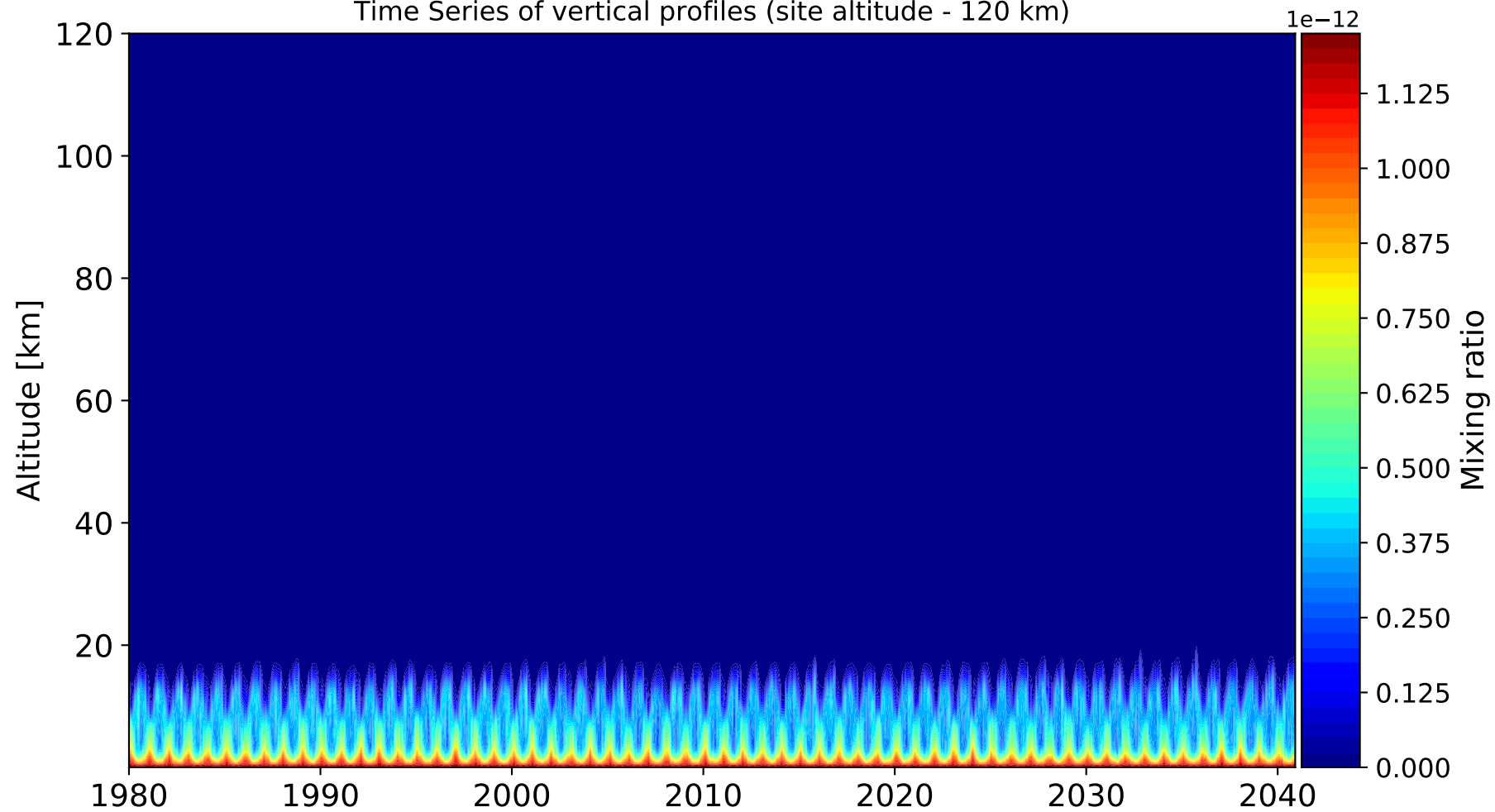
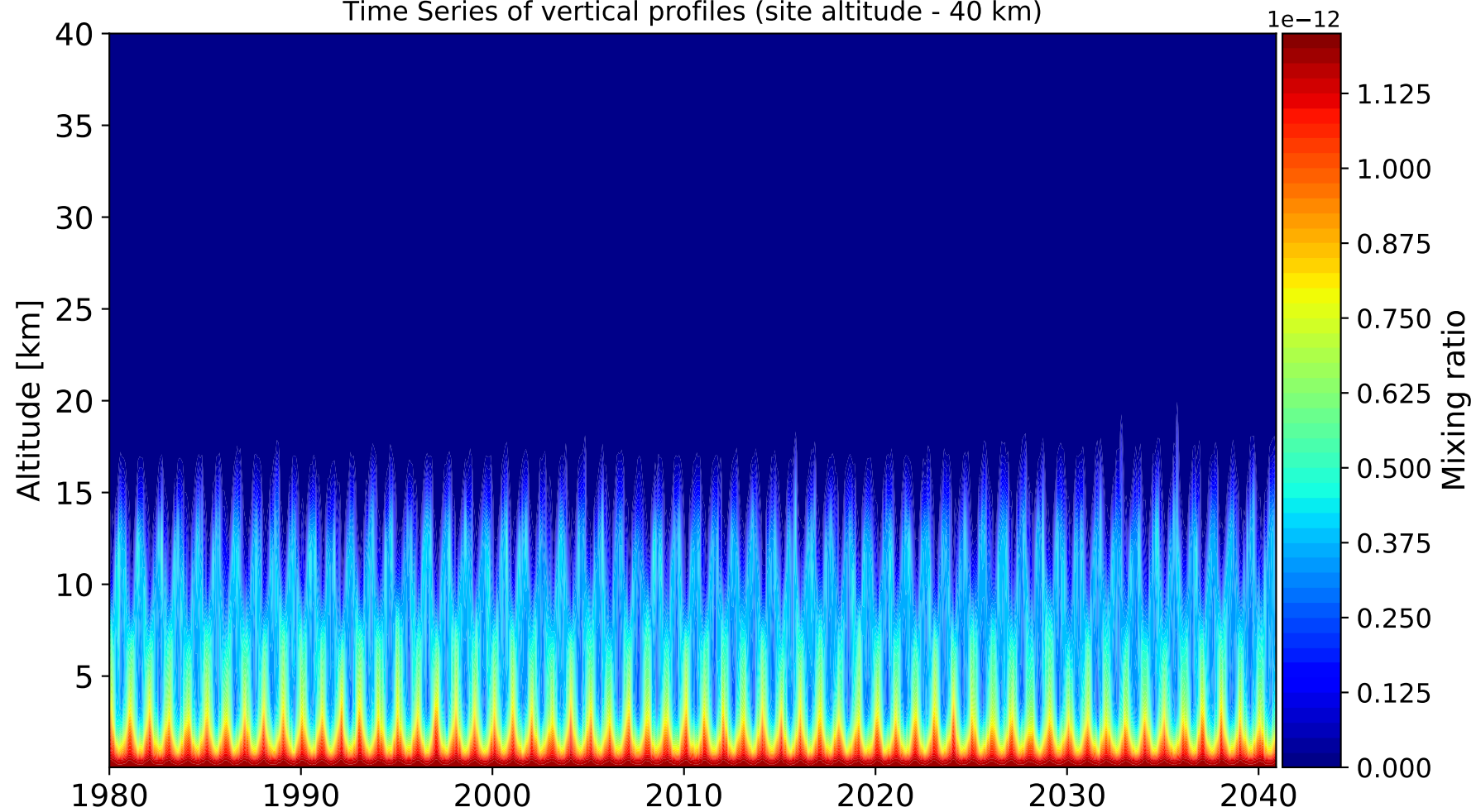


