

Supplementary material for:

Atmospheric lifetime of sulfur hexafluoride (SF₆) and five other trace gases in the BASCOE model driven by three reanalyses.
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5 Evaluation of trace gas profiles

Figures S1-S6 show the normalized mean bias, the standard deviation and the correlation of the six long-lived species simulated with the BASCOE CTM compared to MIPAS and ACE-FTS observations. The next series of figures (S7-S16) show the modified normalised mean bias and the normalised standard deviation of BASCOE model output with respect to MIPAS and ACE-FTS observations.

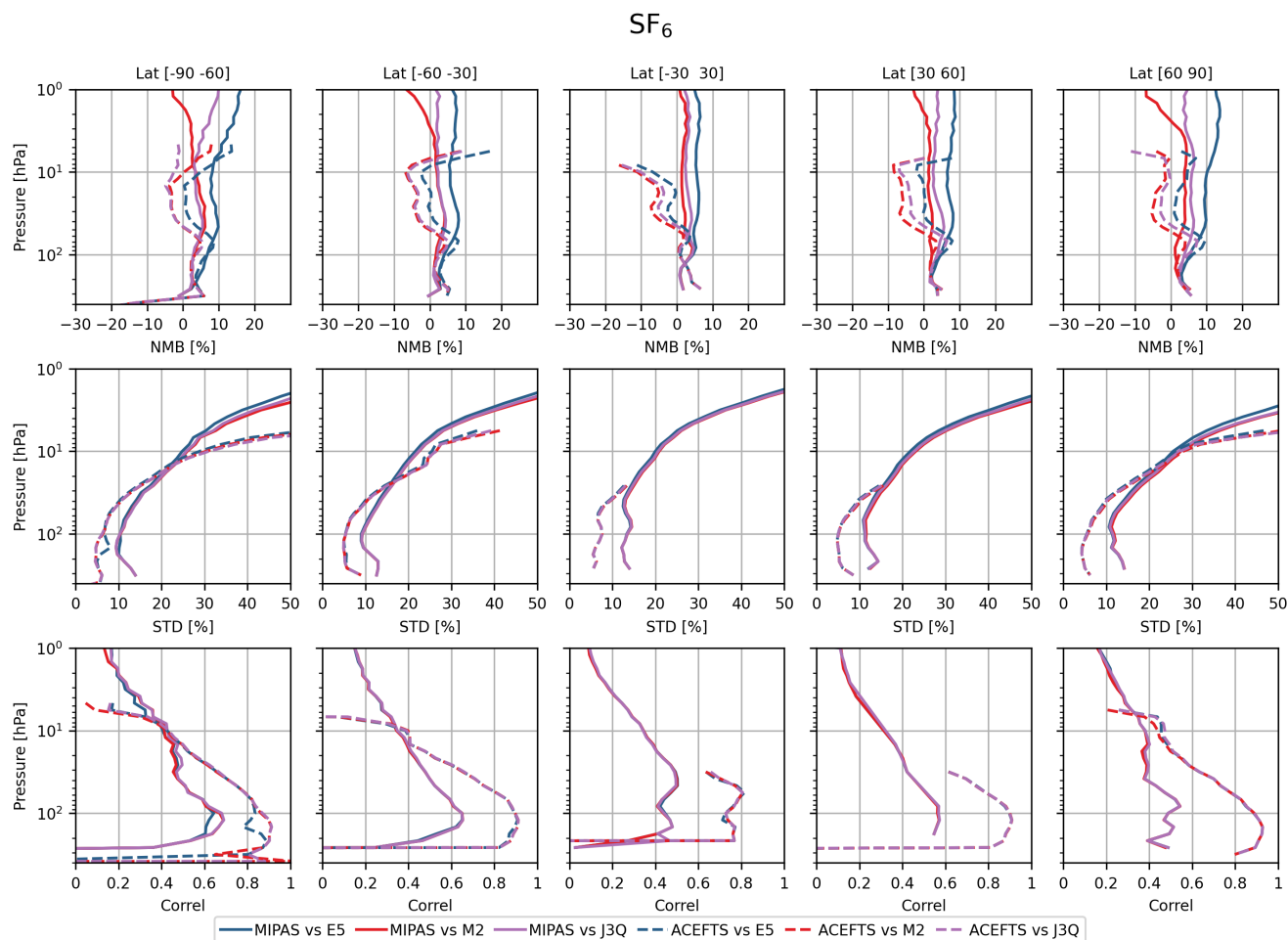


Figure S1. SF₆ statistics with respect to MIPAS and ACE-FTS

N₂O

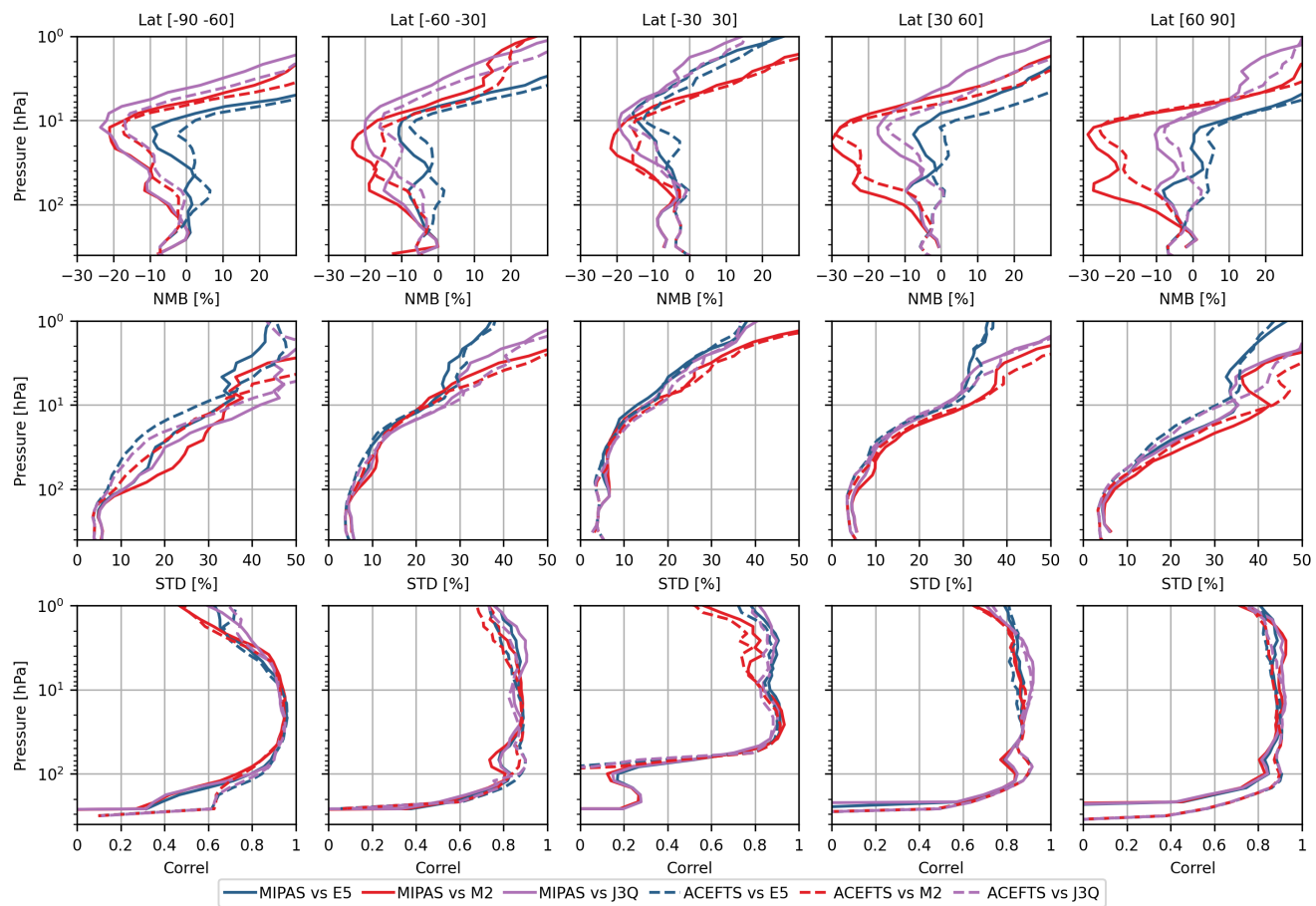


