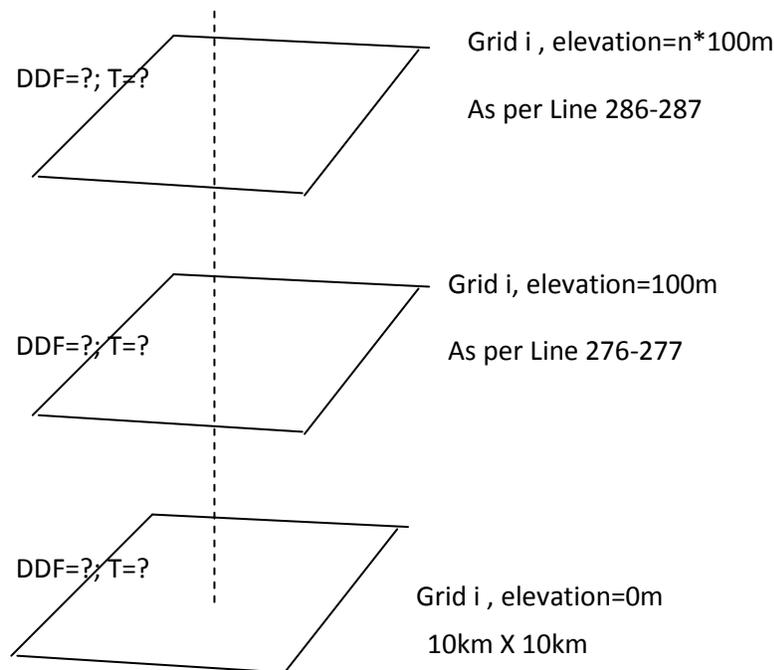


1) Line 164-166

As per the authors, there are around 280 precipitation gages. The spatial extent of the river basin (i.e., YZ) is around 250,000 km². The spatial resolution of the modeling task is 10km. Therefore, the reason for using a machine-learning algorithm to develop a precipitation grid is not understood. Wouldn't the popular interpolation algorithms that are packaged with GIS products (e.g., Esri's ArcGIS) improve the simulation results?

2) Is your DDF (see eq.2) a constant for a particular pixel/grid (10km in spatial extent)? Is your T a constant for a particular pixel/grid? This is what has been understood from your eq.2 and eq.3. If these values are constants for a particular pixel/grid, the value of your Rglac is meaningless. Without considering the temperature profile across your elevation bands, does the value of Rglac computed using eq.2 and eq.3 make sense? Without considering the vertical profile of DDF across your elevation bands, does the value of Rglac make sense? See the attached PDF file.



3) For a particular grid/pixel (10km in spatial extent) of your interest, would you be able to show the values of your Ms (see eq.3)? Is the value of your "n" constant for the study area (i.e., YZ)?

4) Refer to Part III

Acknowledgement and Disclaimer

The author is an alumnus of Texas A&M University, Texas, USA. The views expressed here are solely those of the author in his private capacity and do not in any way represent the views of Texas A&M University, Texas, USA.