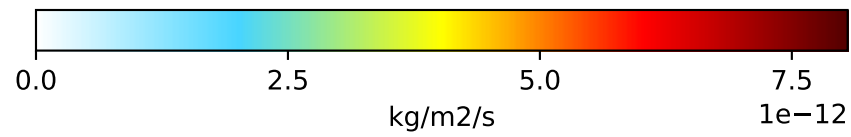
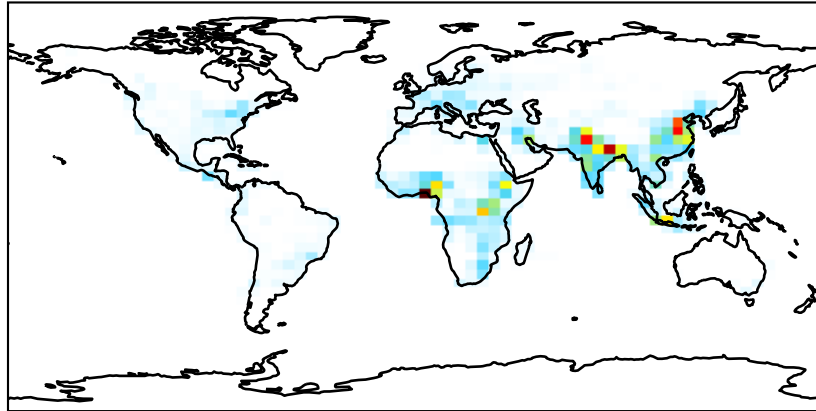
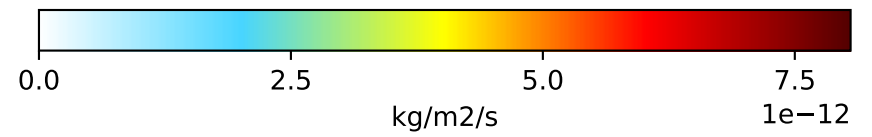
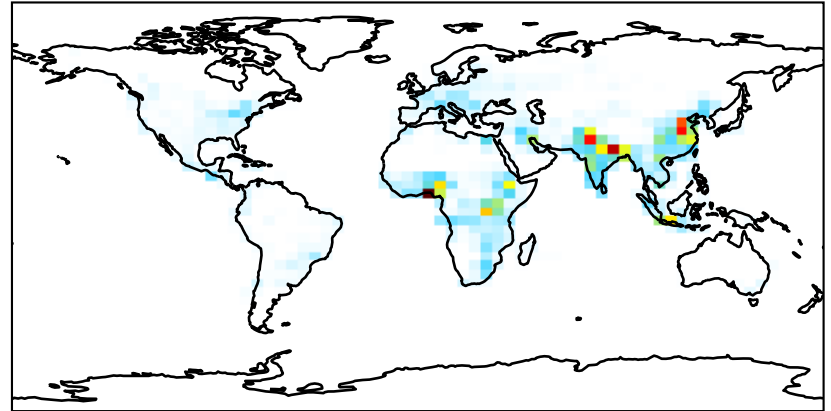


# EmisALD2\_Anthro (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



GCC\_13.0.0 (Dev)  
4.0x5.0



Difference  
Dev - Ref, Dynamic Range



Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

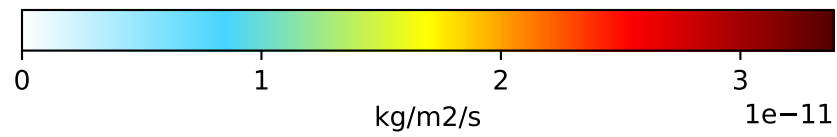
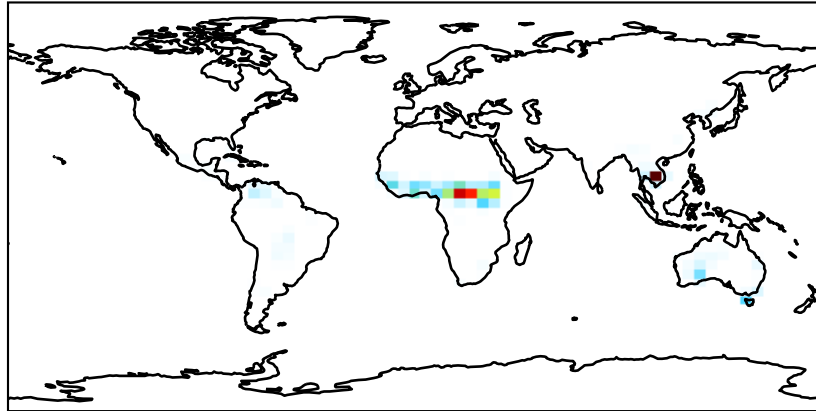


Ratio  
Dev/Ref, Fixed Range

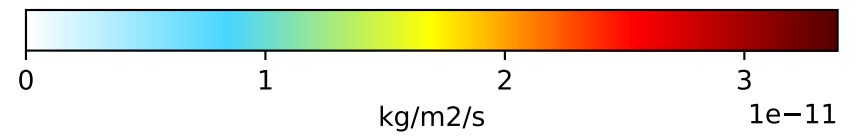
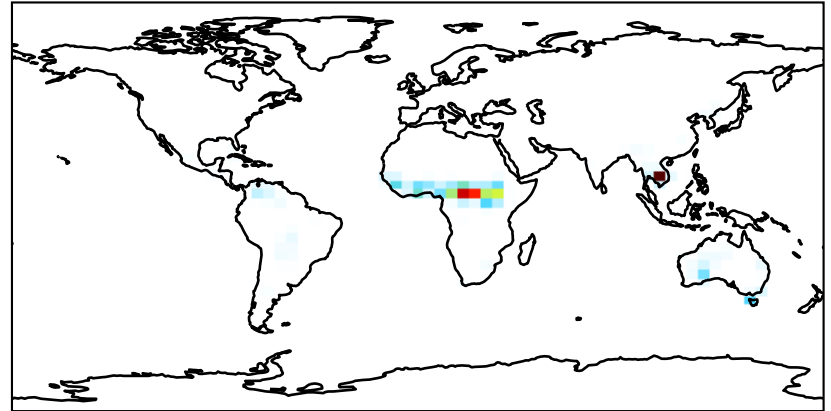


# EmisALD2\_BioBurn (Jan2019)

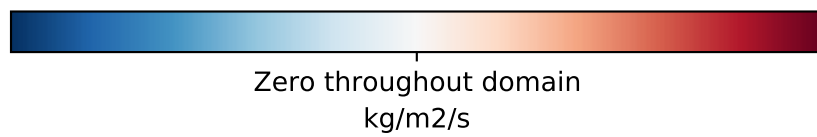
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



GCC\_13.0.0 (Dev)  
4.0x5.0



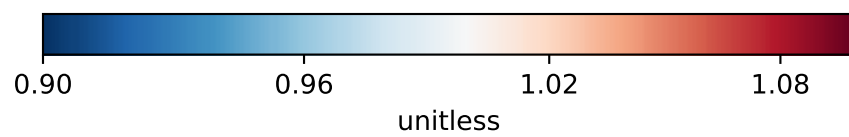
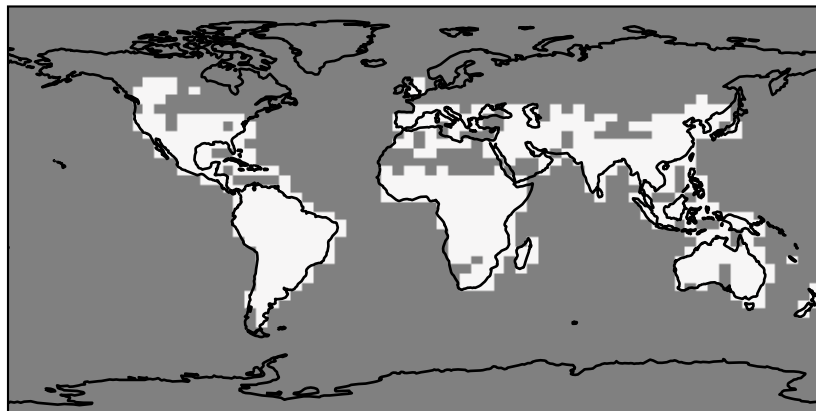
Difference  
Dev - Ref, Dynamic Range



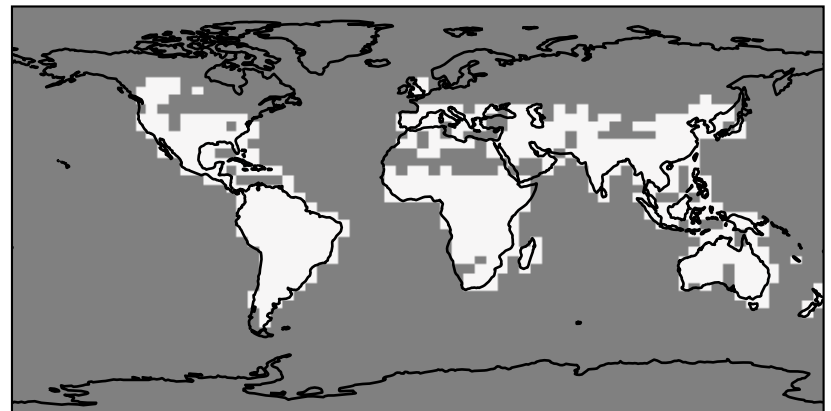
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

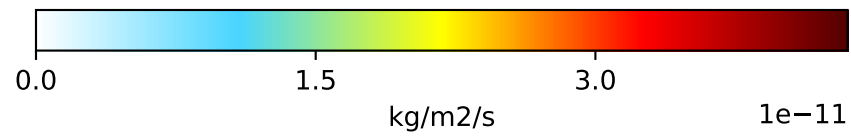
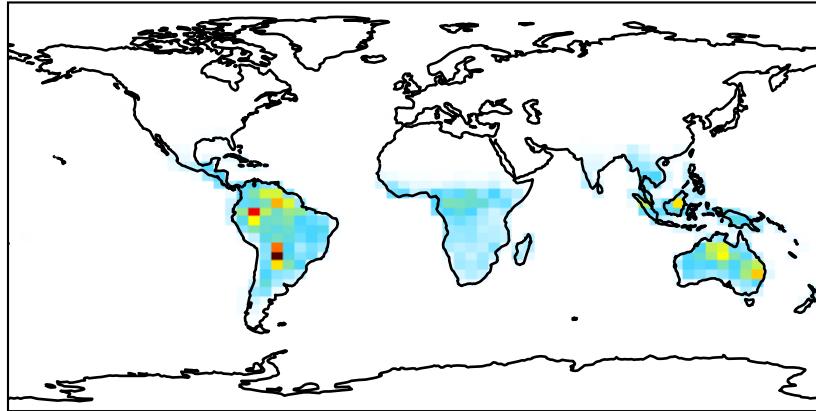


Ratio  
Dev/Ref, Fixed Range

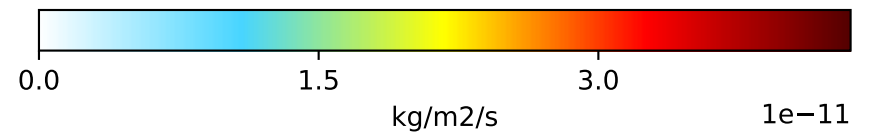
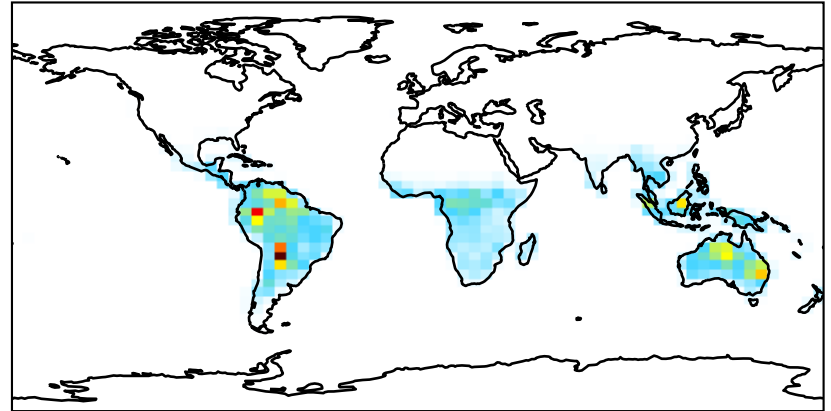


# EmisALD2\_Biogenic (Jan2019)

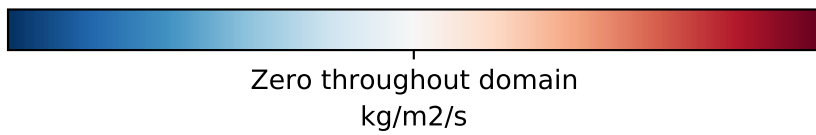
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



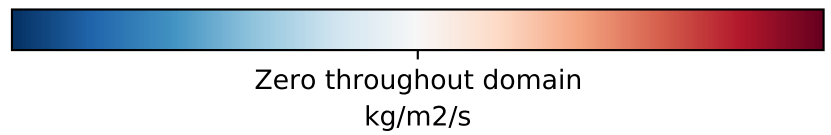
GCC\_13.0.0 (Dev)  
4.0x5.0



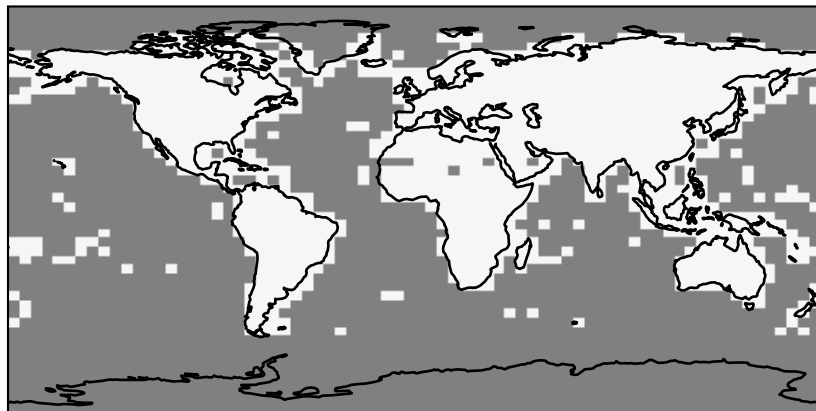
Difference  
Dev - Ref, Dynamic Range



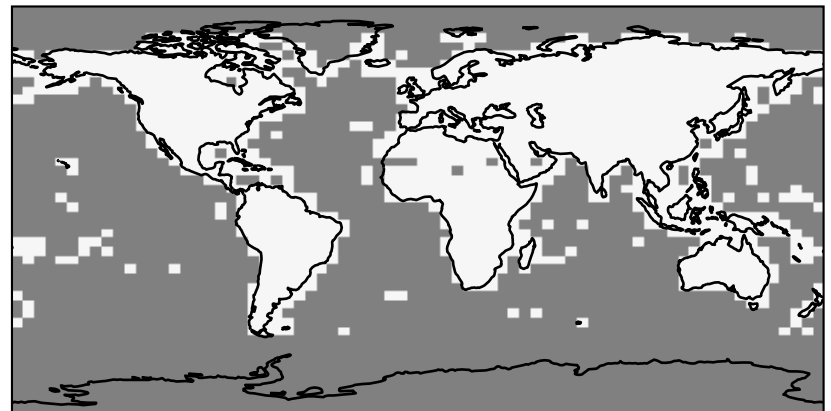
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