Figure S2. N₂O statistics with respect to MIPAS and ACE-FTS

CFC-11

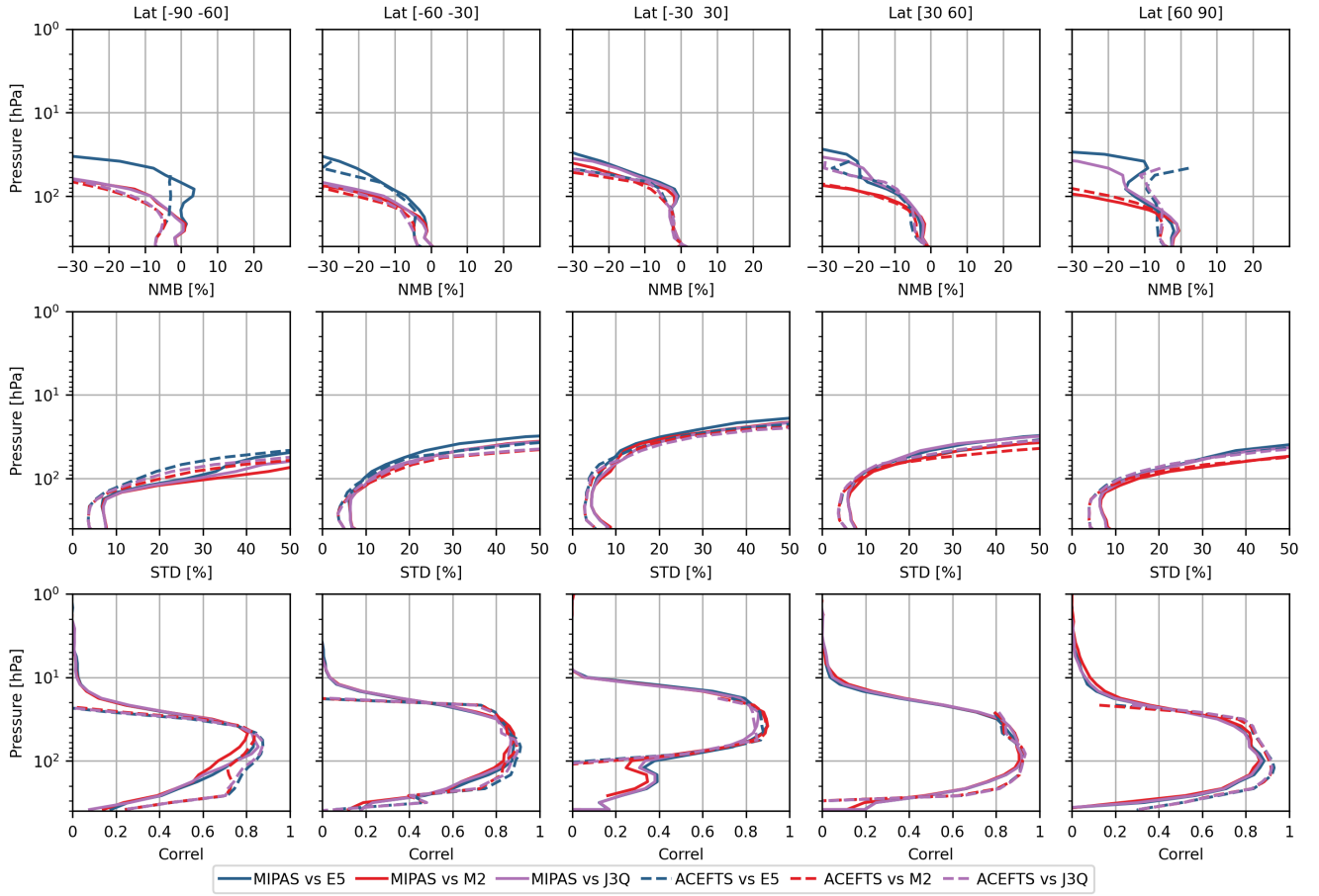


Figure S3. CFC-11 statistics with respect to MIPAS and ACE-FTS

CFC-12

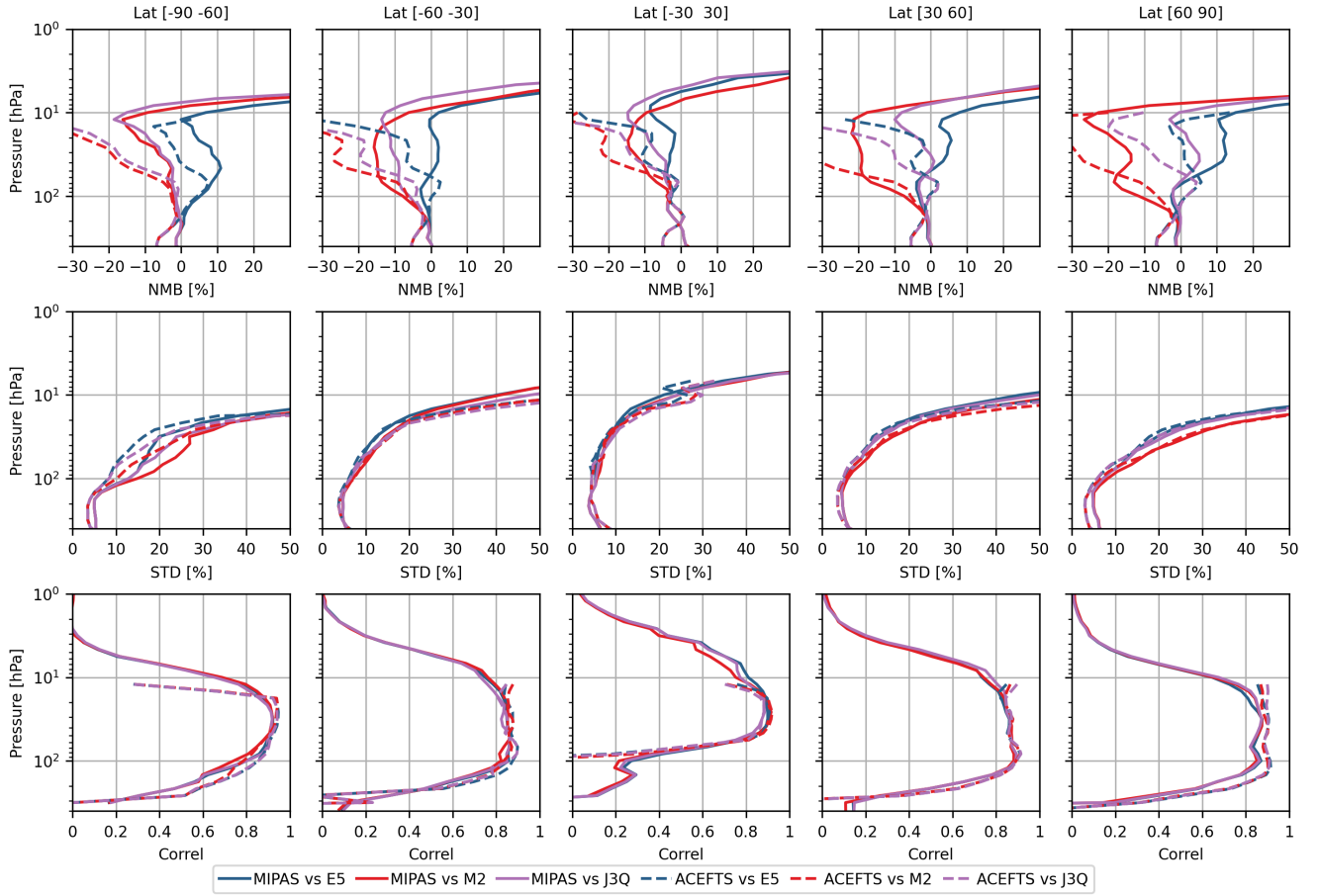


Figure S4. CFC-12 statistics with respect to MIPAS and ACE-FTS

CH₄

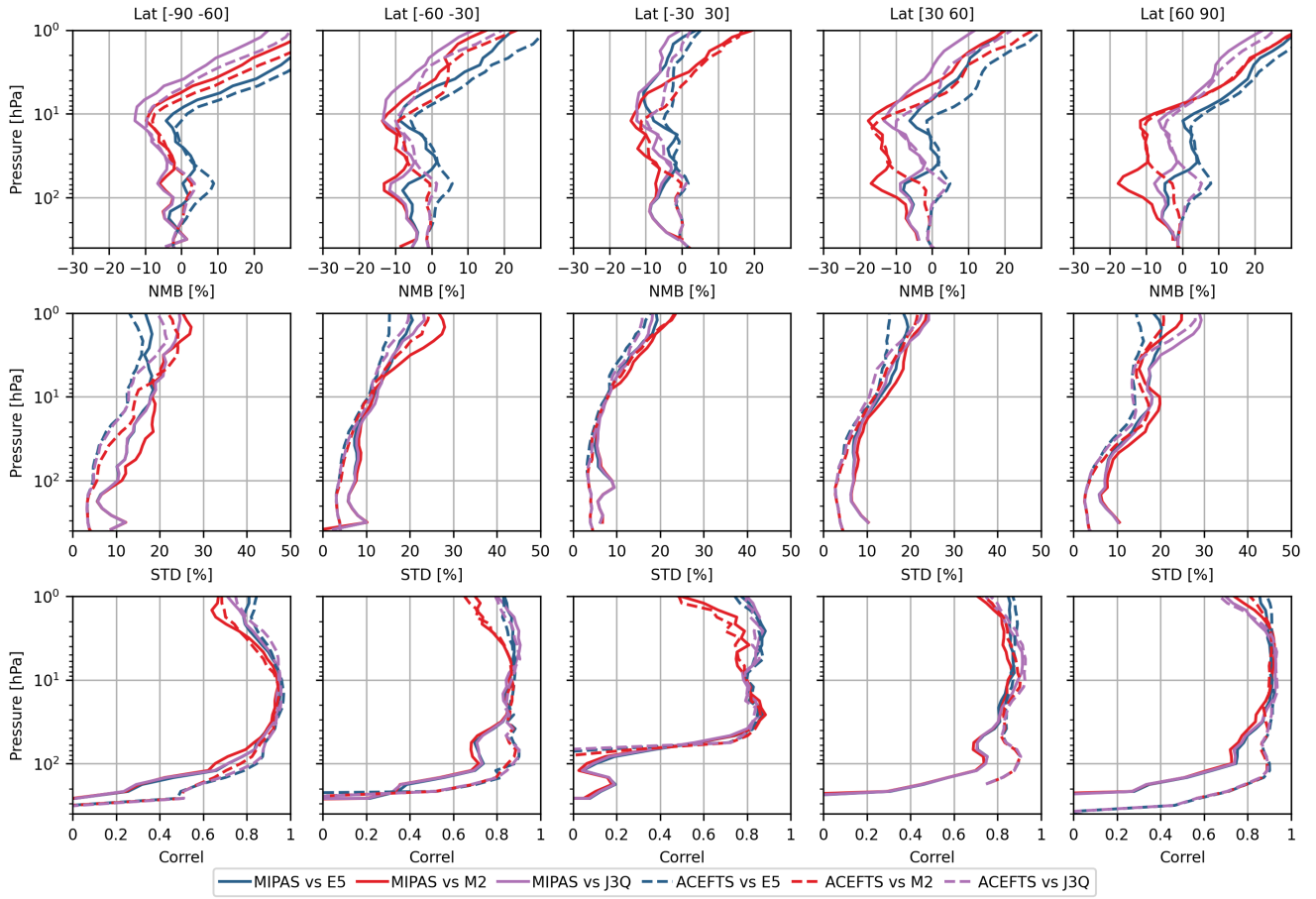


Figure S5. CH₄ statistics with respect to MIPAS and ACE-FTS