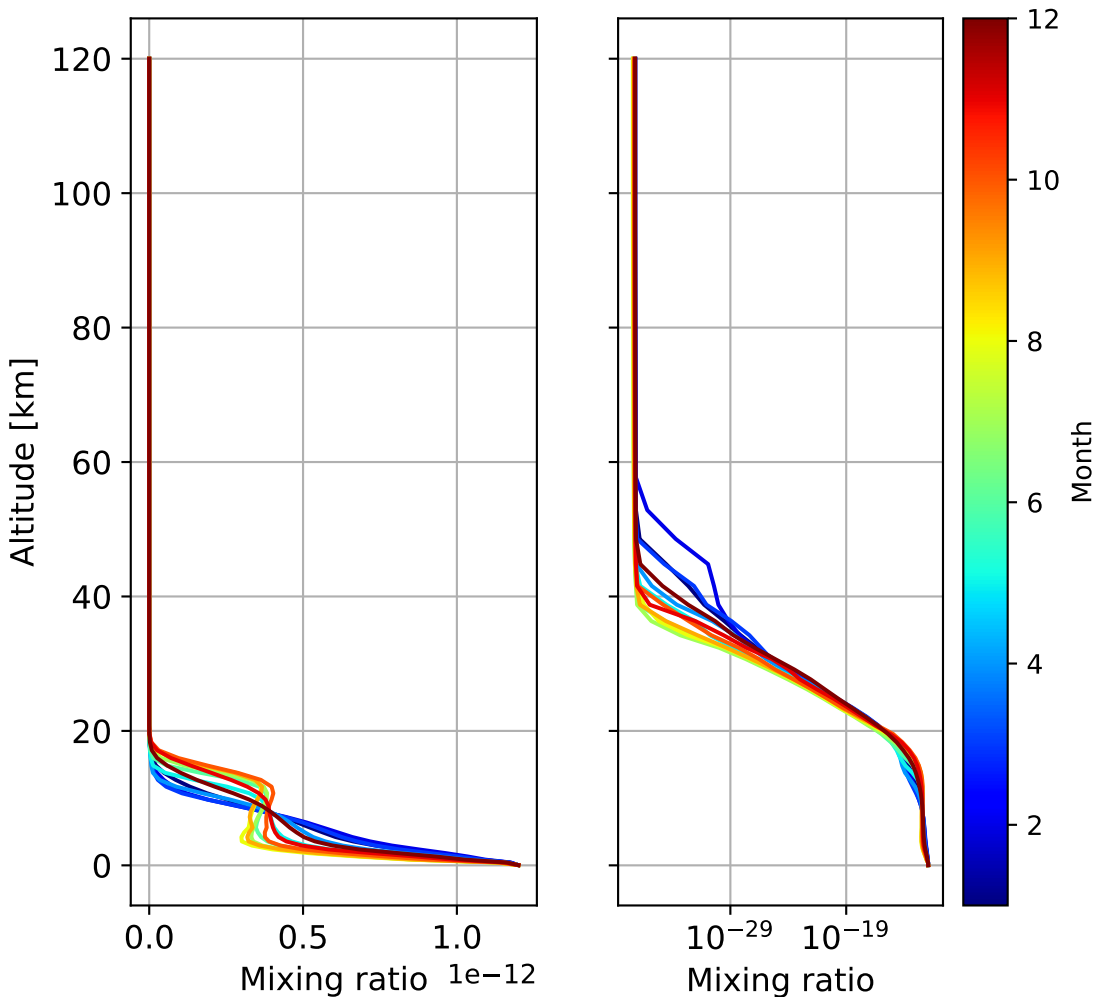
Time Series of vertical profiles (site altitude - 120 km)