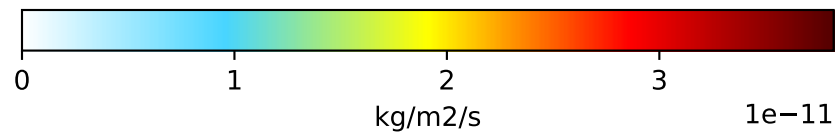
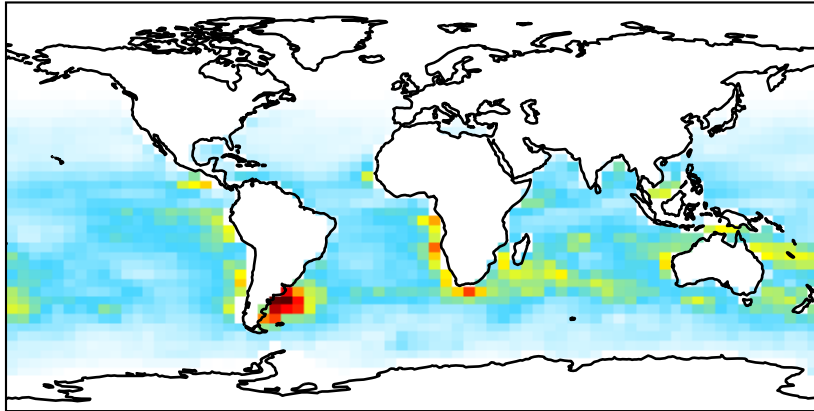


Ratio  
Dev/Ref, Fixed Range

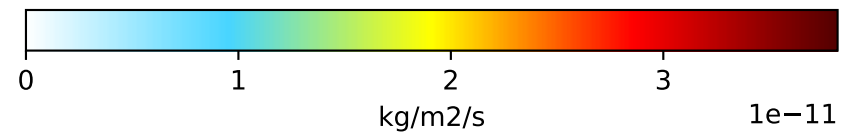
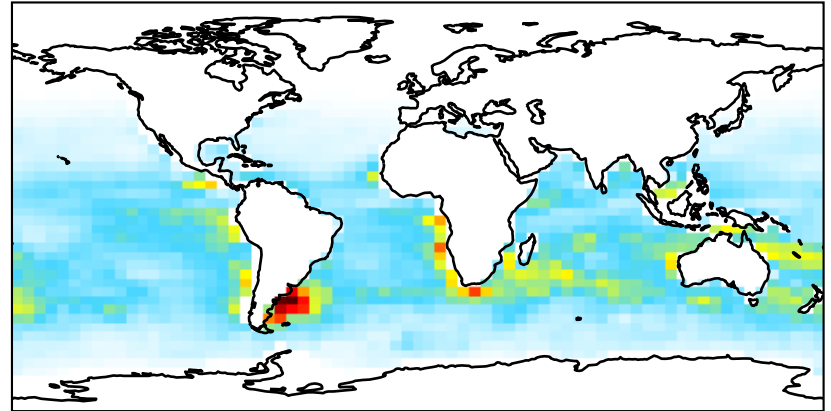


# EmisALD2\_Ocean (Jan2019)

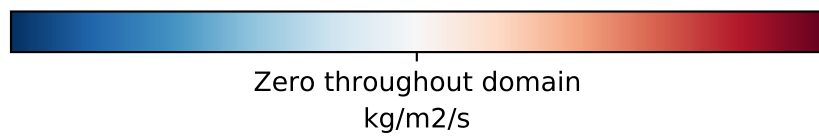
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



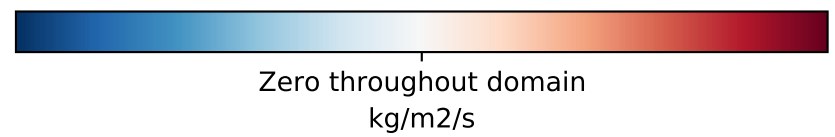
GCC\_13.0.0 (Dev)  
4.0x5.0



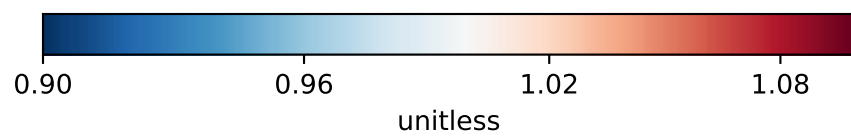
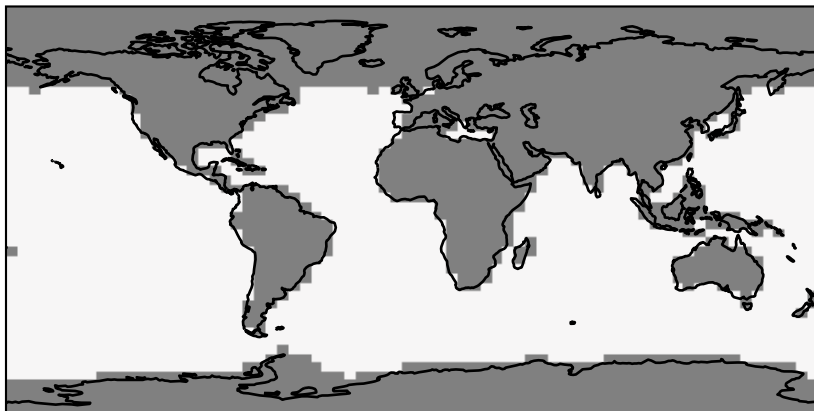
Difference  
Dev - Ref, Dynamic Range



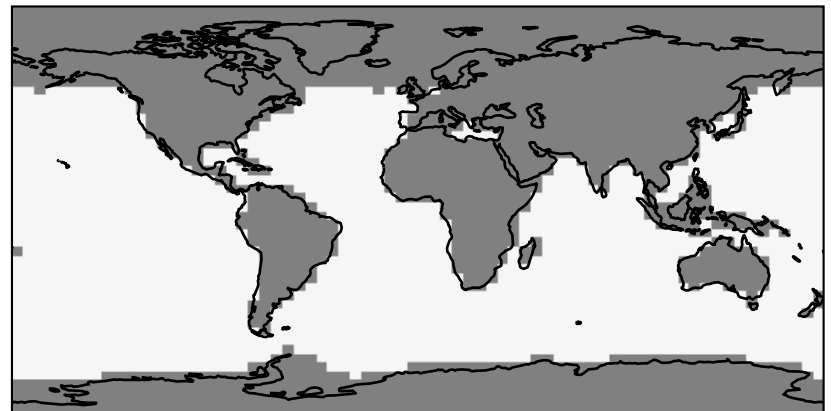
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

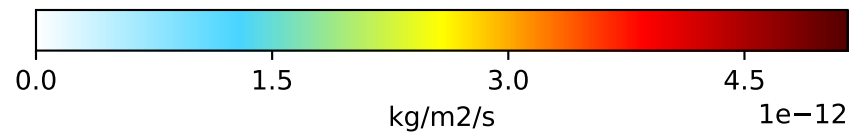
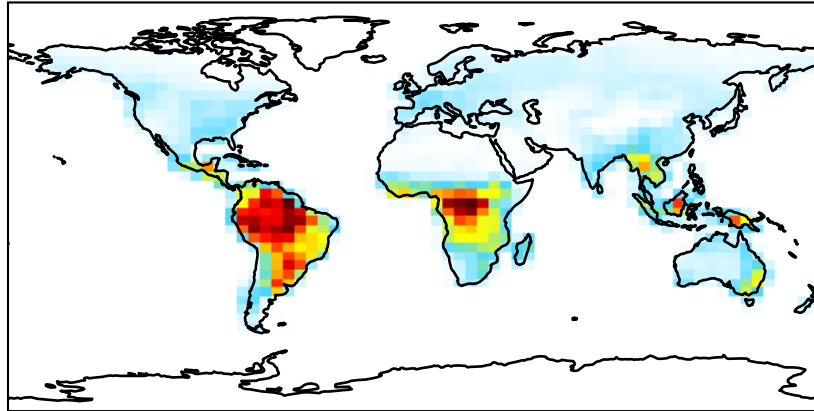


Ratio  
Dev/Ref, Fixed Range

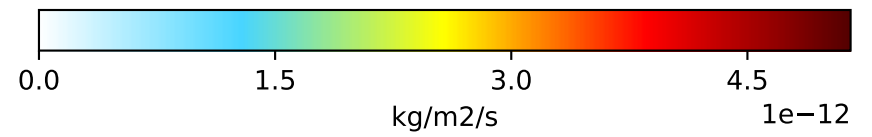
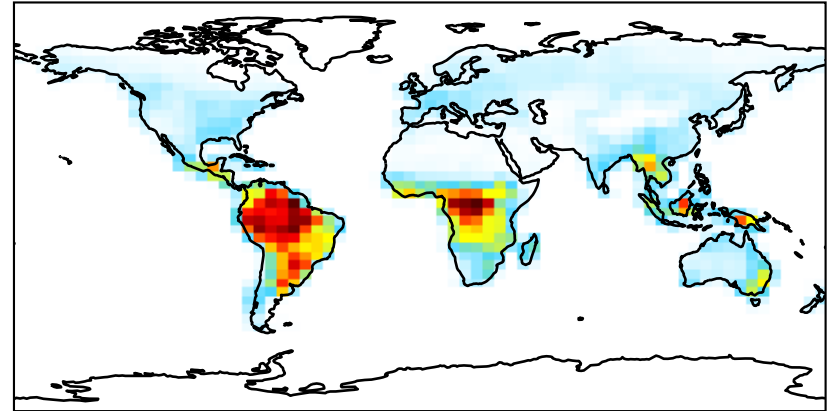


# EmisALD2\_PlantDecay (Jan2019)

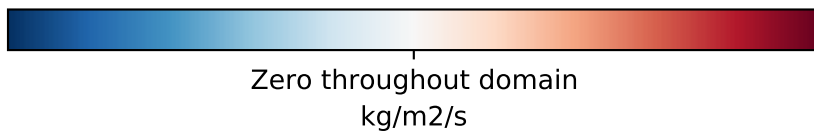
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



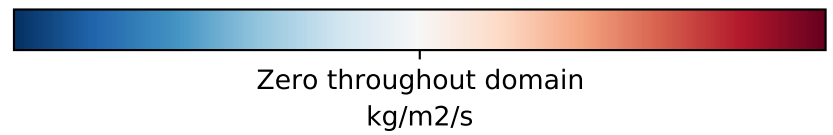
GCC\_13.0.0 (Dev)  
4.0x5.0



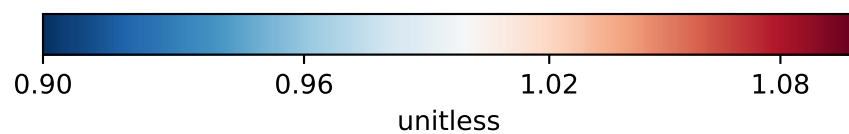
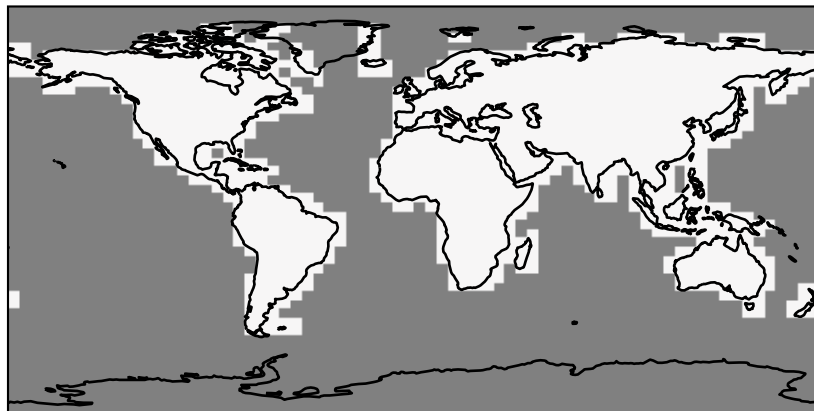
Difference  
Dev - Ref, Dynamic Range



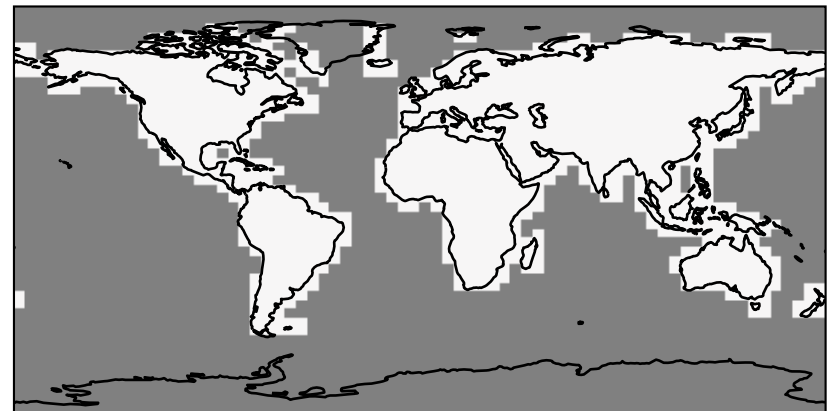
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

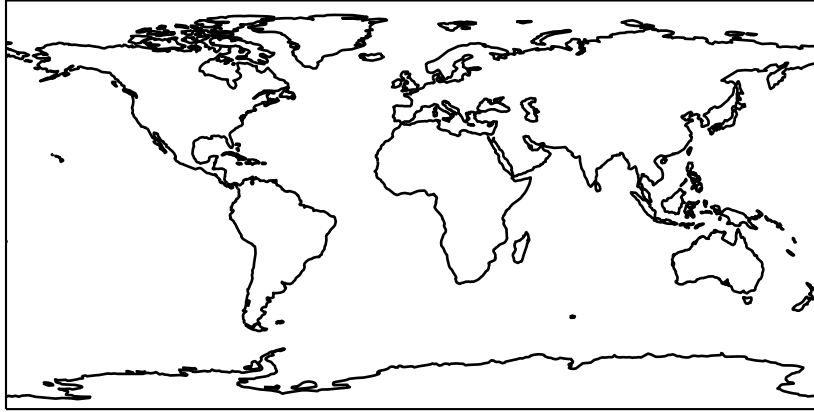


Ratio  
Dev/Ref, Fixed Range



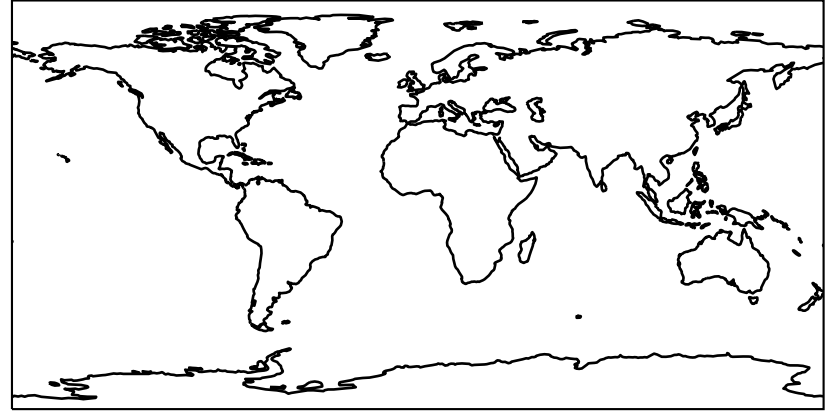
# EmisALD2\_Ship (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



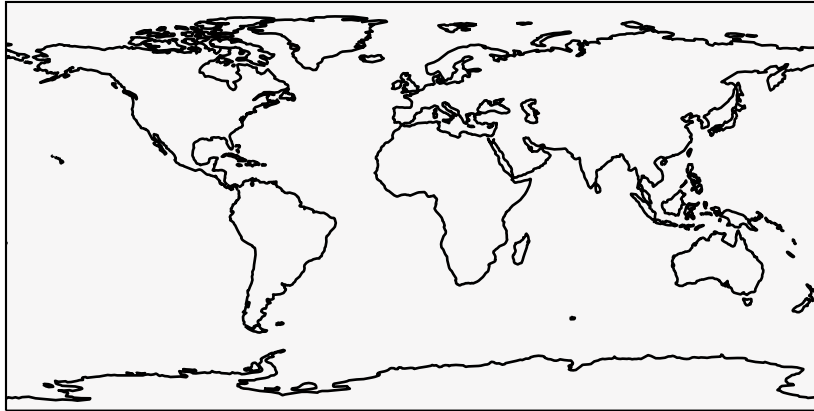
Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