HCFC-22

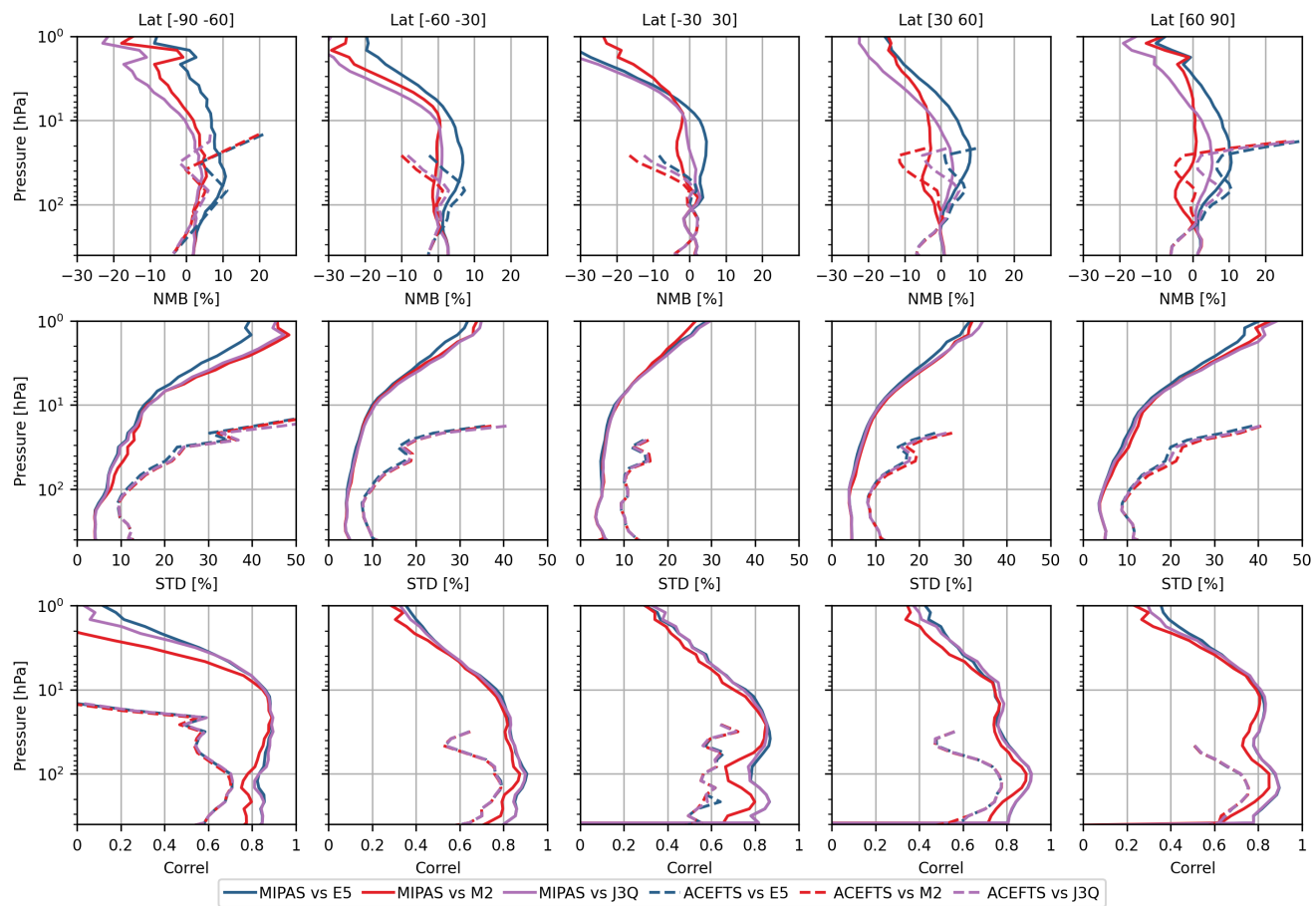


Figure S6. HCFC-22 statistics with respect to MIPAS and ACE-FTS

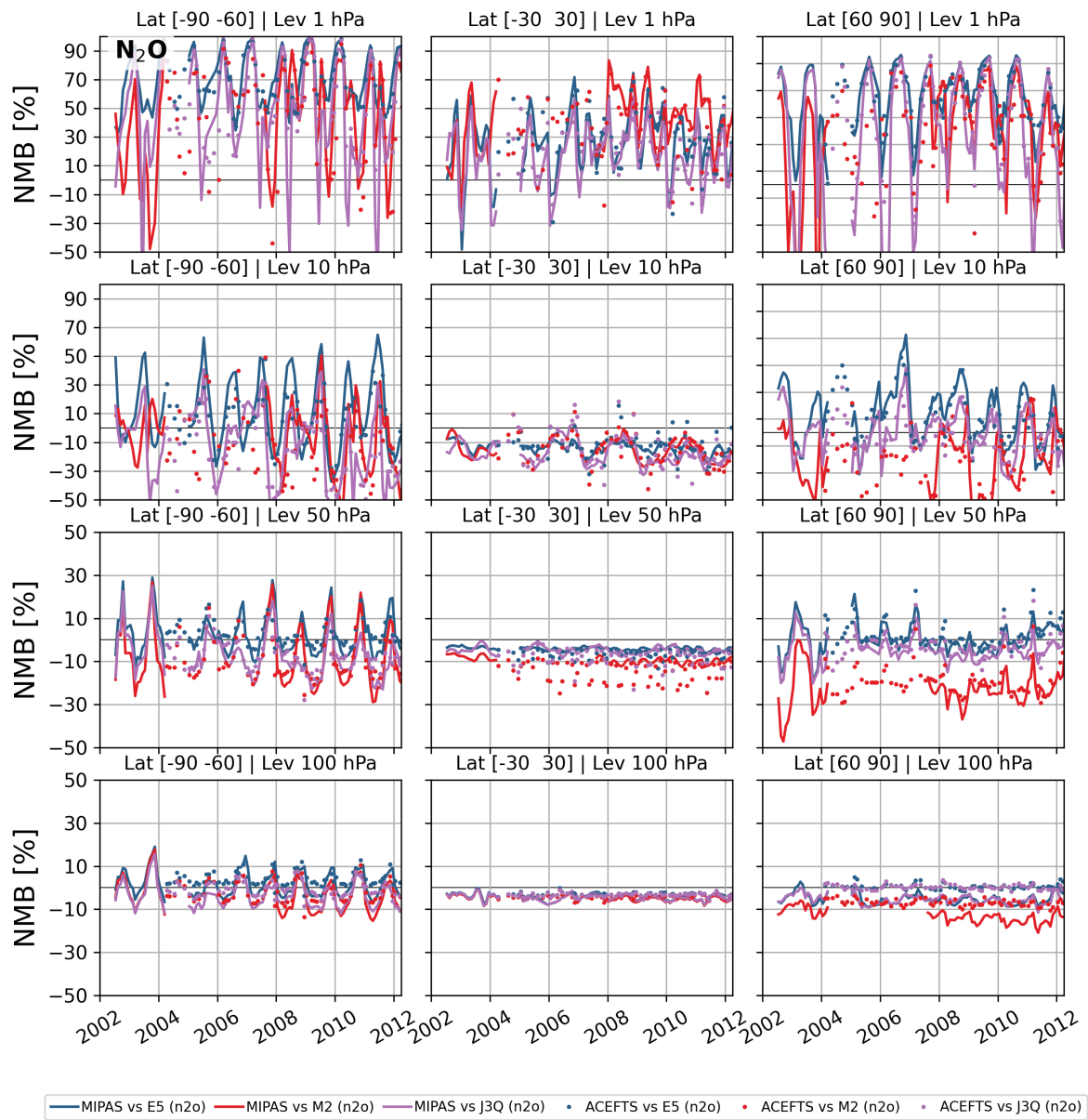


Figure S7. Modified normalised mean bias of BASCOE N₂O with respect to MIPAS and ACE-FTS.

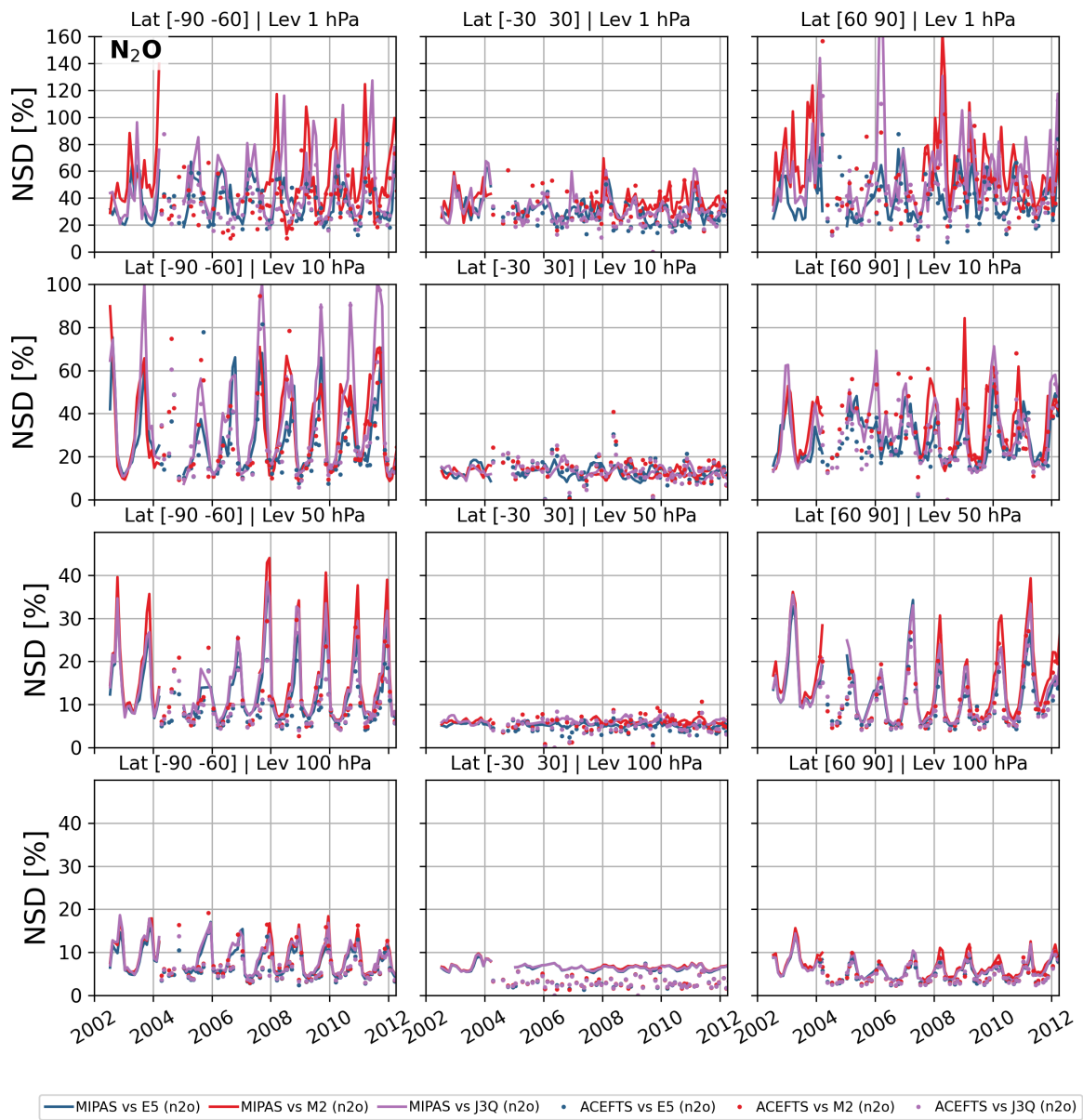


Figure S8. Normalised standard deviation of BASCOE N₂O with respect to MIPAS and ACE-FTS.

