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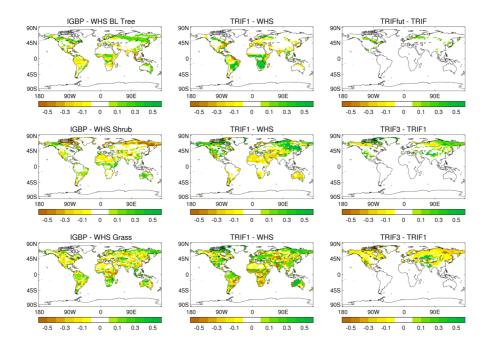
## The influence of vegetation on the ITCZ and South Asian Monsoon in HadCM3

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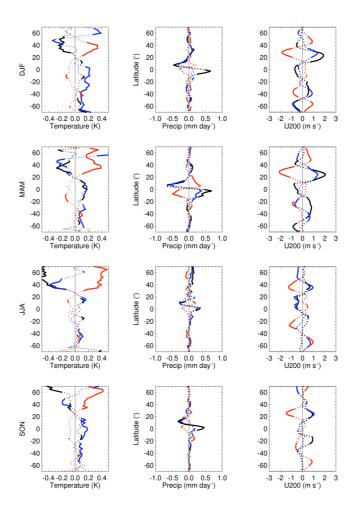
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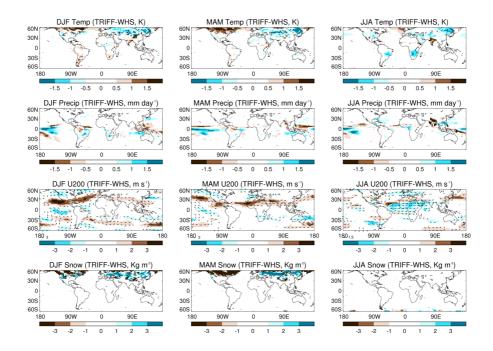
**Supplementary Material** 



**Fig. 1.** Difference in vegetation cover (as a fraction of each model grid cell) compared to WHS of (left) IGBP and (middle) TRIF and between (right) TRIFfut and TRIF. The upper row represents the difference in Broadleaf tree (BL), middle panel to shrub, and lower panel grass.



**Fig. 2.** Climate impact of imposed vegetation on (left) near surface air temperature, (middle) precipitation, and (right) 200 hPa zonal wind. The zonal mg an differences between (black) IGBP-WHS, (blue) TRIF-WHS, and (red) TRIFfut-TRIF are shown for (top to bottom) DJF, MAM, JJA, and SON. Unbroken segments represent regions where the difference is statistically significant at the 5 % level based on



**Fig. 3.** Regional differences between TRIF and WHS for annual means of (top to bottom) temperature, precipitation, 200 hPa zonal wind, and snow cover, for seasons (left) DJF, (middle) MAM, and (right) JJA. The wind vector anomalies are also included in the U200 plots.