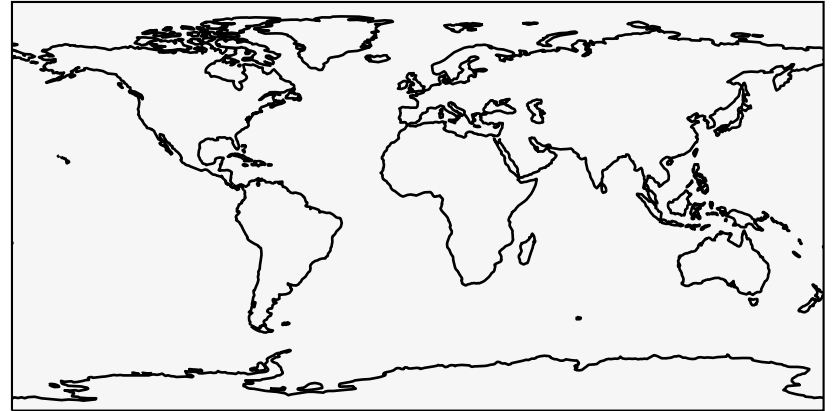
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



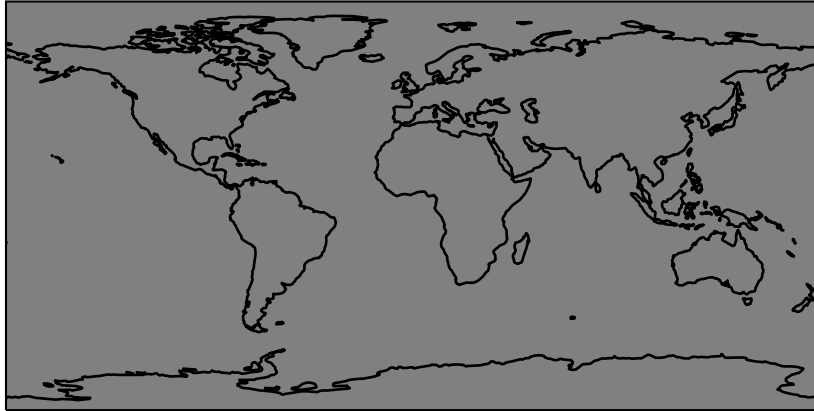
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

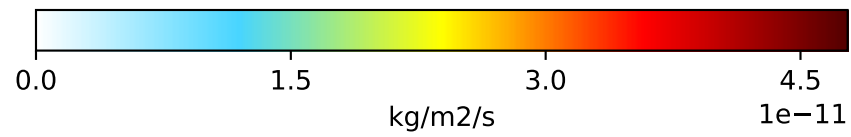
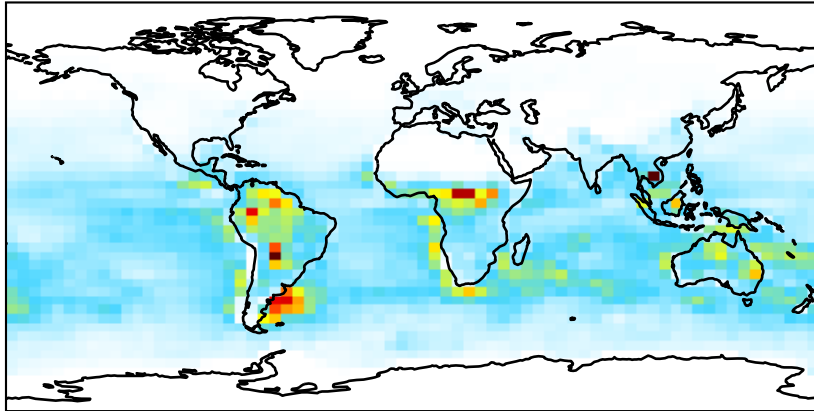
Ratio  
Dev/Ref, Fixed Range



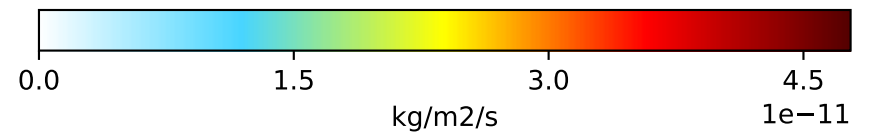
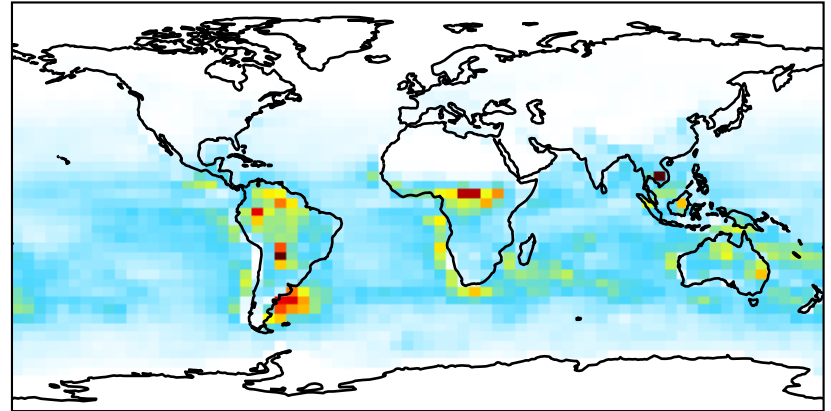
Undefined throughout domain  
unitless

# EmisALD2\_Total (Jan2019)

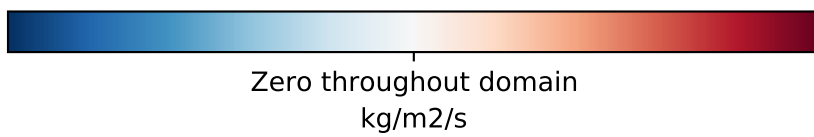
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



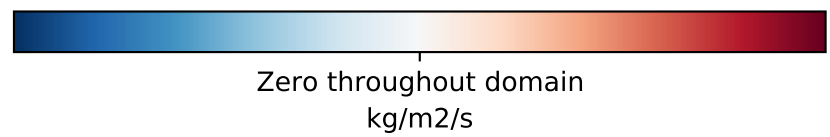
GCC\_13.0.0 (Dev)  
4.0x5.0



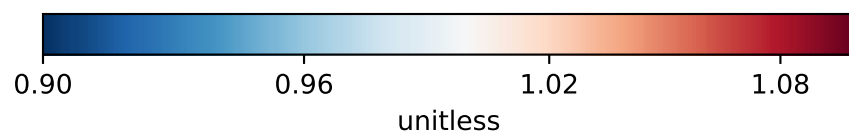
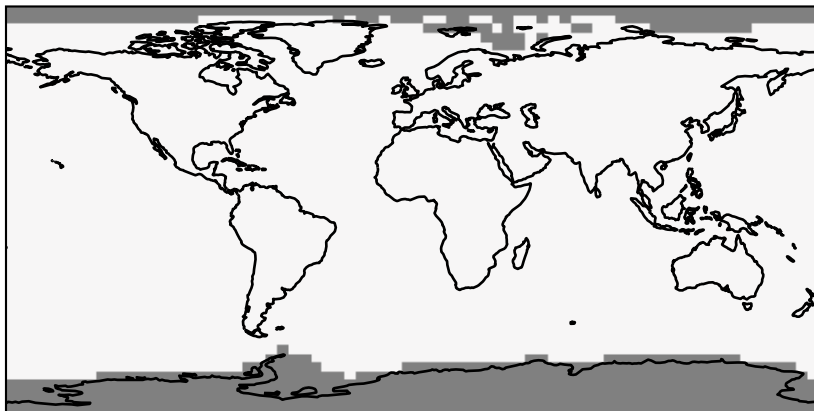
Difference  
Dev - Ref, Dynamic Range



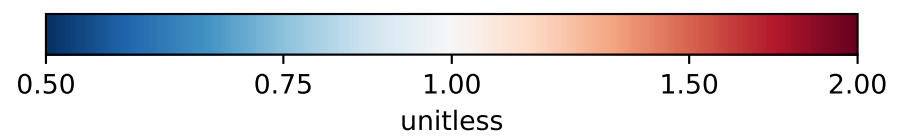
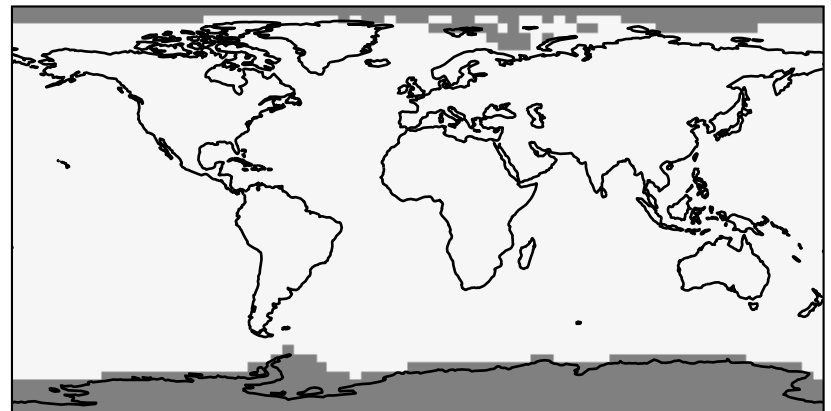
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

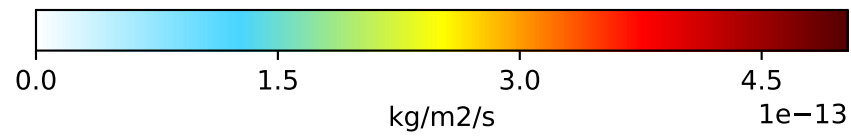
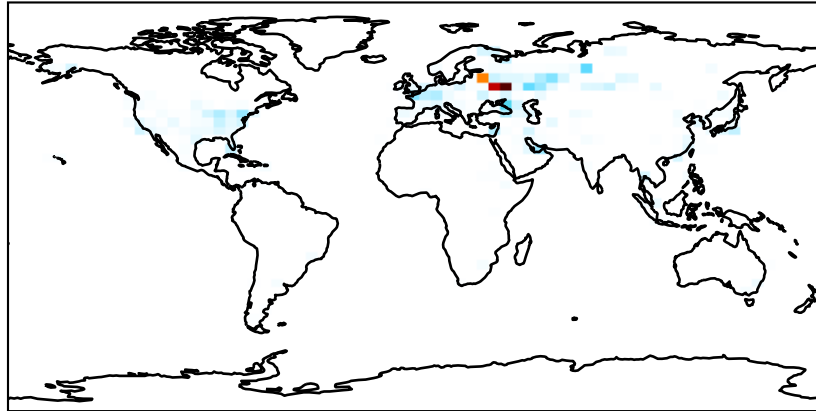


Ratio  
Dev/Ref, Fixed Range

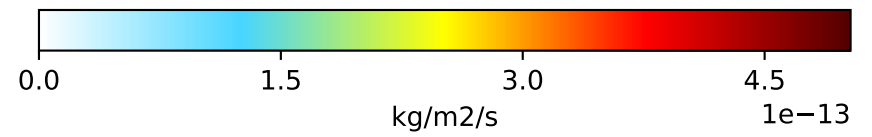
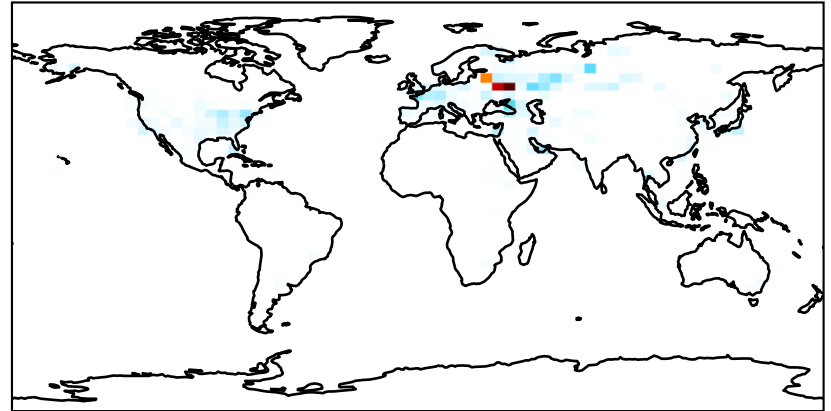


# EmisCH2O\_Aircraft (Jan2019)

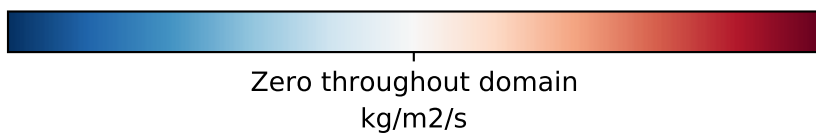
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



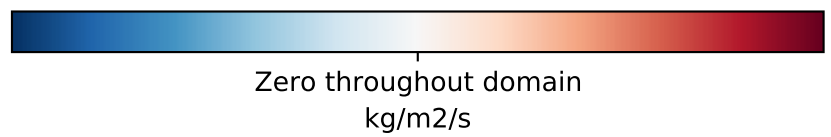
GCC\_13.0.0 (Dev)  
4.0x5.0



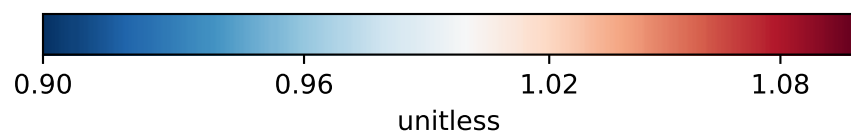
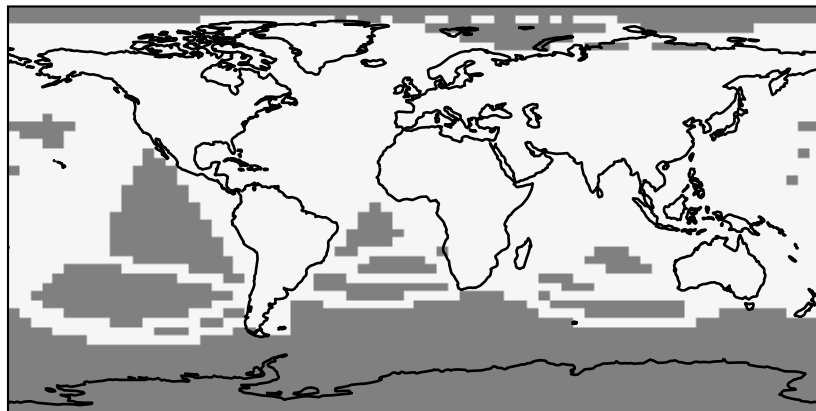
Difference  
Dev - Ref, Dynamic Range



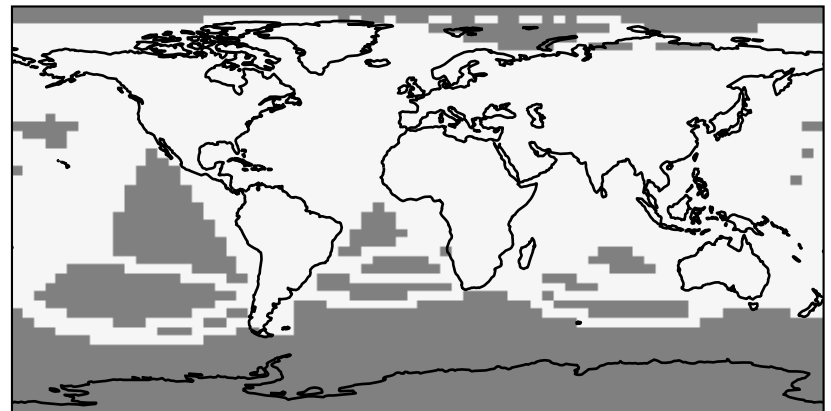
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