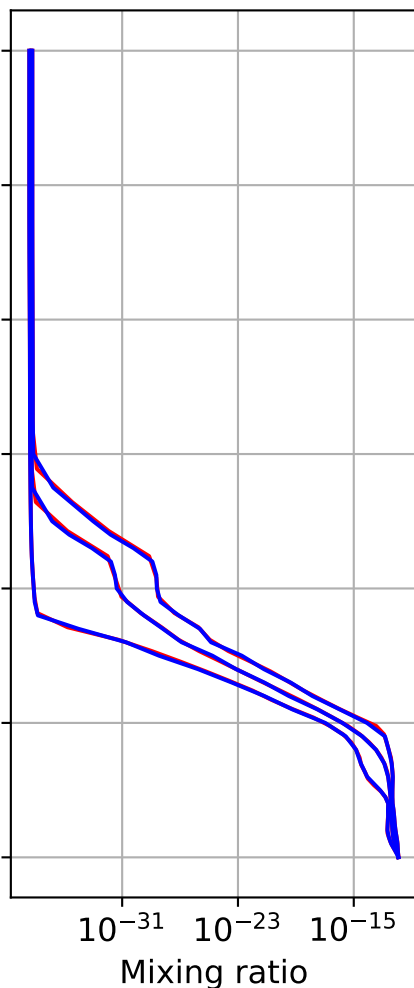
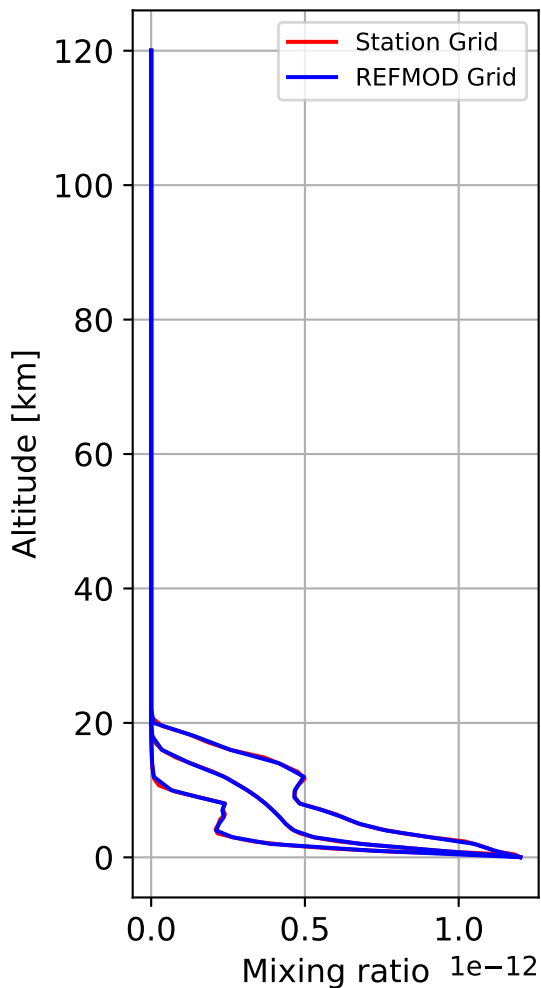
Time Series of vertical profiles (site altitude - 40 km)



