**The highlighted parts are modified.**

**Appendix A: Statistical parameters for model evaluation:**

The mean bias (MB) was calculated as follows:

$MB=\frac{\sum\_{}^{}(M\_{i}-O\_{i})}{n}$ (A1)

The mean error (ME) was calculated as follows:

$ME=\frac{\sum\_{}^{}|M\_{i}-O\_{i}|}{n}$ (A2)

The normalised mean bias (NMB) was calculated as follows:

$NMB=\frac{\sum\_{}^{}(M\_{i}-O\_{i})}{\sum\_{}^{}O\_{i}}$ (A3)

The normalised mean error (NME) was calculated as follows:

$NME=\frac{\sum\_{}^{}|M\_{i}-O\_{i}|}{\sum\_{}^{}O\_{i}}$ (A4)

The root mean square error (RMSE) was calculated as follows:

$RMSE=\left[\frac{1}{n}\sum\_{i=1}^{n}\left(M\_{i}-O\_{i}\right)^{2}\right]^{\frac{1}{2}}$ (A5)

The correlation coefficient (R) was calculated as follows:

$R=\frac{\sum\_{i=1}^{n}(M\_{i}-\overbar{M})(O\_{i}-\overbar{O})}{\sqrt{\sum\_{i=1}^{n}(M\_{i}-\overbar{M})^{2}\sum\_{i=1}^{N}(O\_{i}-\overbar{O})^{2}}}$ (A6)

The index of agreement (IOA) was calculated as follows:

$IOA=1-\frac{\sum\_{i=1}^{n}(M\_{i}-O\_{i})^{2}}{\sum\_{i=1}^{n}(\left|M\_{i}-\overbar{O}\right|+|O\_{i}-\overbar{O}|)^{2}}$ (A7)

The normalised standard deviation (NSD) was calculated as follows:

$NSD=\frac{\sqrt{\frac{\sum\_{i=1}^{n}\left(M\_{i}-\overbar{M}\right)^{2}}{n}}}{\sqrt{\frac{\sum\_{i=1}^{n}\left(O\_{i}-\overbar{O}\right)^{2}}{n}}}$ (A8)

The normalised root mean square error (NRMSE) was calculated as follows:

$NRMSE=\sqrt{\frac{\overbar{[\left(M\_{i}-\overbar{M}\right)-\left(O\_{i}-\overbar{O}\right)]^{2}}}{σ\_{O\_{i}}}}$ (A9)

In the equations, $M\_{i}$ and $O\_{i}$ represent the simulated and observed value of a station respectively, $n$ represents the number of stations, and $\overbar{M}$ and $\overbar{O}$ represent the averages of the simulated and observed values respectively. $σ\_{O\_{i}}$ represent the standard deviation over the observed value.