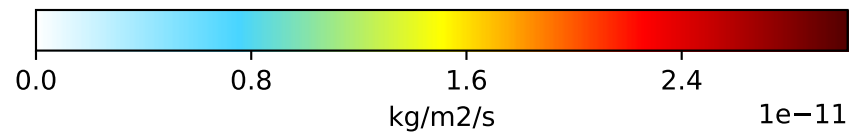
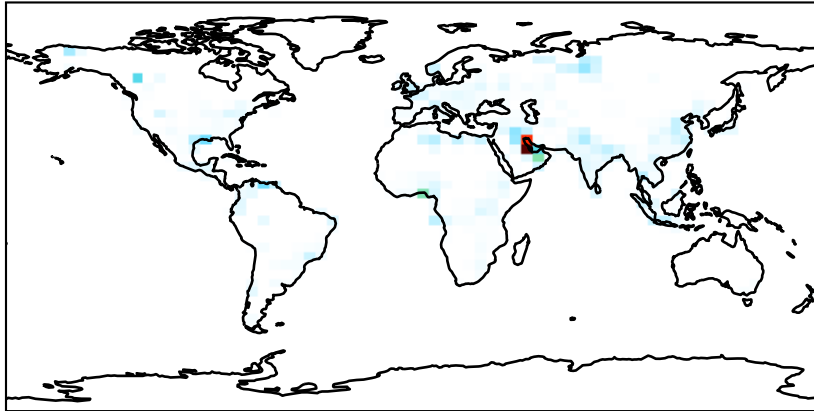
Ratio  
Dev/Ref, Fixed Range



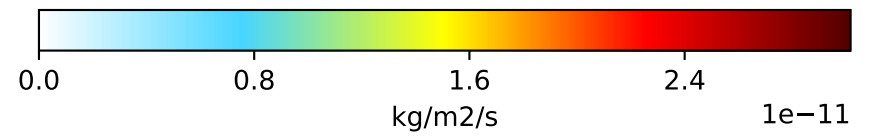
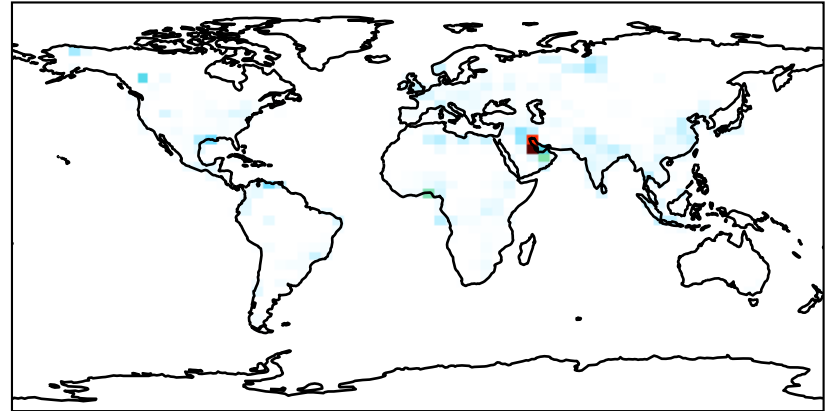


# EmisCH2O\_Anthro (Jan2019)

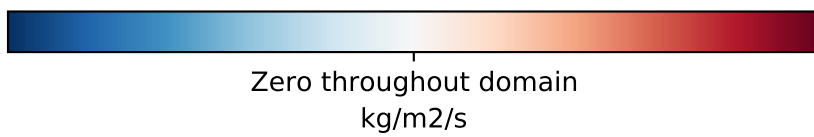
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



GCC\_13.0.0 (Dev)  
4.0x5.0



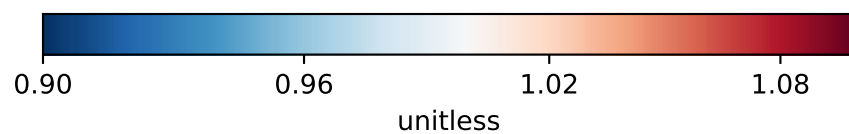
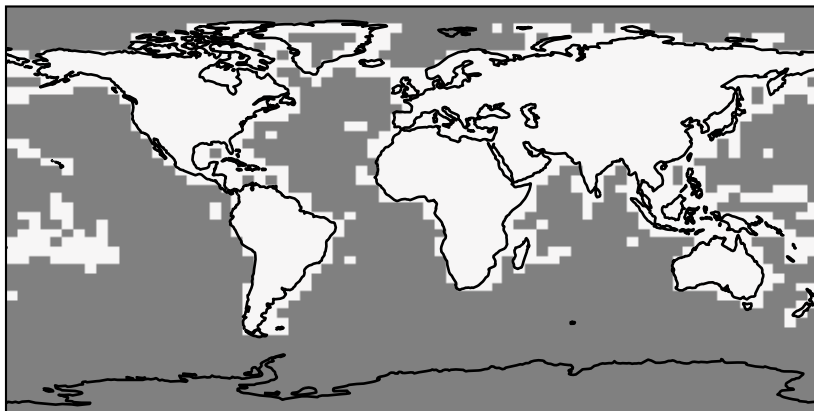
Difference  
Dev - Ref, Dynamic Range



Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

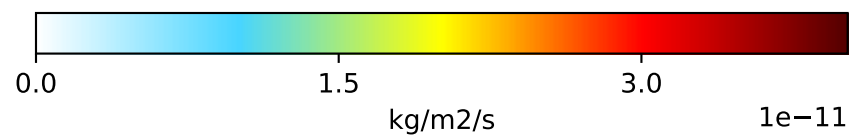
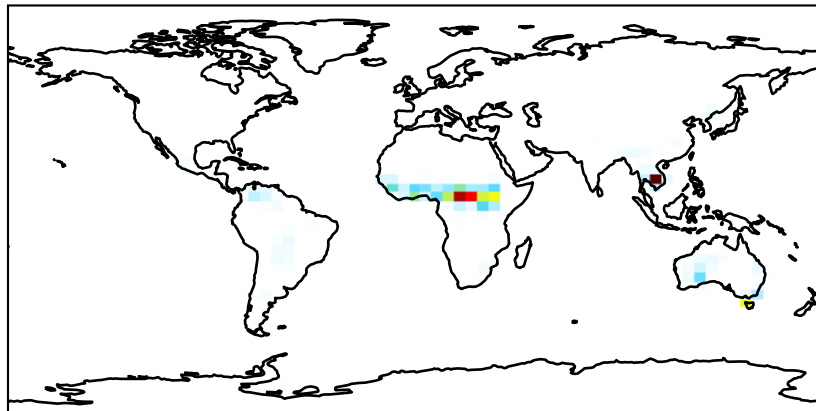


Ratio  
Dev/Ref, Fixed Range

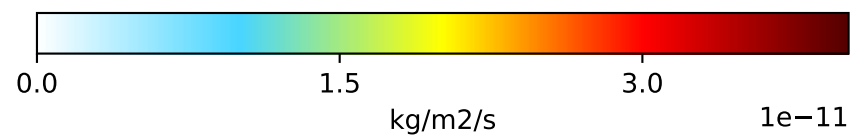
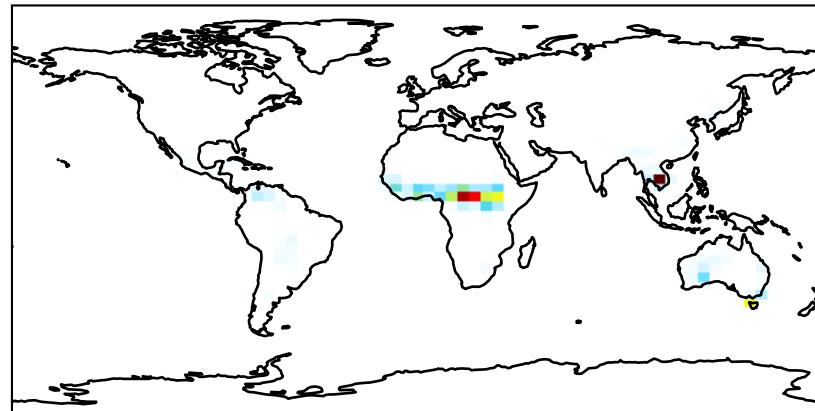


# EmisCH2O\_BioBurn (Jan2019)

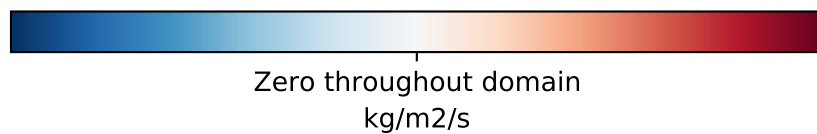
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



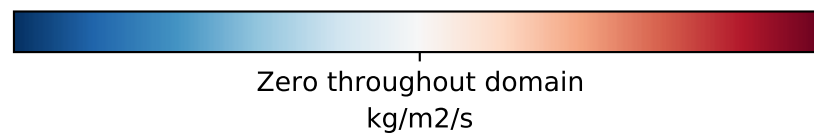
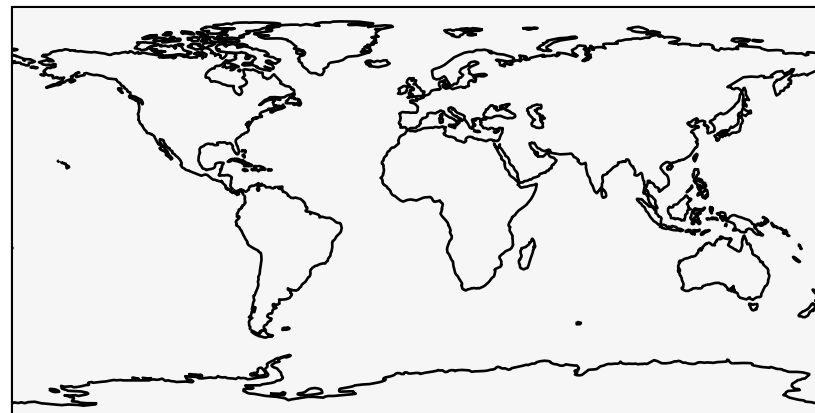
GCC\_13.0.0 (Dev)  
4.0x5.0



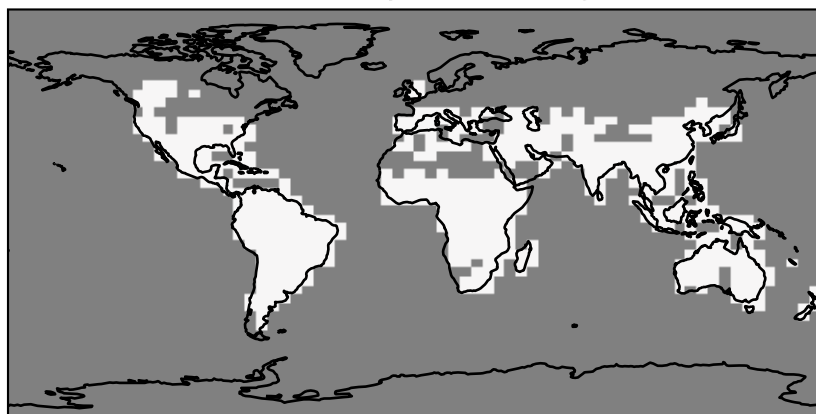
Difference  
Dev - Ref, Dynamic Range



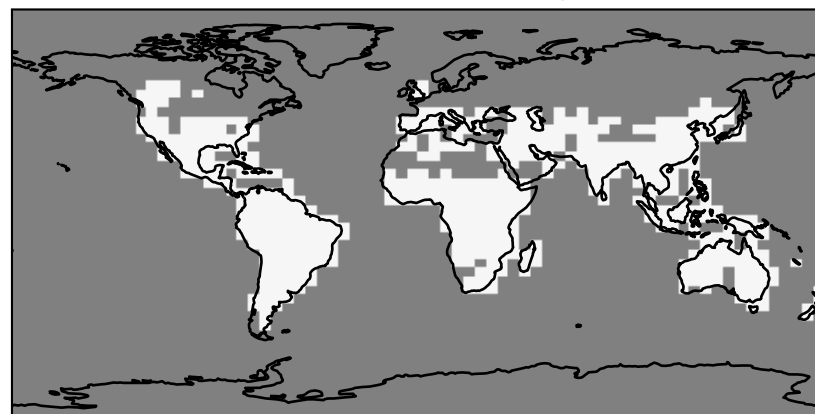
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range



# EmisCH2O\_Ship (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



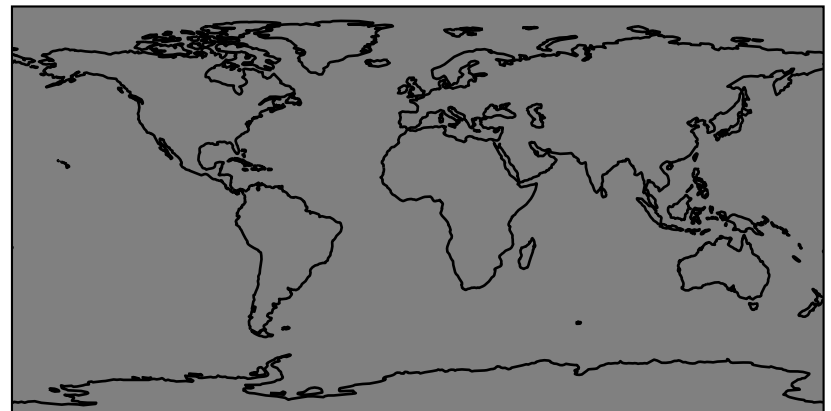
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

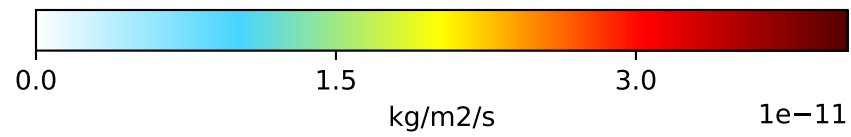
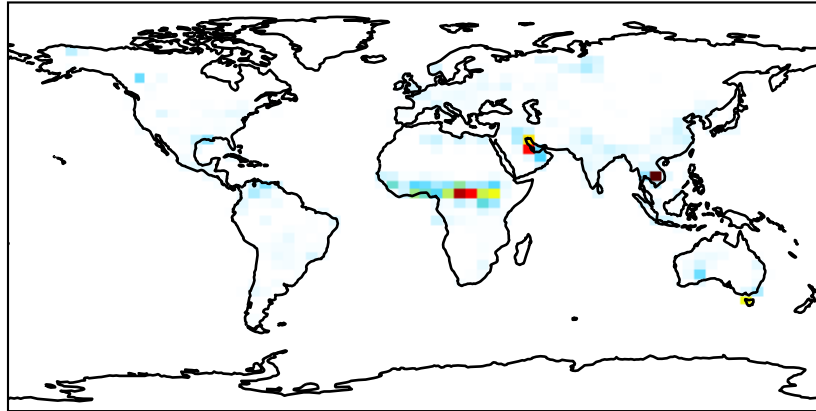
Ratio  
Dev/Ref, Fixed Range



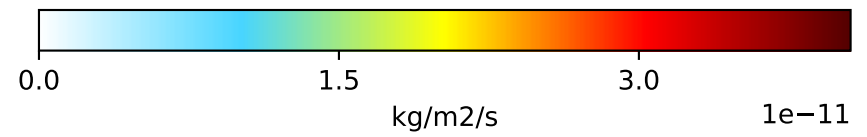
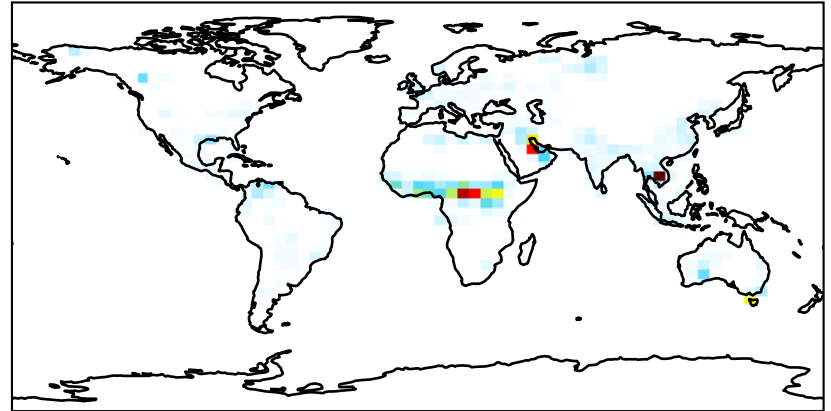
Undefined throughout domain  
unitless

