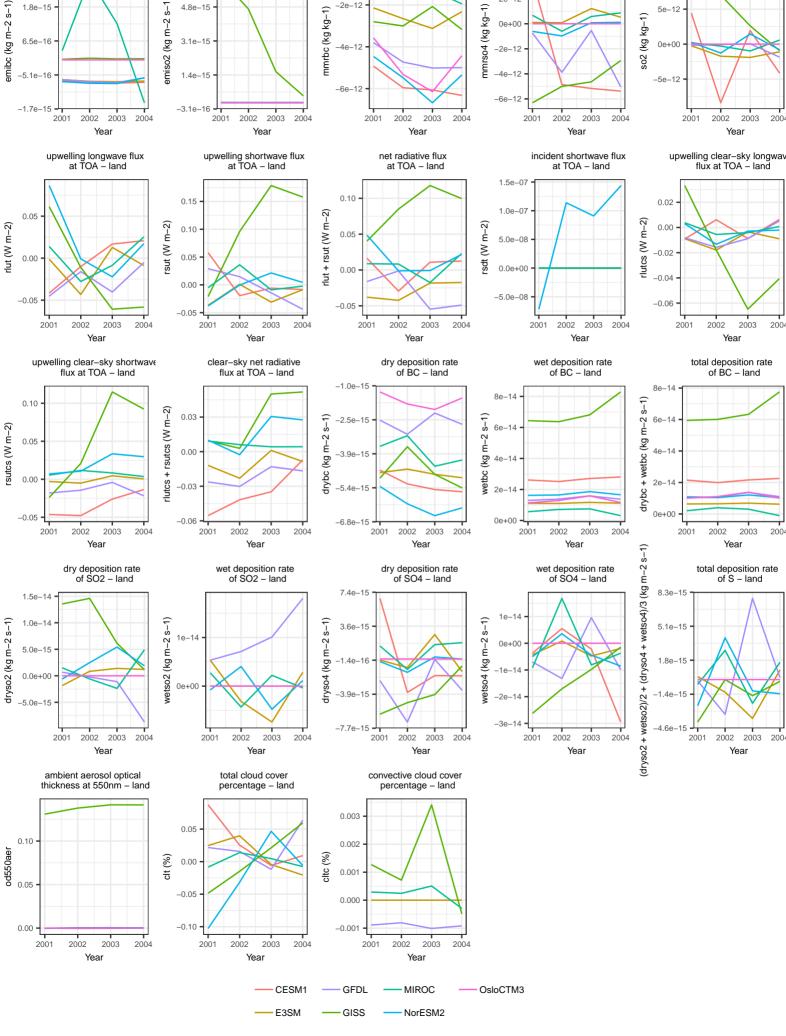
## bc-no-season: absolute difference surface flux of SO2 – land surface concentration surface concentration of SO4 – land surface concentration of SO2 – land emiso2 (kg m-2 s-1) mmrso4 (kg kg-1) mmrbc (kg kg-1) so2 (kg kg-1) 0e+00 0e+00 -2e-12 -5e-12 2001 2002 2003 2001 2002 2003 2001 2002 2003 2001 2002 2003 Year Year Year Year upwelling shortwave flux at TOA – land incident shortwave flux at TOA – land upwelling clear-sky longwave flux at TOA - land net radiative flux at TOA - land 0.02 rlut + rsut (W m-2) 1.0e-07 rlutcs (W m-2) rsdt (W m-2) 0.00 0.10 0.05 -0.02 0.05 0.0e+00 0.00 -0.04 0.00 -5.0e-08 -0.06 -0.05 -0.05 2001 2003 2001 2003 2001 2002 2003 2001 2002 2003 Year Year Year Year clear-sky net radiative dry deposition rate wet deposition rate total deposition rate flux at TOA - land of BC - land of BC - land of BC - land -1.0e-15 8e drybc + wetbc (kg m-2 s-1) 0.03 drybc (kg m-2 s-1) wetbc (kg m-2 0.00 -0.03 0e+00 -0.062003 2001 2003 2001 2002 2001 2003 2002 2003 Year Year Year Year (dryso2 + wetso2)/2 + (dryso4 + wetso4)/3 (kg m-2 s-1)wet deposition rate dry deposition rate wet deposition rate total deposition rate of SO2 - land of SO4 - land of SO4 – land of S - land 8.3e-15 dryso4 (kg m-2 s-1) 3.6e-15 5.1e-15 wetso4 (kg m-2 1.8e-15 0e+00 2001 2002 2003 2001 2002 2003 2004 2001 2002 2003 2004 2001 2002 2003 2004 total cloud cover convective cloud cover percentage - land percentage - land 0.003 0.05 0.002 0.00



surface flux of BC – land