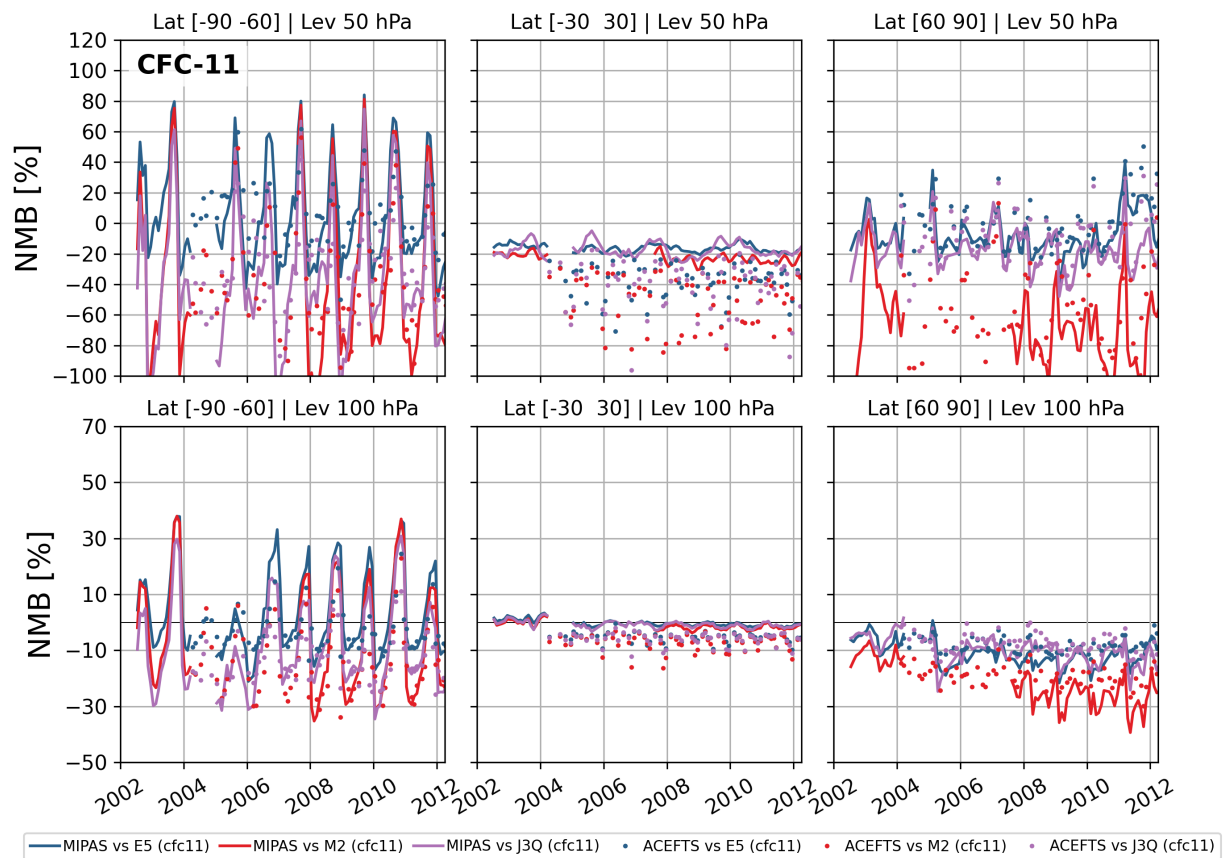


Figure S9. Modified normalised mean bias of BASCOE CFC-11 with respect to MIPAS and ACE-FTS.

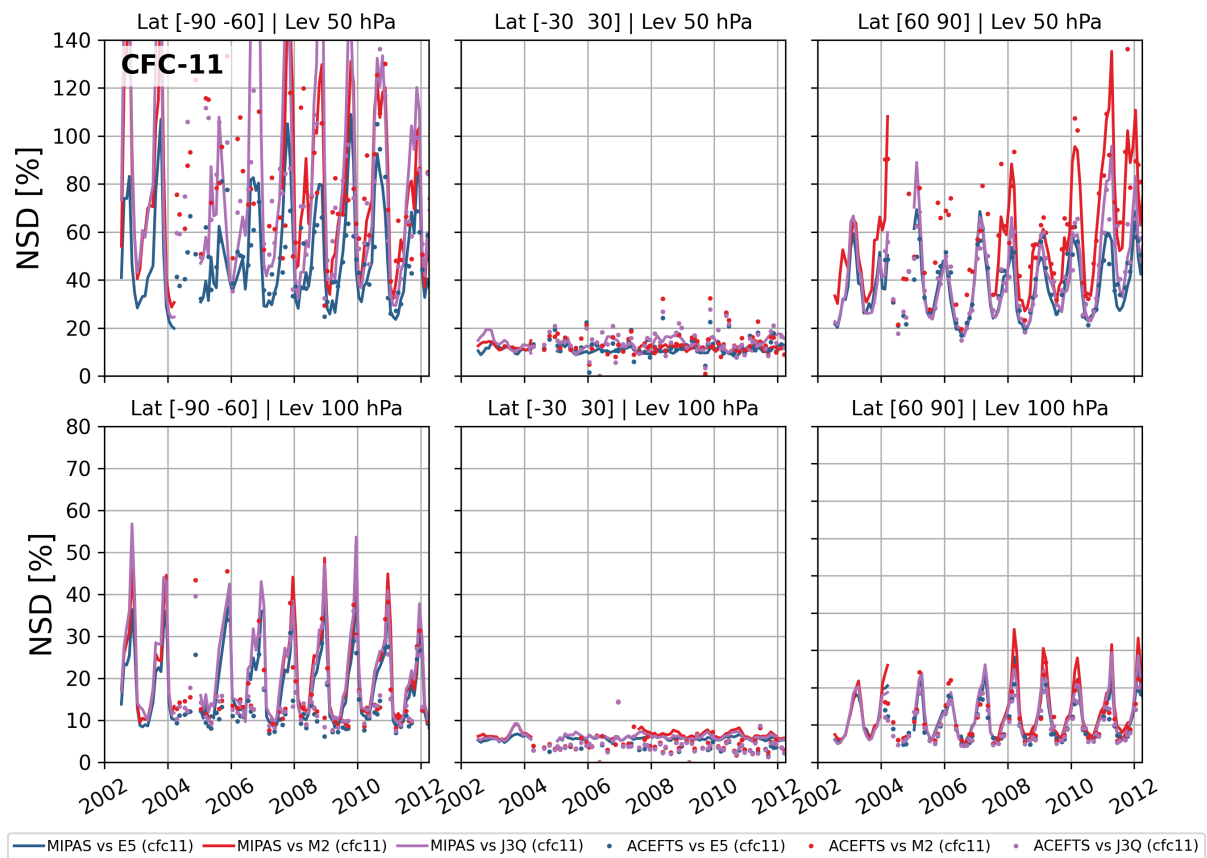


Figure S10. Normalised standard deviation of BASCOE CFC-11 with respect to MIPAS and ACE-FTS.