# EmisCH2O\_Total (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



GCC\_13.0.0 (Dev)  
4.0x5.0



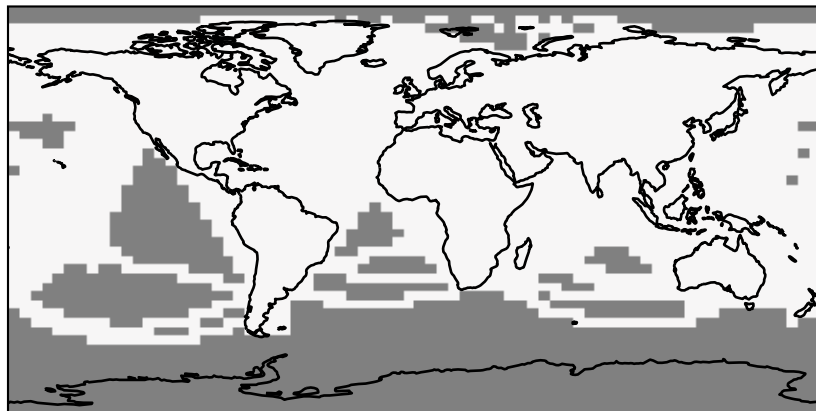
Difference  
Dev - Ref, Dynamic Range



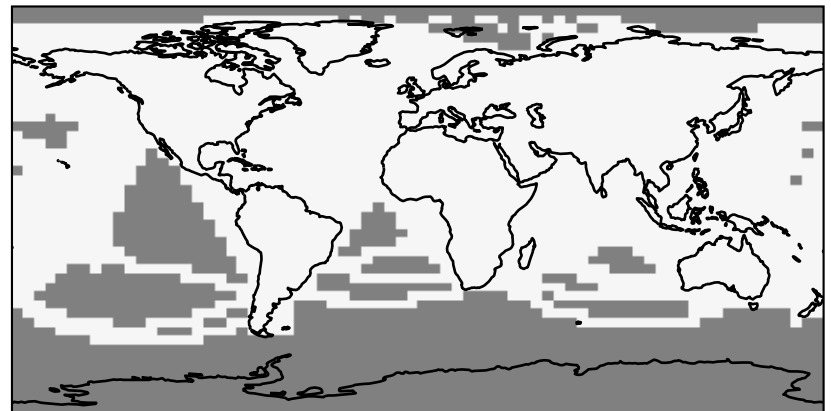
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

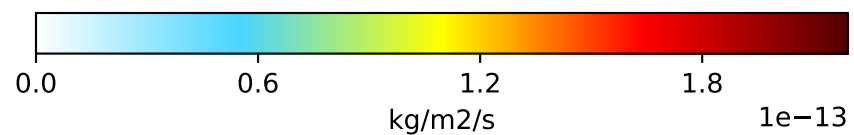
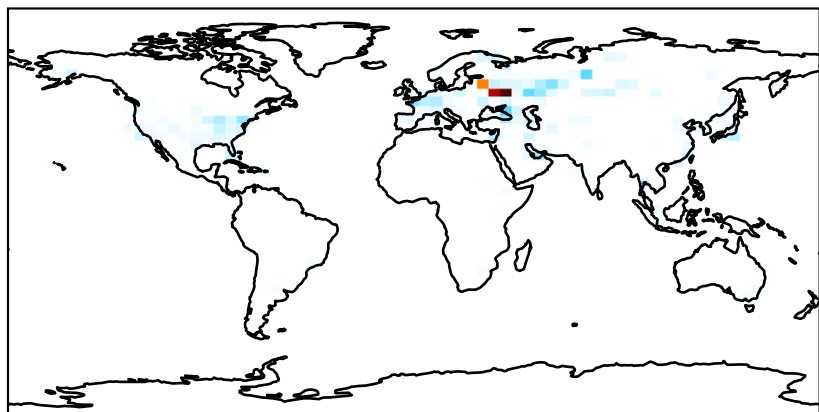


Ratio  
Dev/Ref, Fixed Range

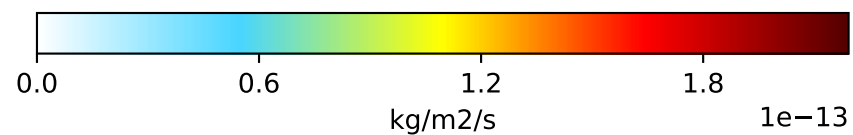
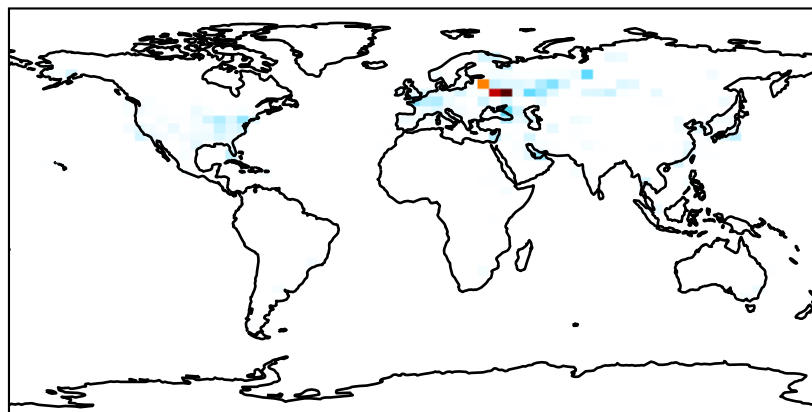


# EmisMACR\_Aircraft (Jan2019)

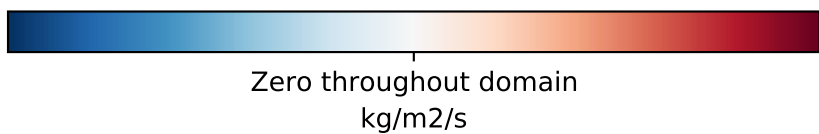
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



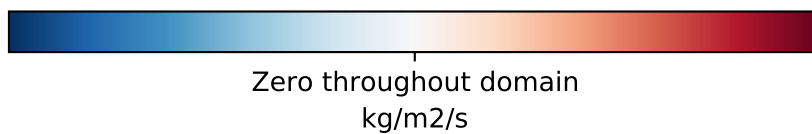
GCC\_13.0.0 (Dev)  
4.0x5.0



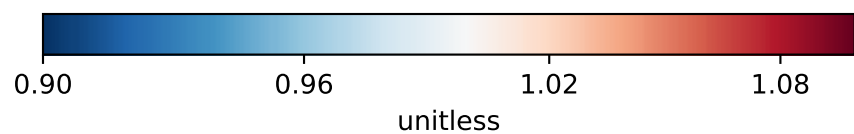
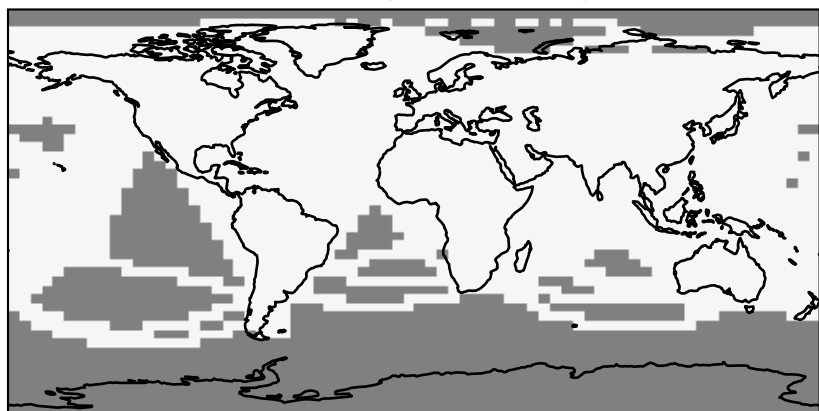
Difference  
Dev - Ref, Dynamic Range



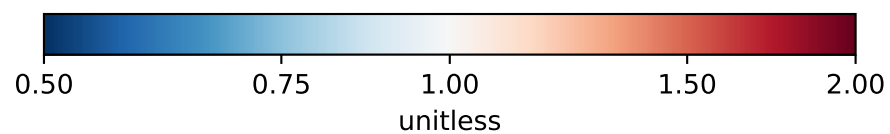
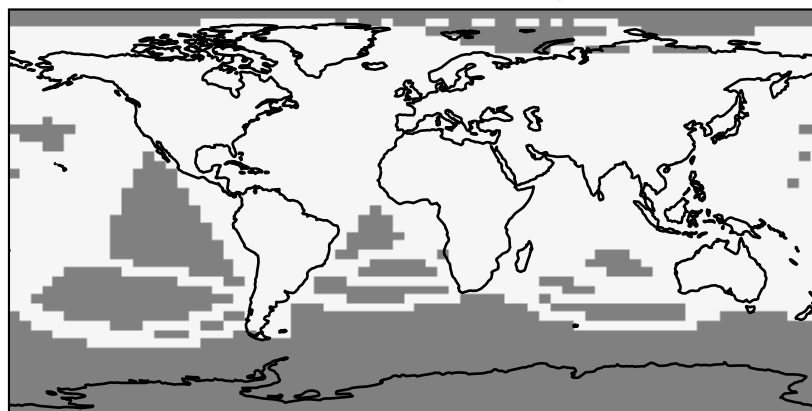
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range



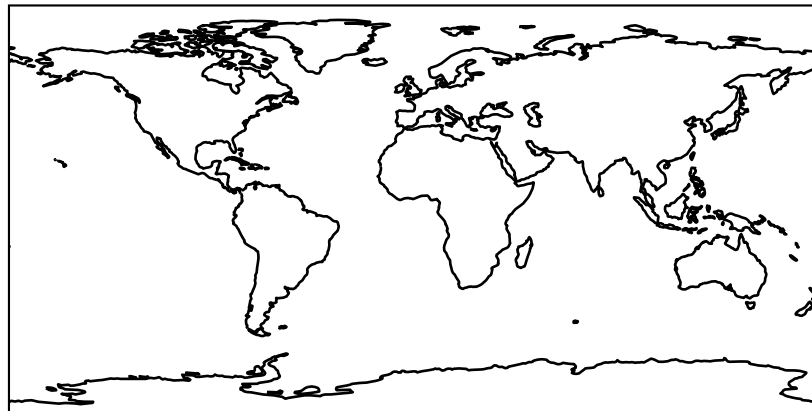
# EmisMACR\_Anthro (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



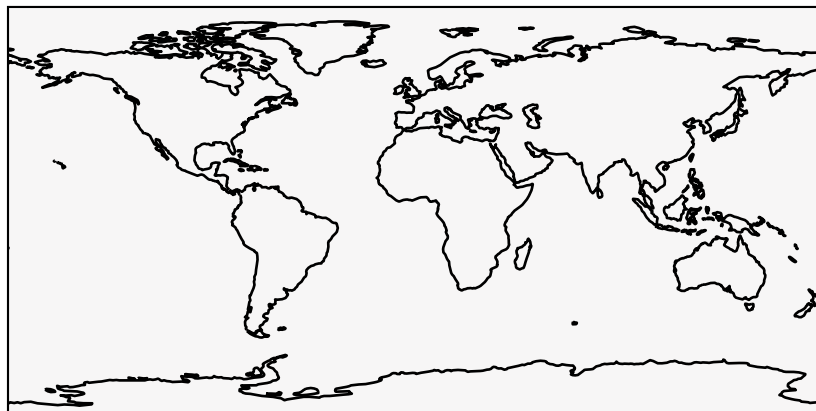
Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



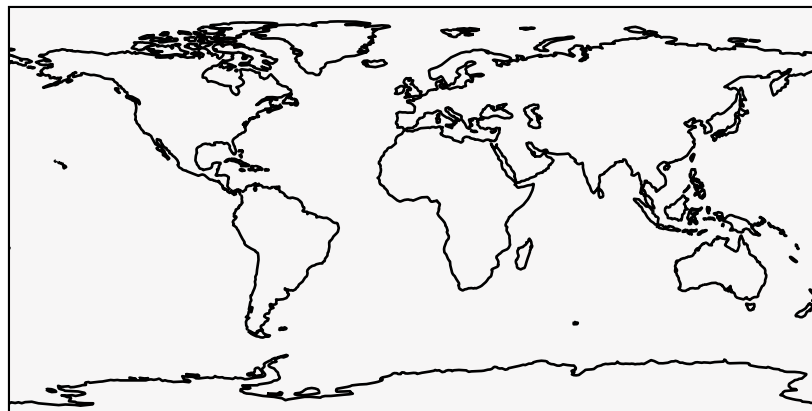
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



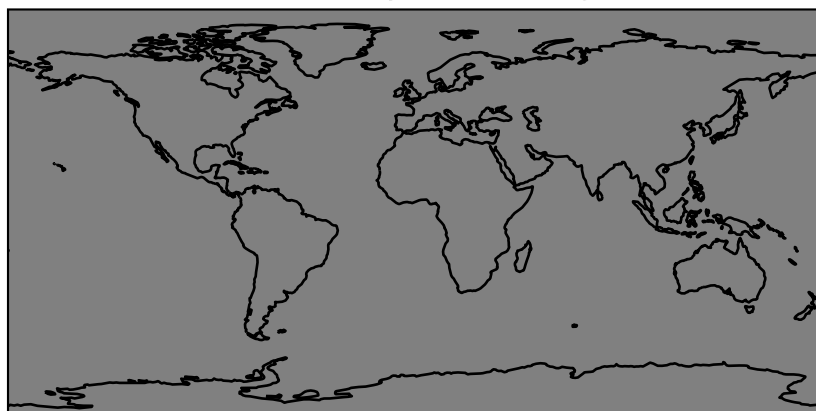
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



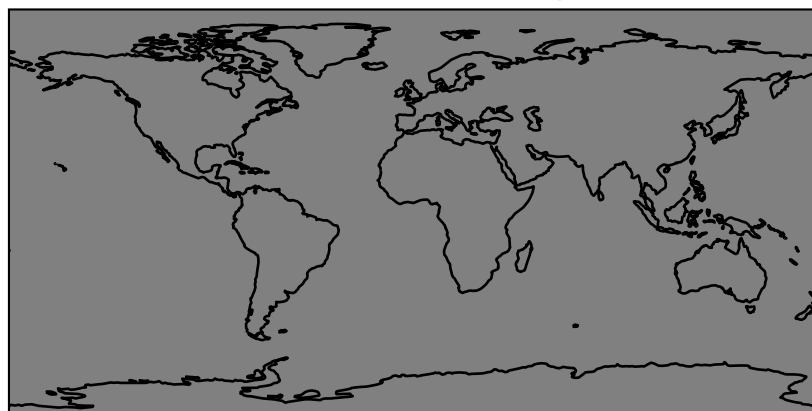
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

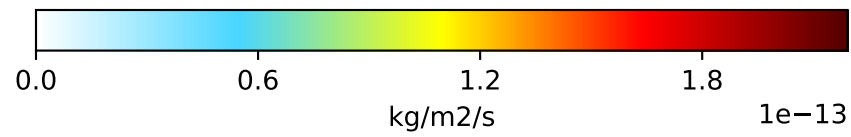
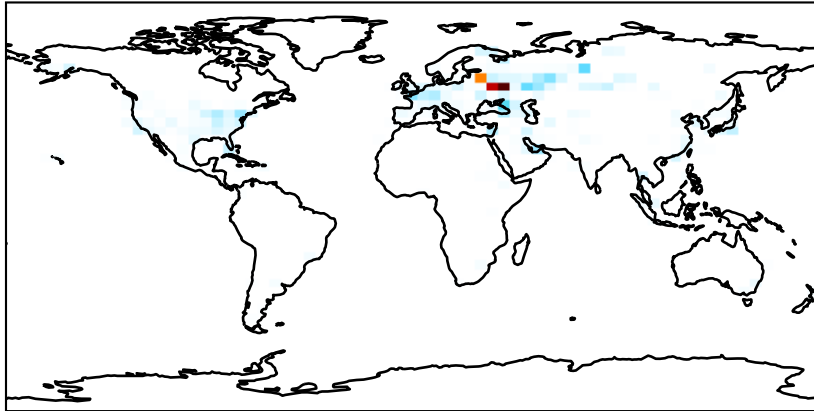
Ratio  
Dev/Ref, Fixed Range



