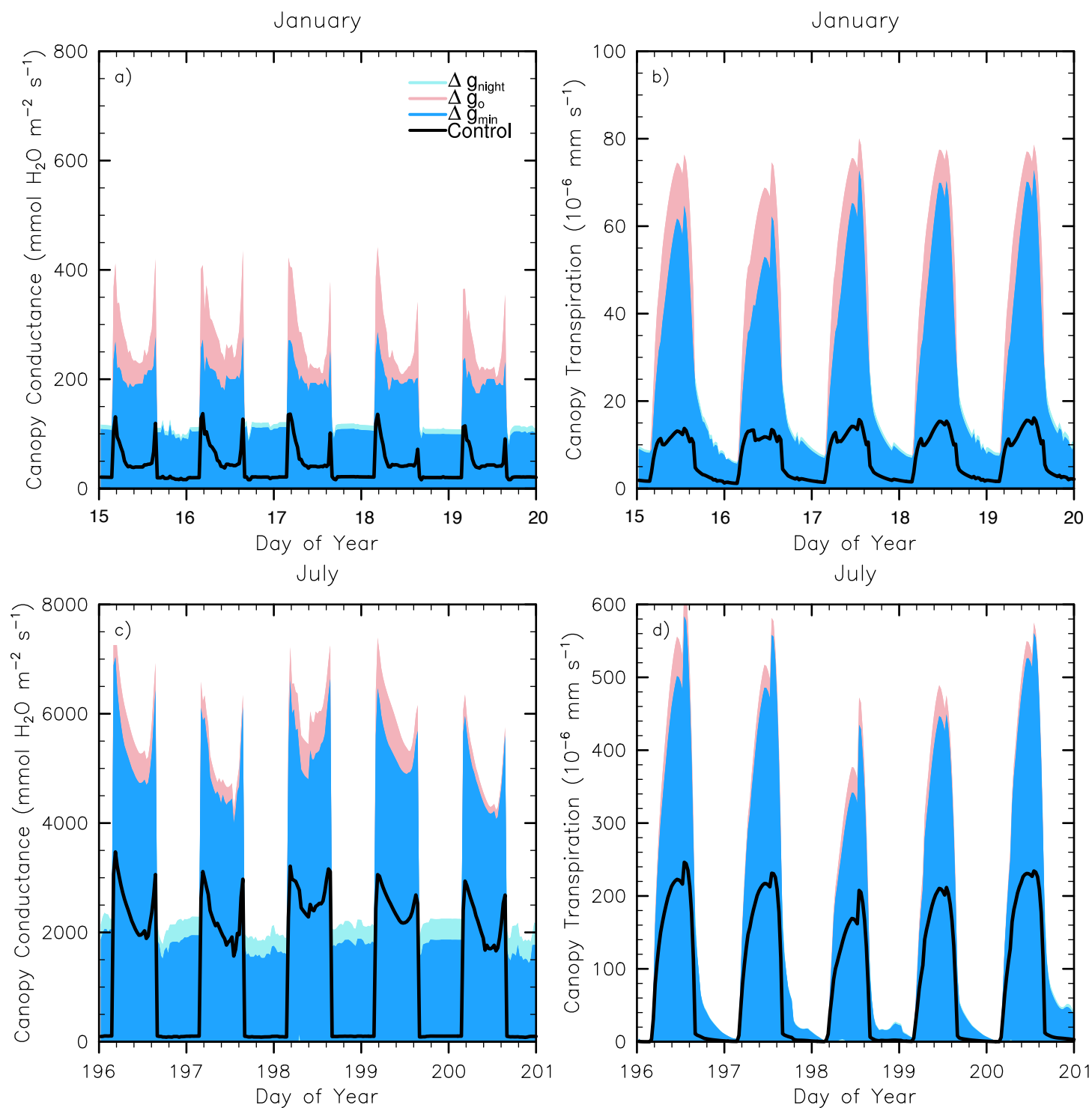


# Ethiopia



**SI Figure 2.** Diurnal timeseries of the possible range in canopy conductance (a,c) and transpiration (b,d) in Ethiopia over five days in mid-January (a-b) and mid-July (c-d) based on observational uncertainty. The shaded areas represent the total range generated by using observed mean  $g_{\text{s,n}}$  values  $\pm$  one standard deviation for each parameterization. The control simulation (black line) does not use any observed  $g_{\text{s,n}}$  values, so there is no observational uncertainty associated with this simulation. The observational uncertainty is quite large, masking the differences among parameterizations. While our analysis focuses on the methodological differences for implementing observed  $g_{\text{s,n}}$  data, it is important to note the magnitude of observational uncertainty, and to illustrate the need for constrained  $g_{\text{s,n}}$  observations, minimum daytime  $g_{\text{s}}$  observations, as well as a thorough evaluation of all parameters in the BWB model.