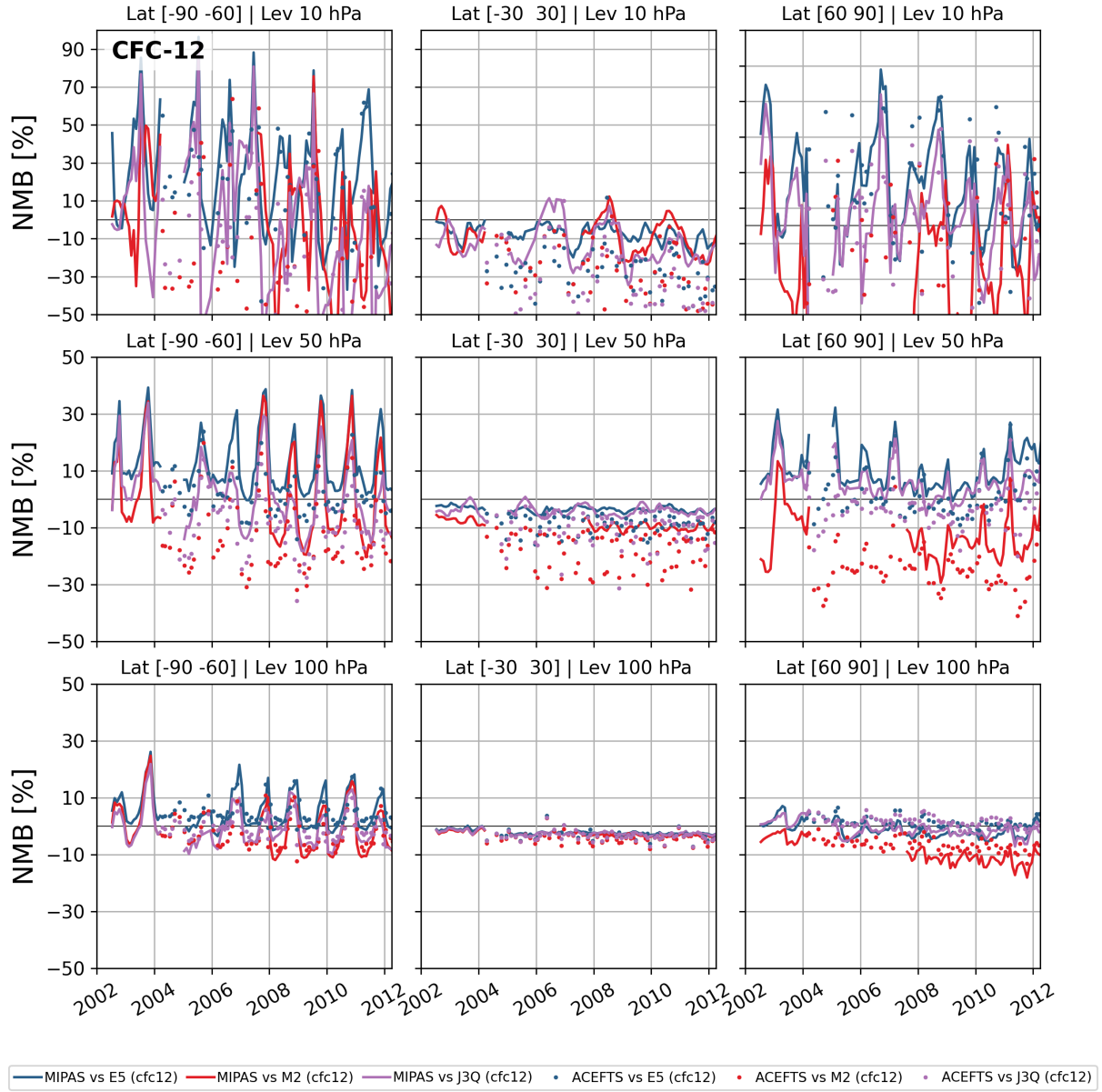


Figure S11. Modified normalised mean bias of BASCOE CFC-12 with respect to MIPAS and ACE-FTS.

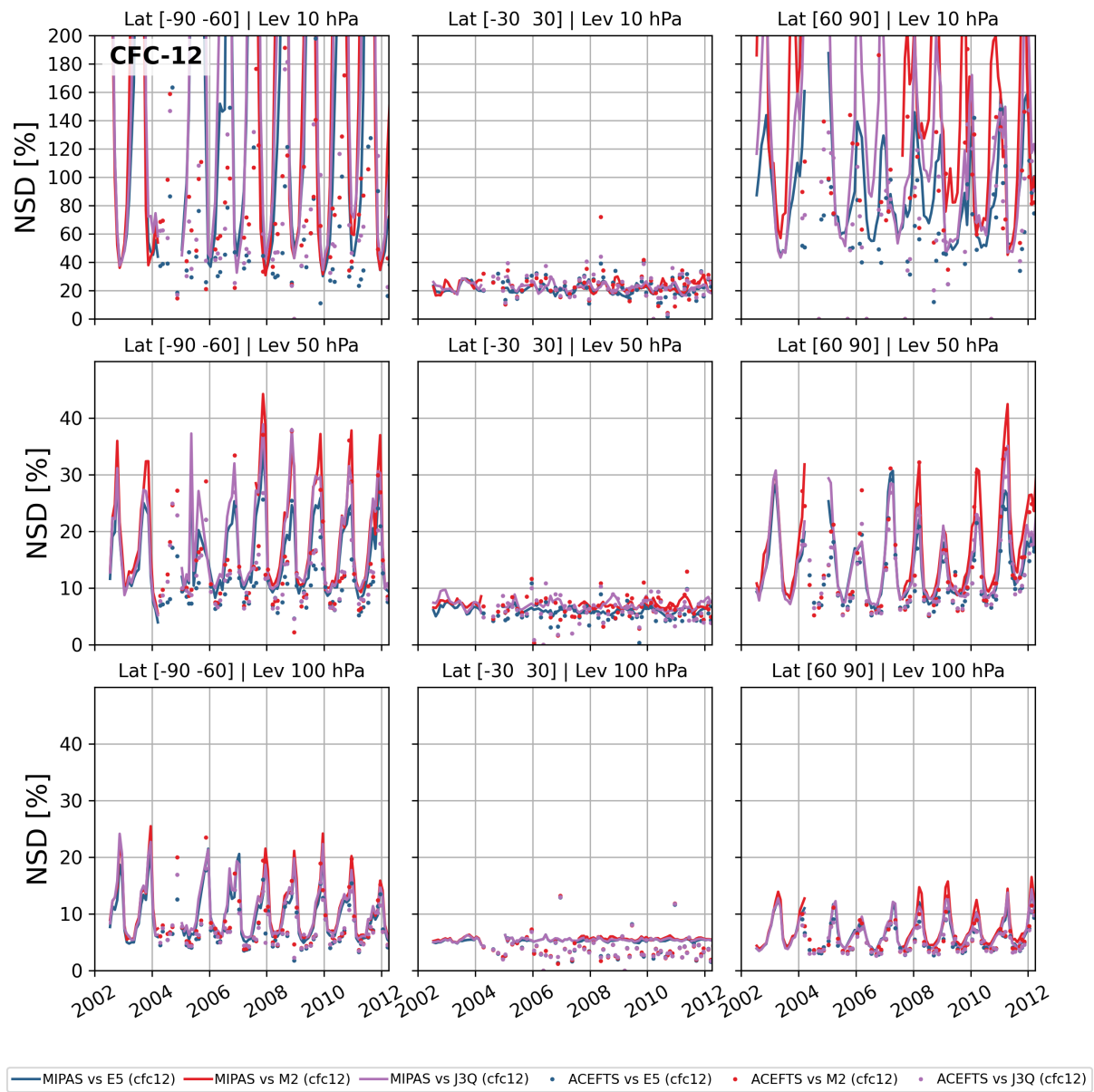


Figure S12. Normalised standard deviation of BASCOE CFC-12 with respect to MIPAS and ACE-FTS.