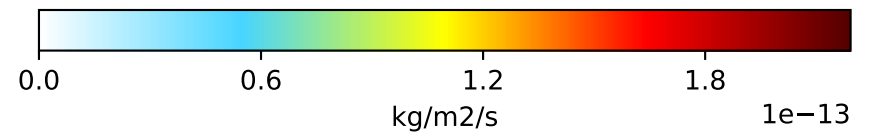
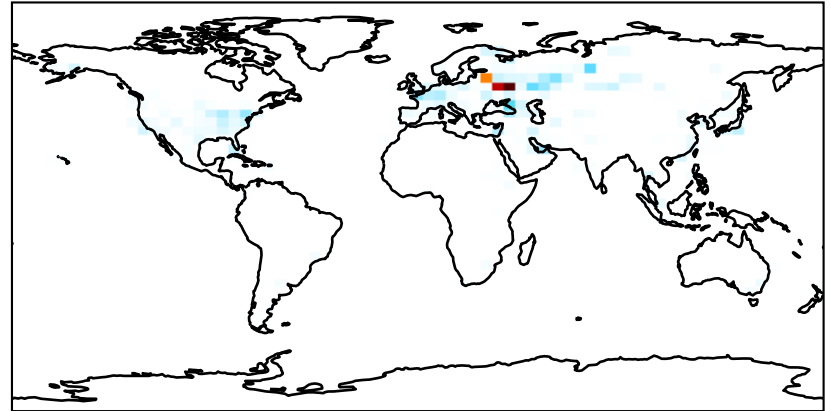
Undefined throughout domain  
unitless

# EmisMACR\_Total (Jan2019)

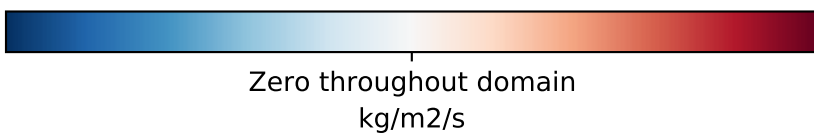
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



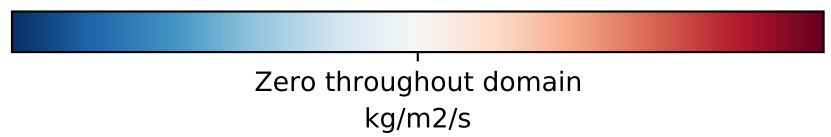
GCC\_13.0.0 (Dev)  
4.0x5.0



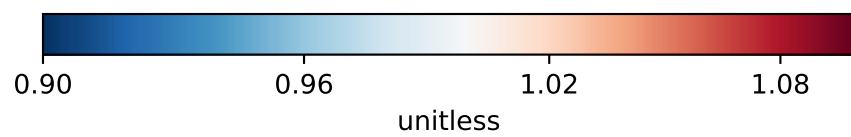
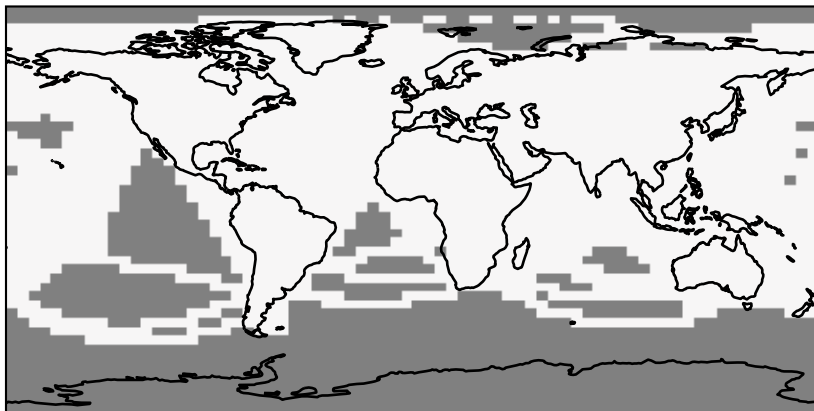
Difference  
Dev - Ref, Dynamic Range



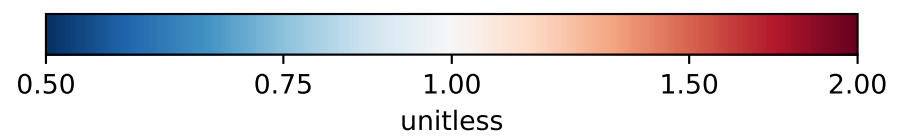
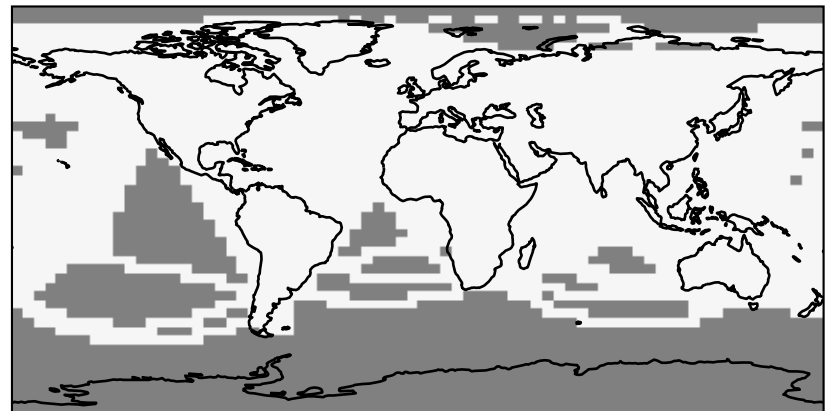
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range



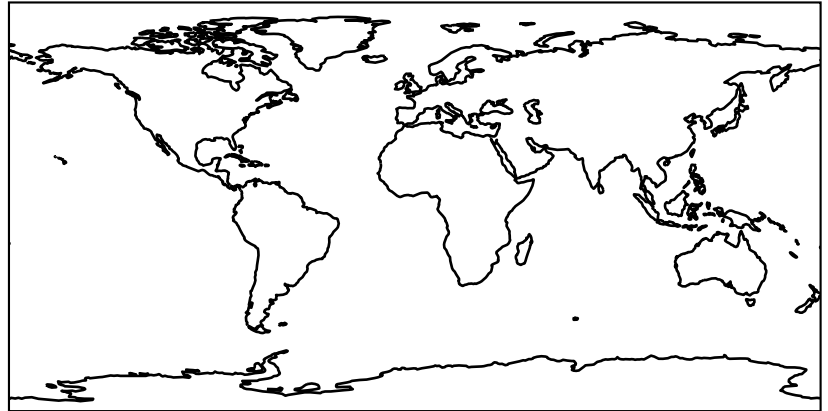
# EmisACET\_Anthro (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



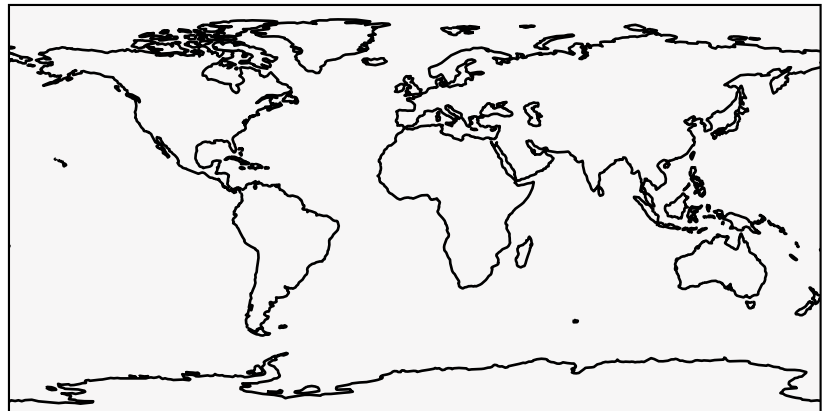
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



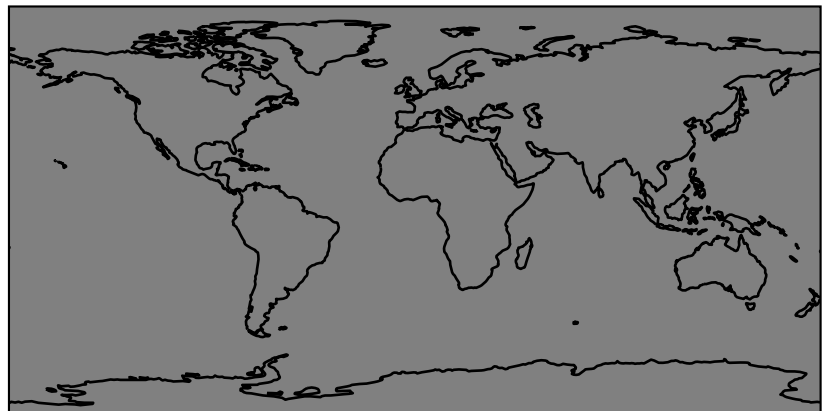
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

Ratio  
Dev/Ref, Fixed Range

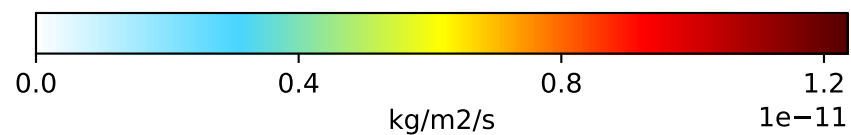
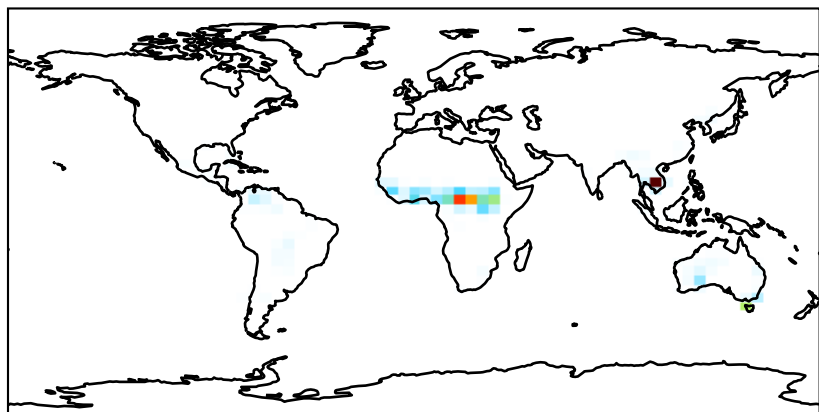


Undefined throughout domain  
unitless

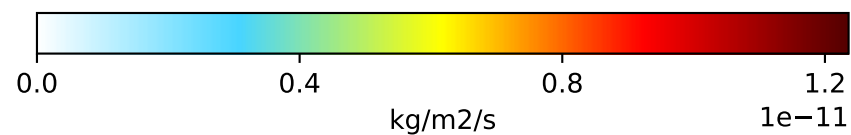
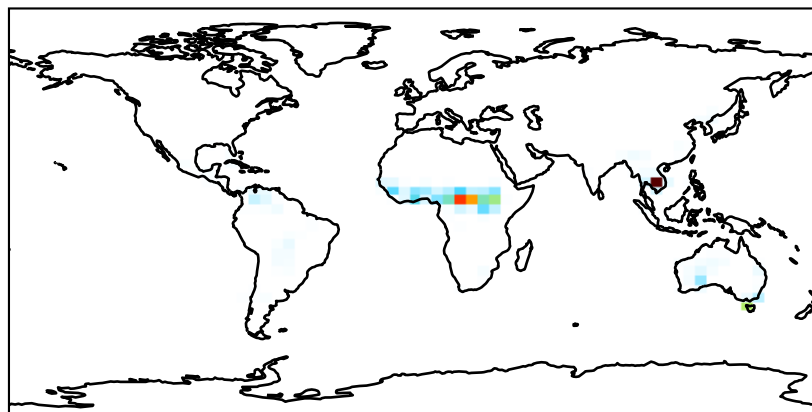


# EmisACET\_BioBurn (Jan2019)

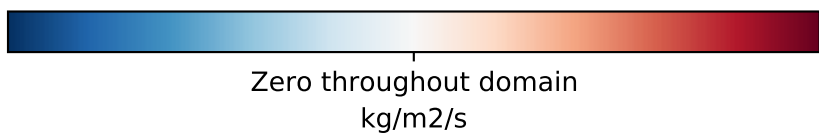
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



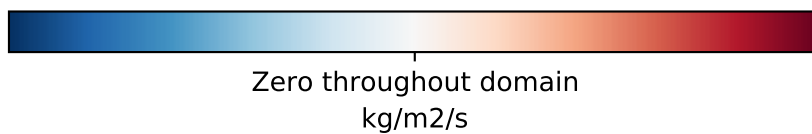
GCC\_13.0.0 (Dev)  
4.0x5.0



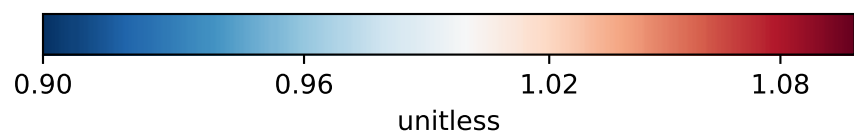
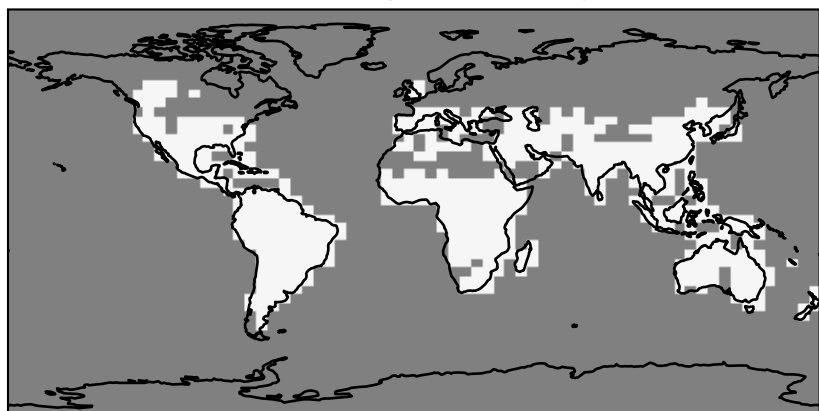
Difference  
Dev - Ref, Dynamic Range



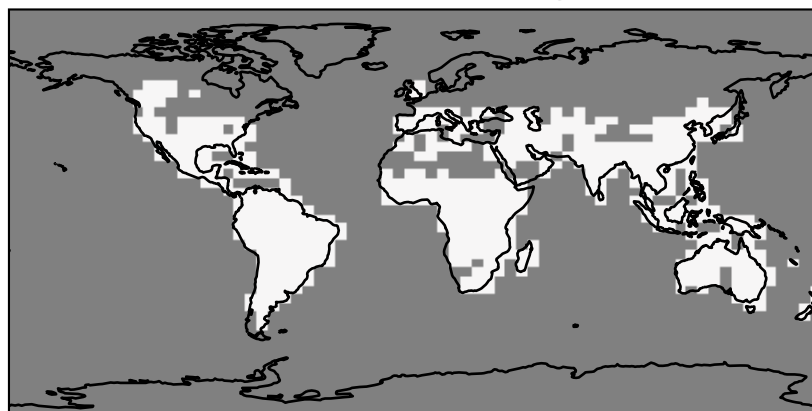
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