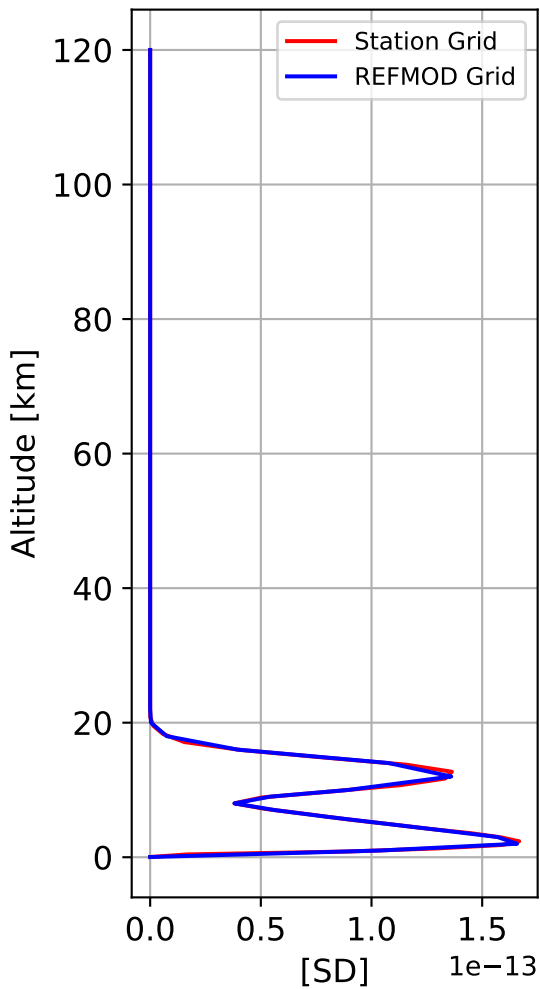
# Monthly mean WACCM profile (interpolated to station grid) Tsukuba, 36.05N, 140.12E, 0.031km/sl