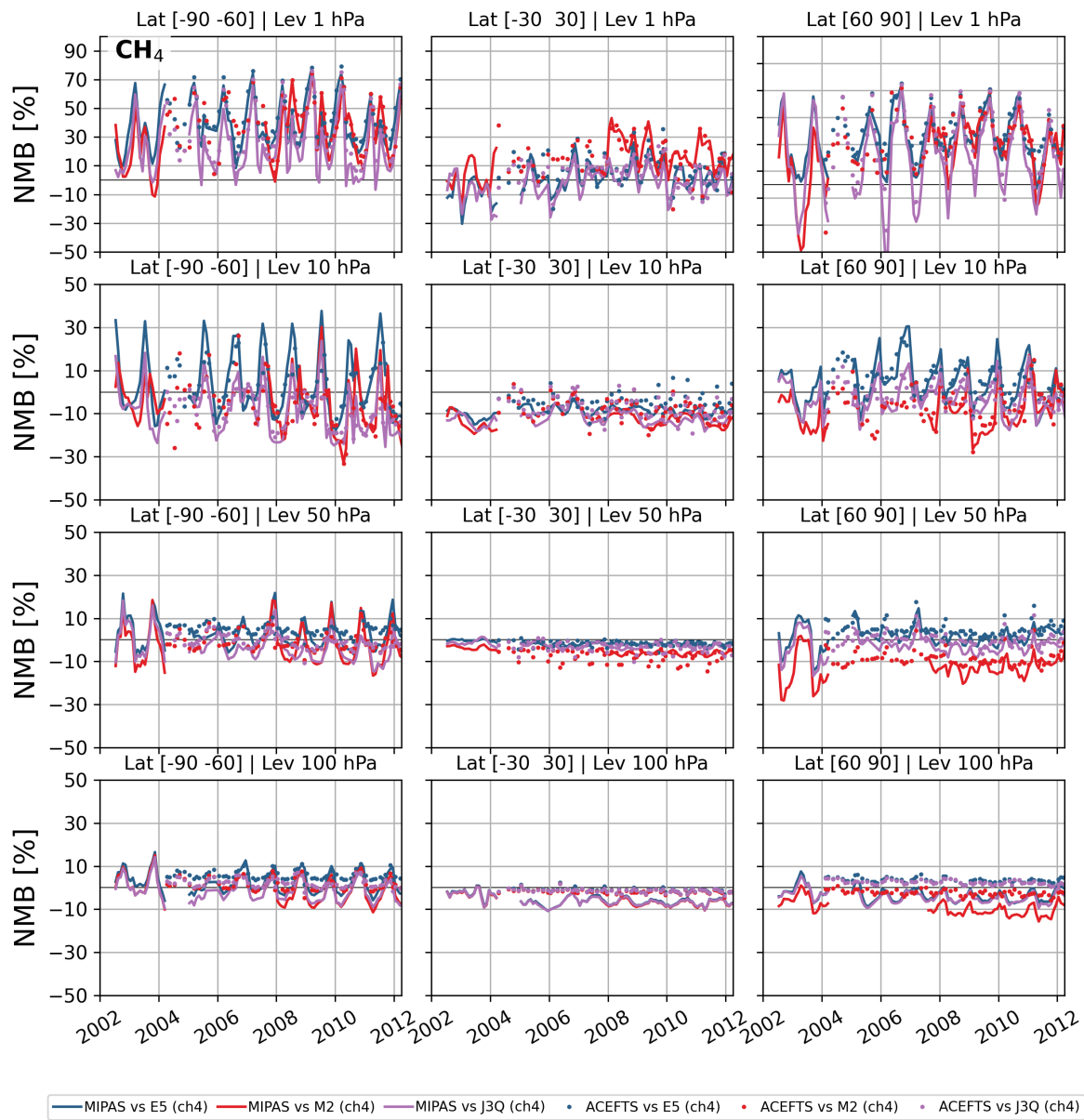


Figure S13. Modified normalised mean bias of BASCOE CH₄ with respect to MIPAS and ACE-FTS.

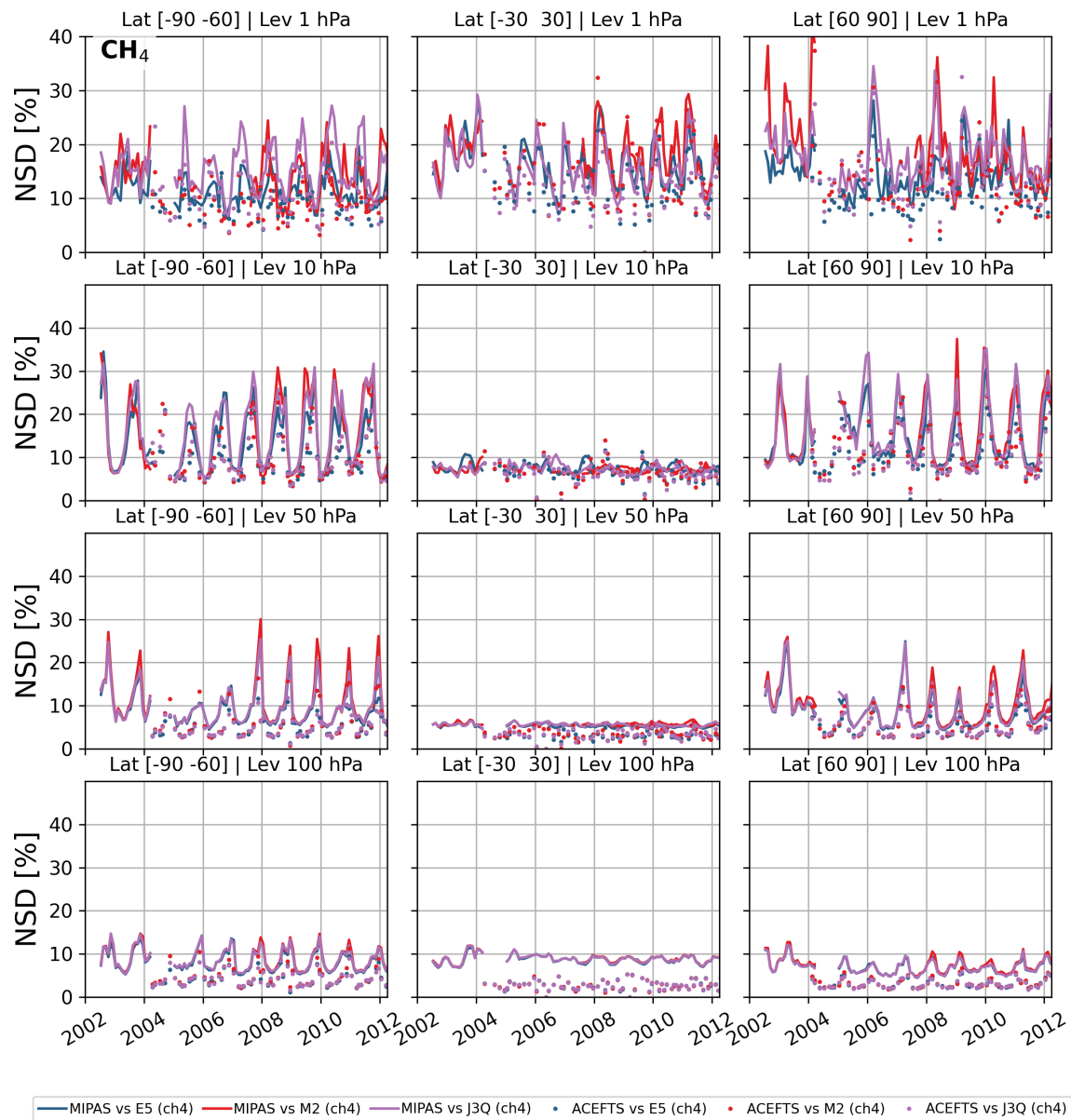


Figure S14. Normalised standard deviation of BASCOE CH₄ with respect to MIPAS and ACE-FTS.

