastic optimization methods without fully understanding how they work. This reviewer feels that it is the developers' (i.e. the authors') responsibility to develop a guideline on how to best use the software and warn the users the potential danger is optimization is not carried out probably. Otherwise, the users will get a easier to user tool, but will also arrive at erroneous solutions. My final recommendation is that the authors should 1)

highlight the complexity involved in using a GA, 2) develop a simple-to-follow procedure for end users to best utilize the tool; and 3) warn the users of the potential pitfall of using a GA without comprehensive sensitive analysis. Finally, if the authors could add a simple function in the tool to inform the convergence of the GA optimization process, that would be of great help to potential end users.