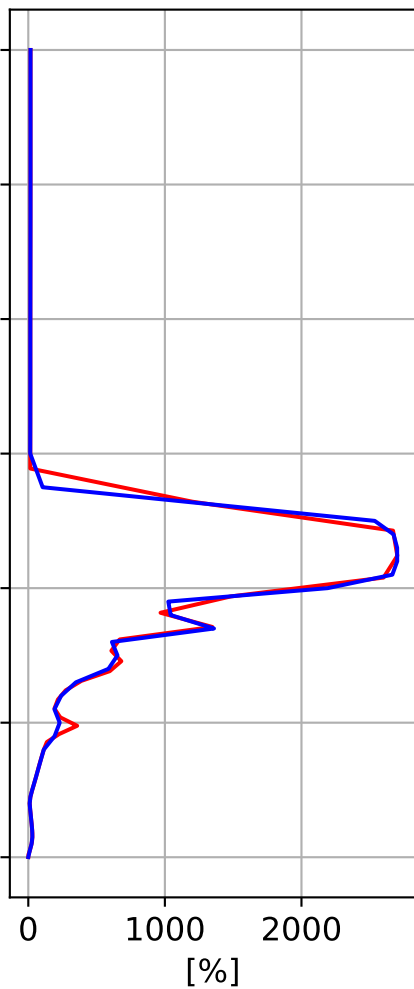
Min, Max, Mean of 732 profiles  
Tsukuba, 36.05N, 140.12E, 0.031kmasl



### Std. Deviation



### Percent Deviation

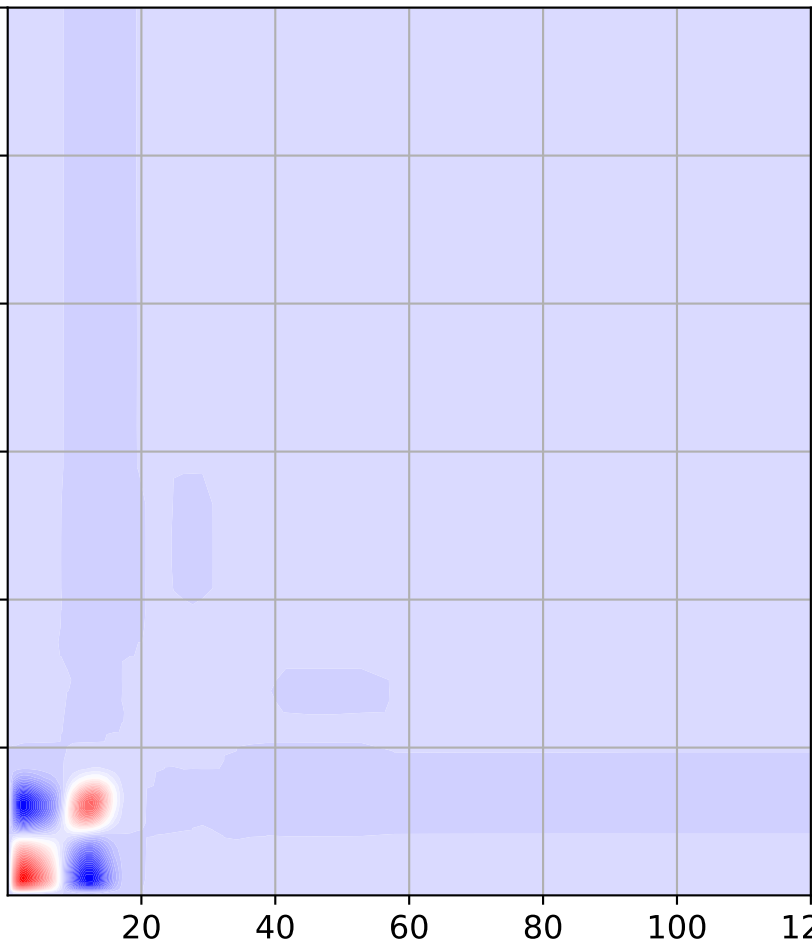


# Level covariance matrix

1e-26

Altitude [km]

120  
100  
80  
60  
40  
20



Mixing ratio<sup>2</sup>]

2.5  
2.0  
1.5  
1.0  
0.5  
0.0  
-0.5  
-1.0  
-1.5  
-2.0

Altitude [km]