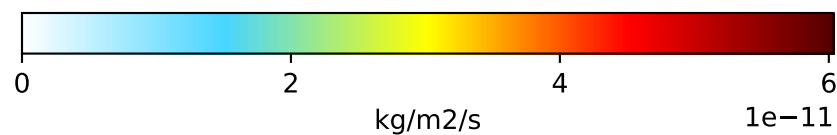
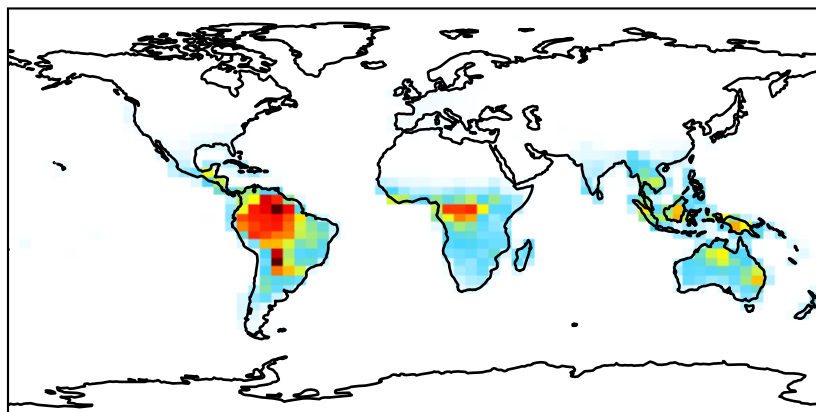


Ratio  
Dev/Ref, Fixed Range

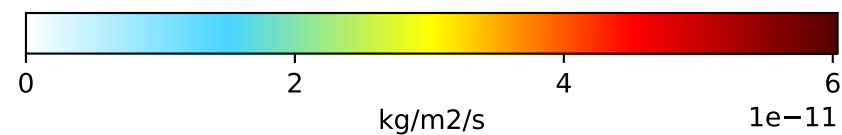
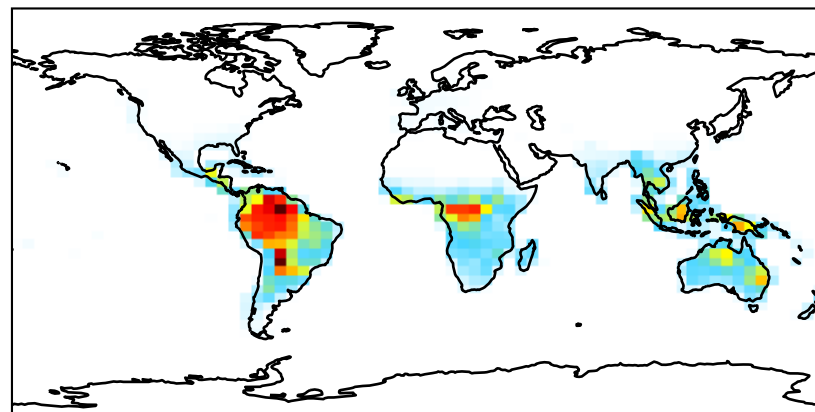


# EmisACET\_Biogenic (Jan2019)

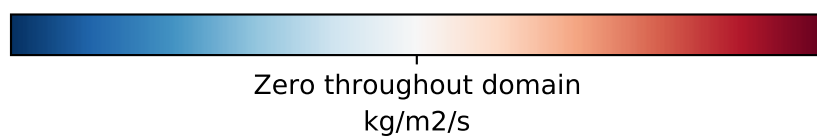
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



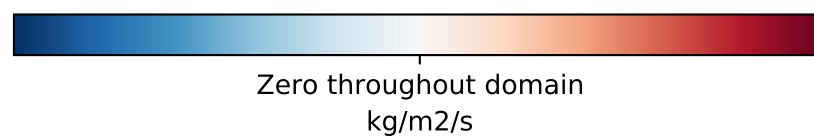
GCC\_13.0.0 (Dev)  
4.0x5.0



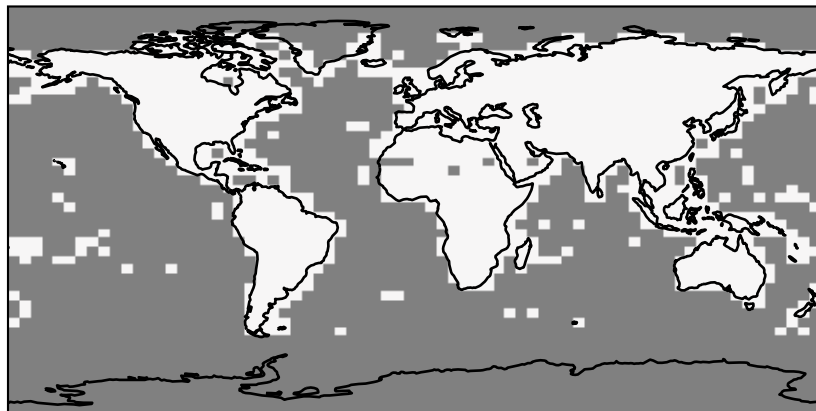
Difference  
Dev - Ref, Dynamic Range



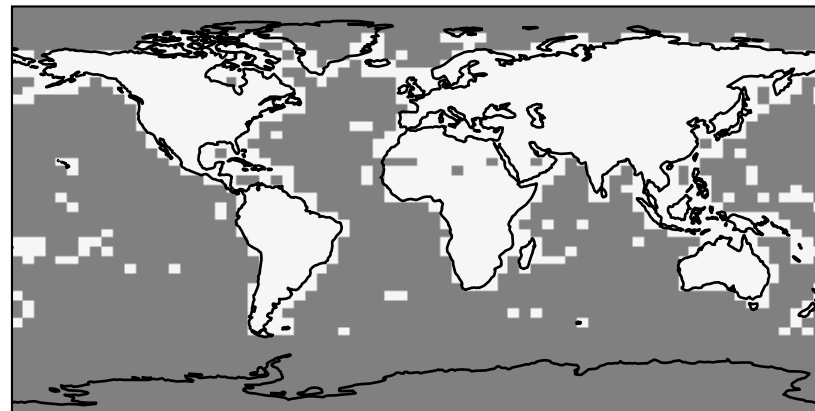
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

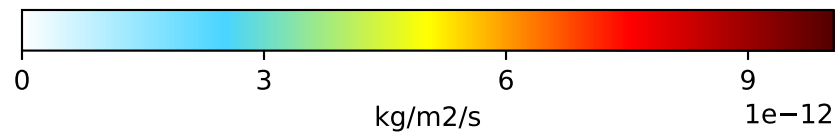
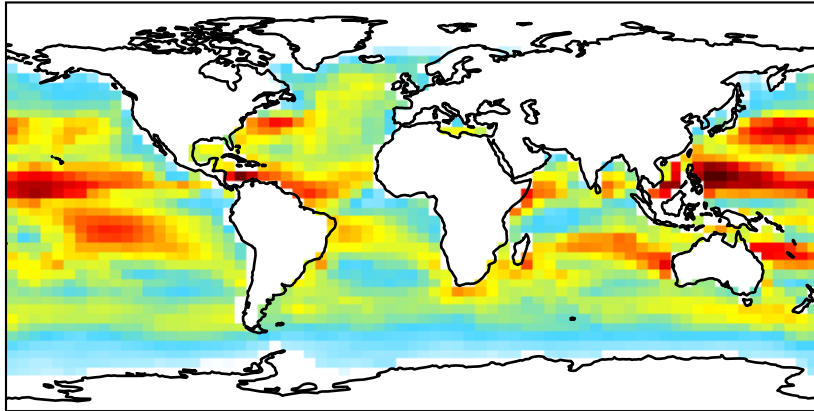


Ratio  
Dev/Ref, Fixed Range

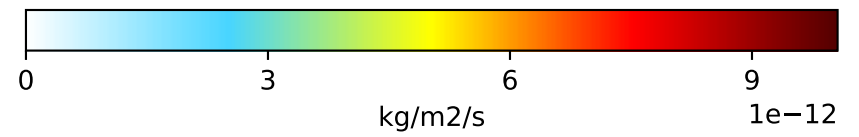
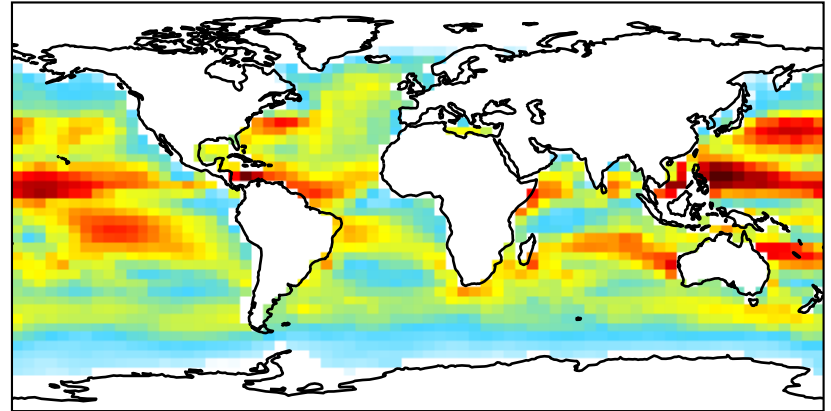


# EmisACET\_Ocean (Jan2019)

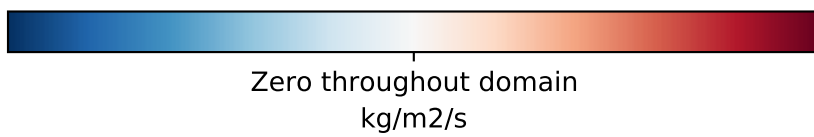
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



GCC\_13.0.0 (Dev)  
4.0x5.0



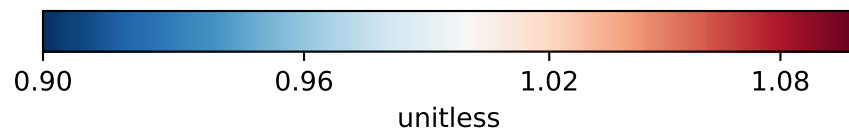
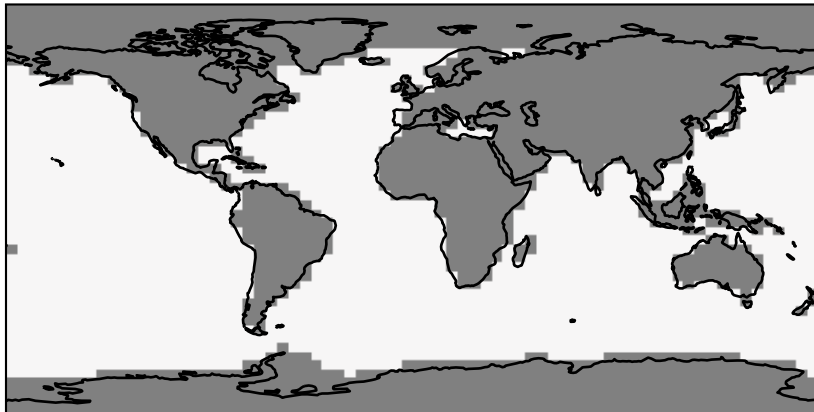
Difference  
Dev - Ref, Dynamic Range



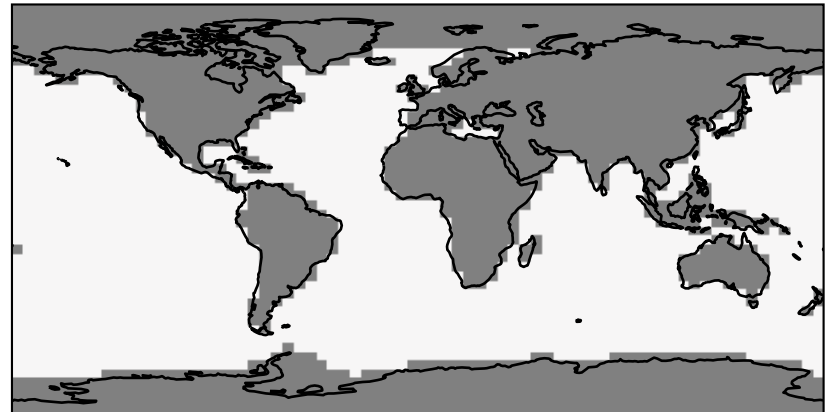
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

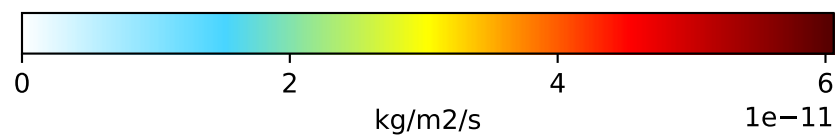
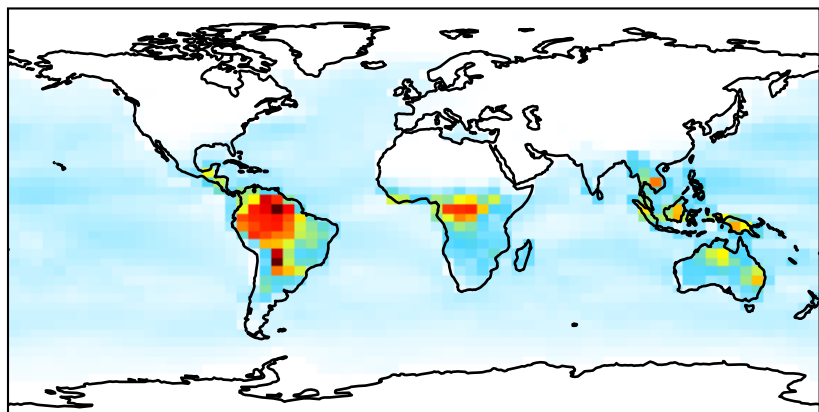


Ratio  
Dev/Ref, Fixed Range

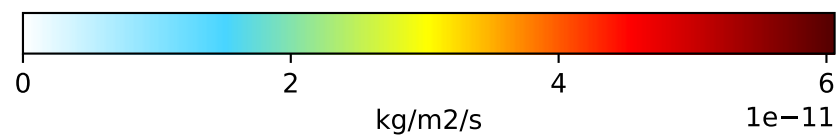
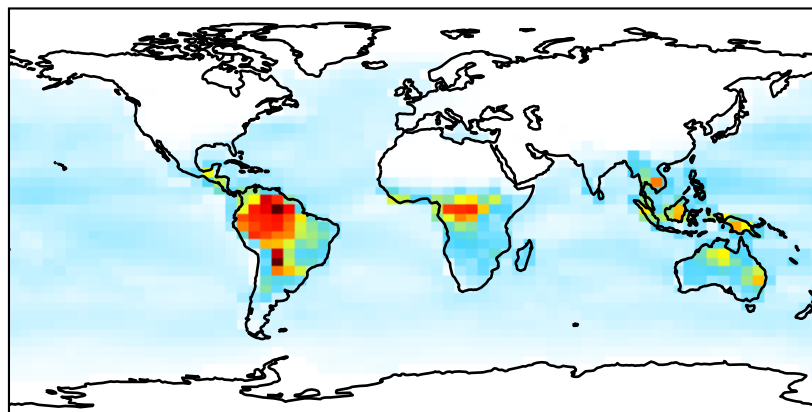


# EmisACET\_Total (Jan2019)

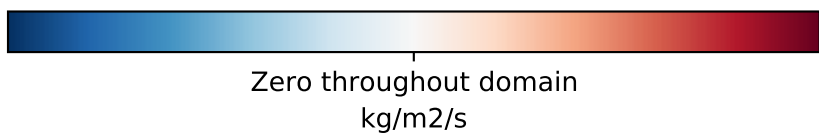
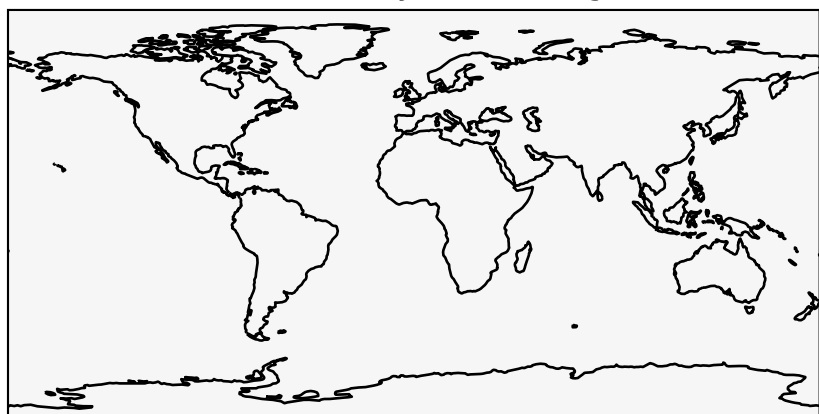
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