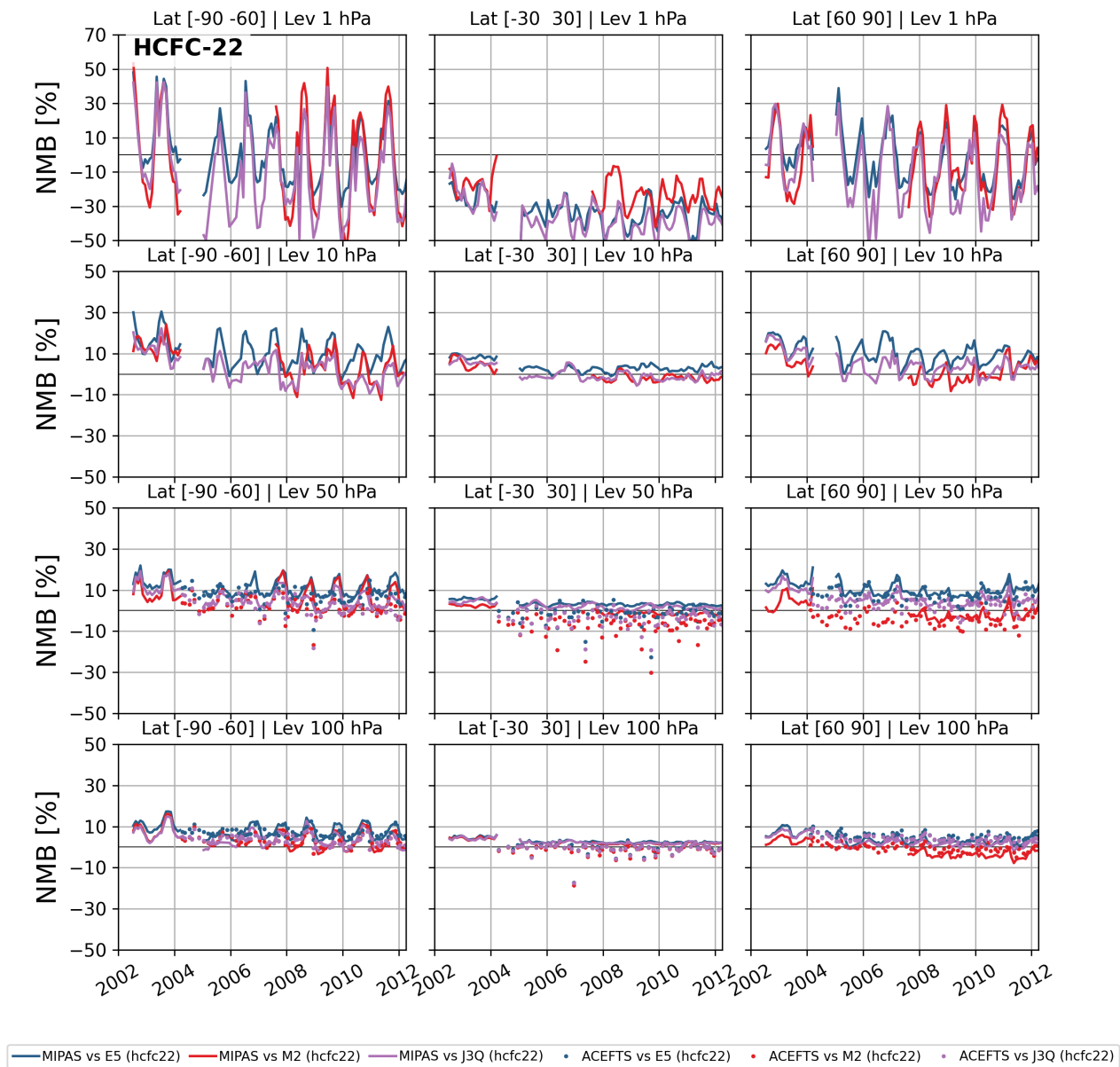


Figure S15. Modified normalised mean bias of BASCOE HCFC-22 with respect to MIPAS and ACE-FTS.

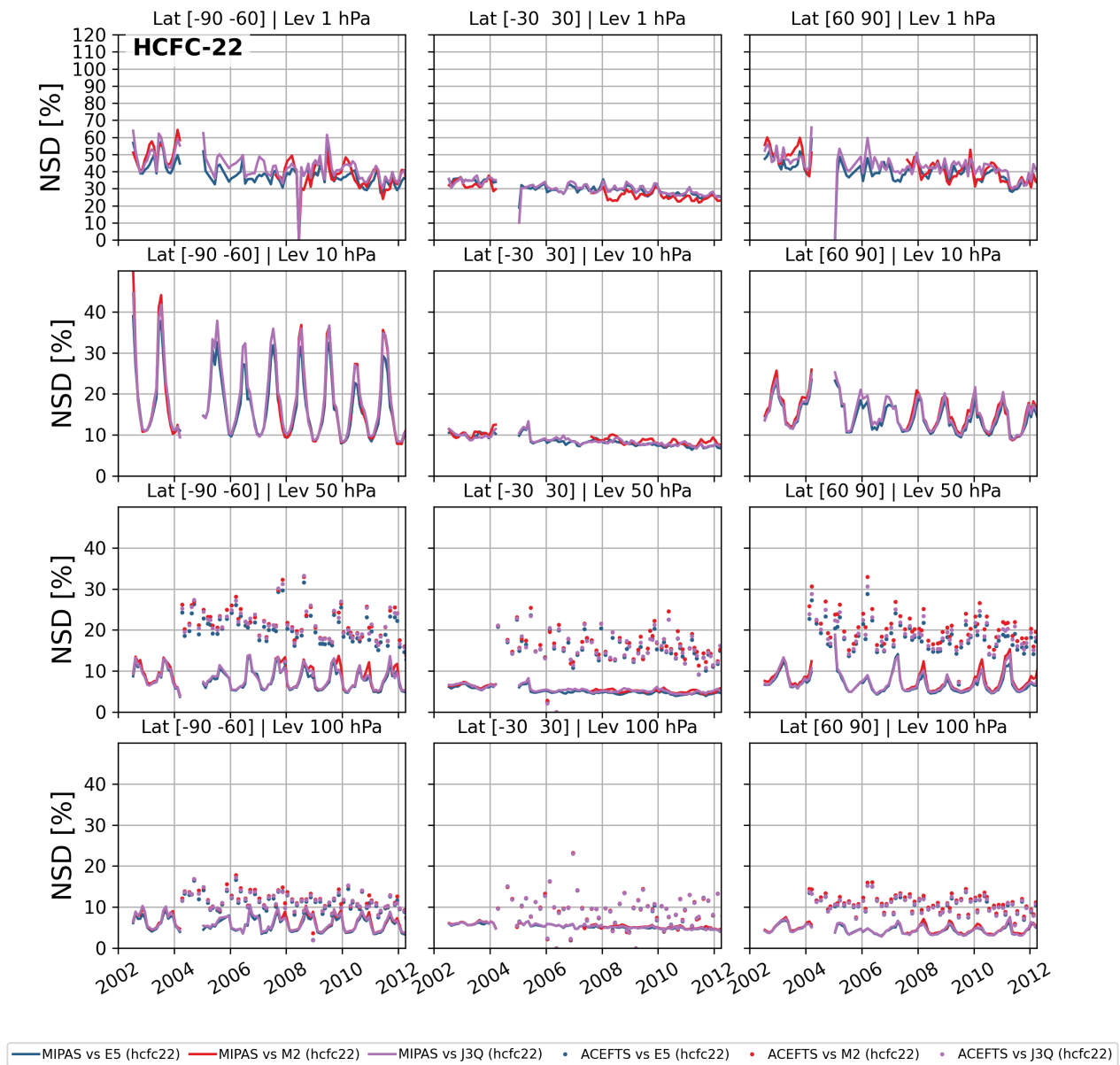


Figure S16. Normalised standard deviation of BASCOE HCFC-22 with respect to MIPAS and ACE-FTS.