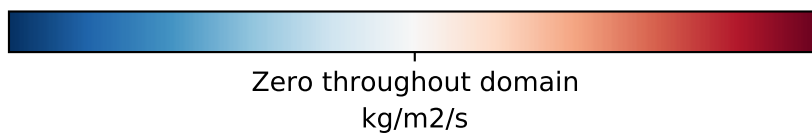
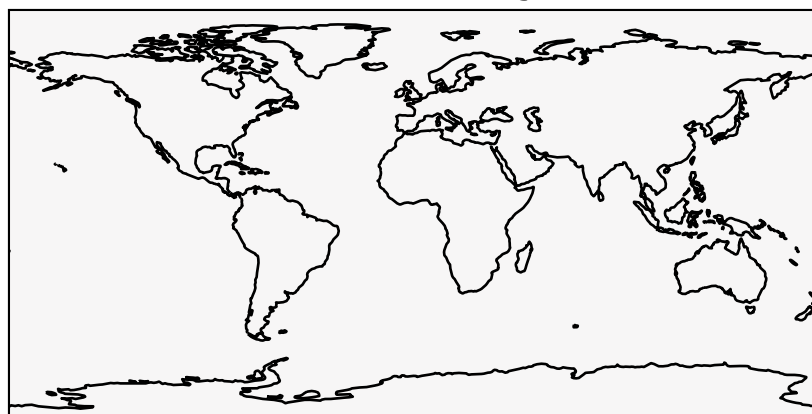
GCC\_13.0.0 (Dev)  
4.0x5.0



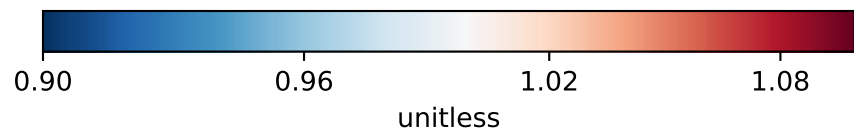
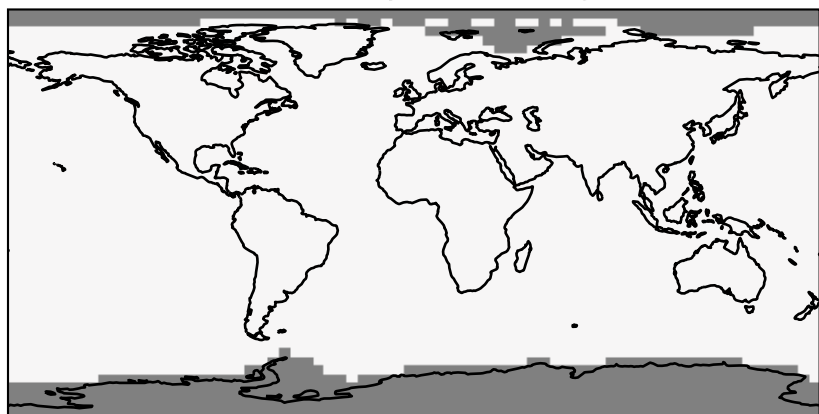
Difference  
Dev - Ref, Dynamic Range



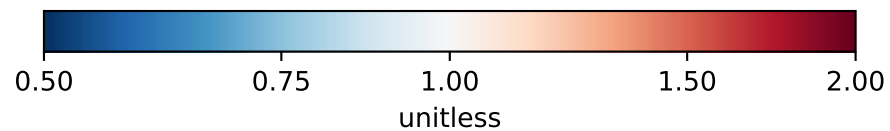
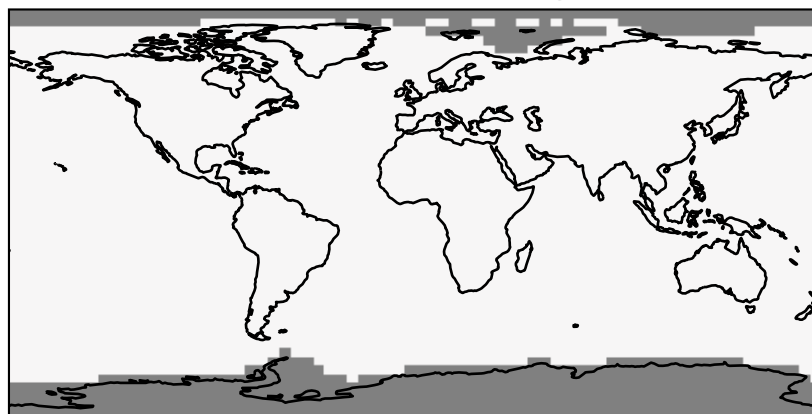
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

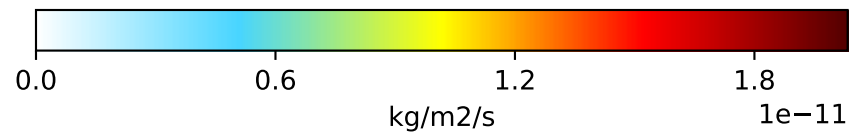
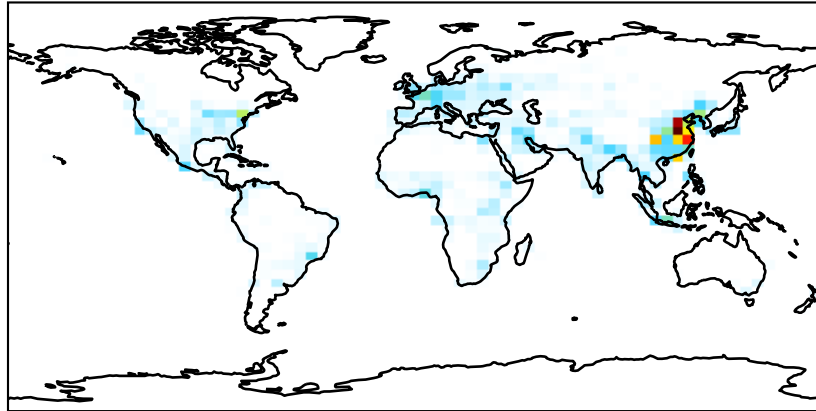


Ratio  
Dev/Ref, Fixed Range

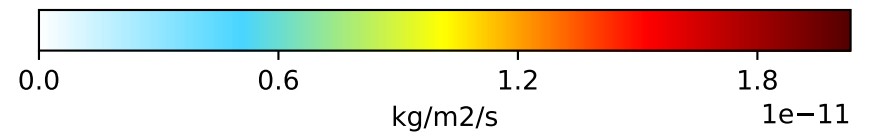
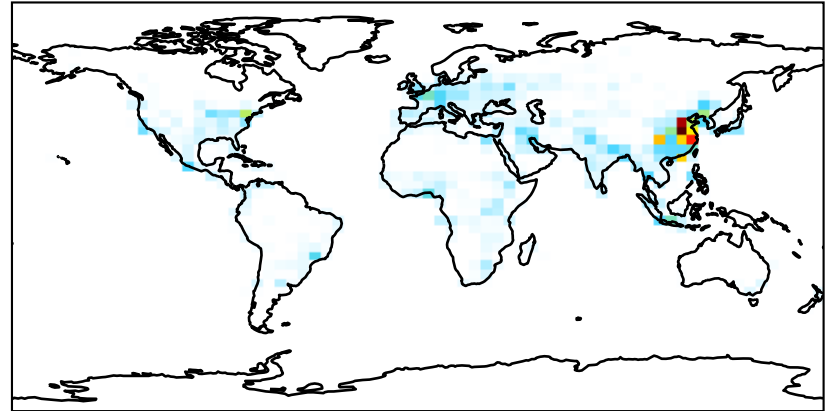


# EmisMEK\_Anthro (Jan2019)

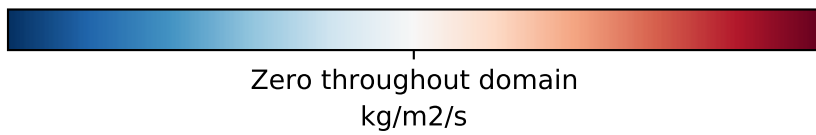
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



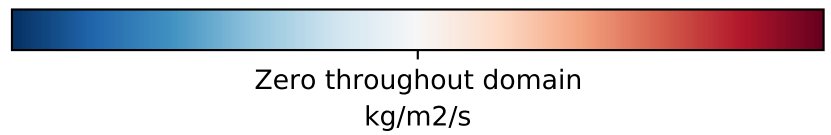
GCC\_13.0.0 (Dev)  
4.0x5.0



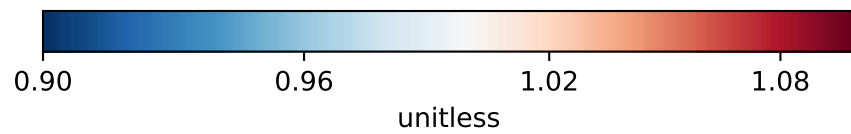
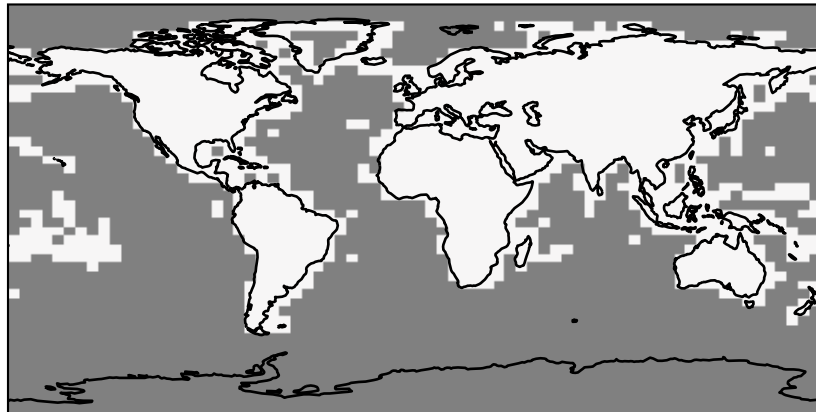
Difference  
Dev - Ref, Dynamic Range



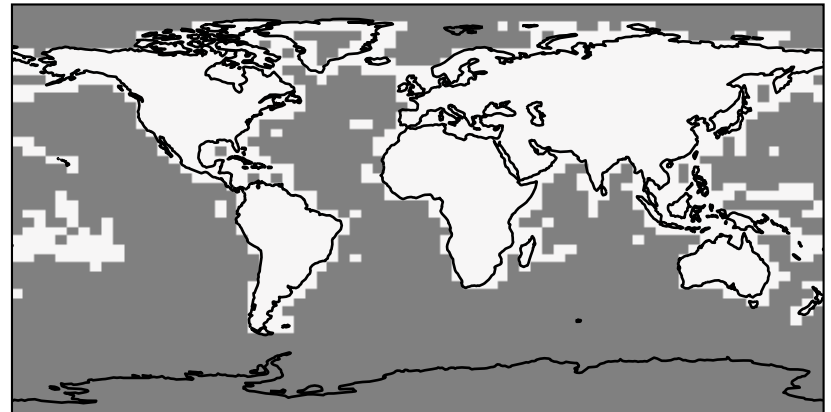
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

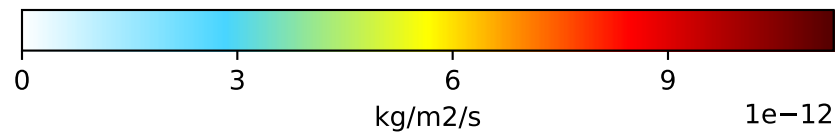
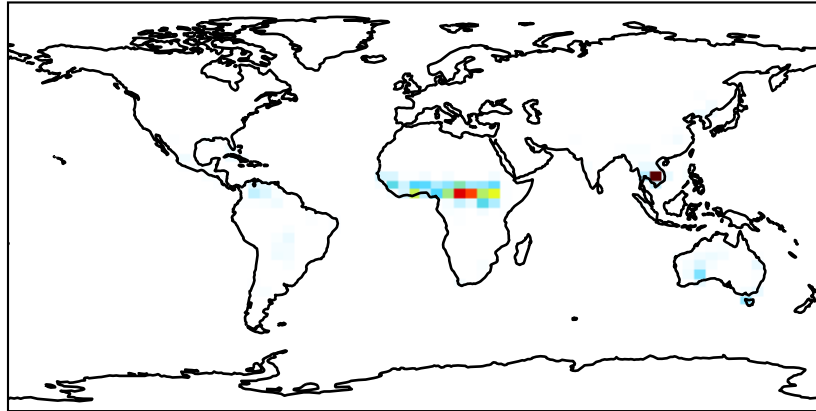


Ratio  
Dev/Ref, Fixed Range

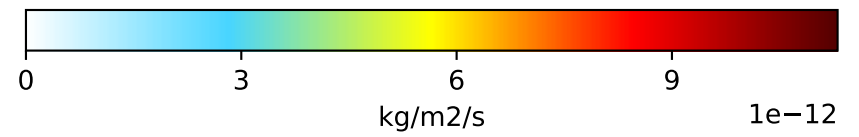
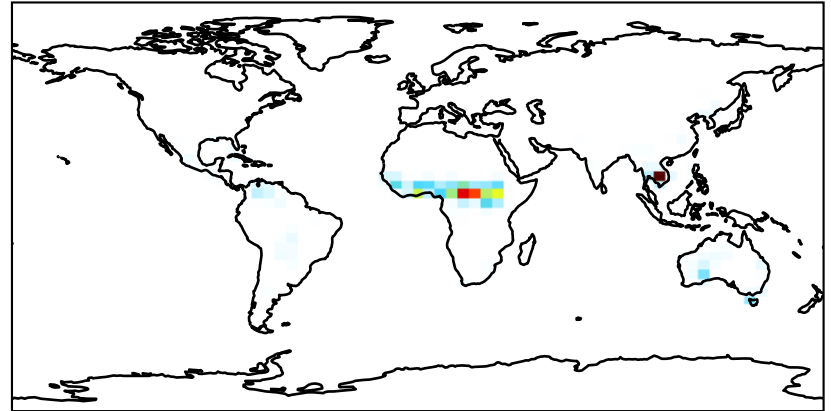


# EmisMEK\_BioBurn (Jan2019)

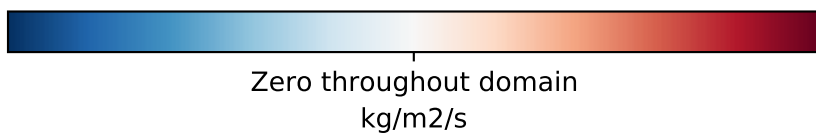
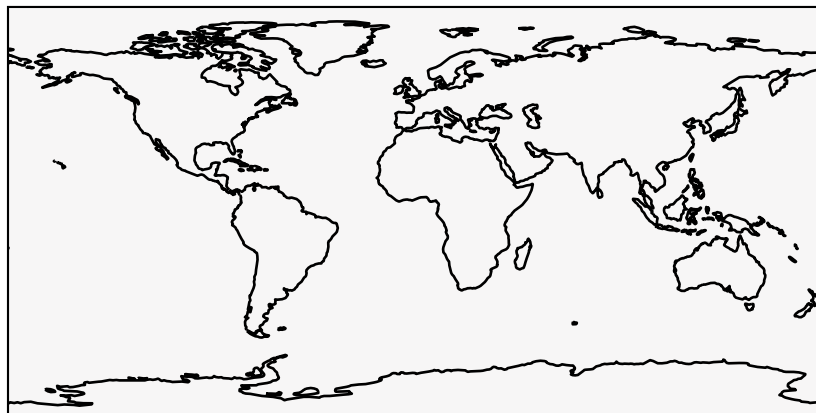
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



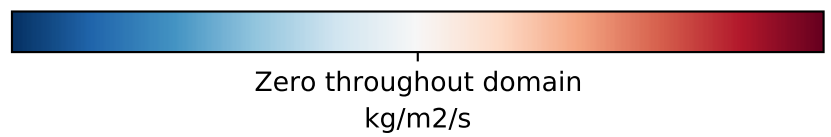
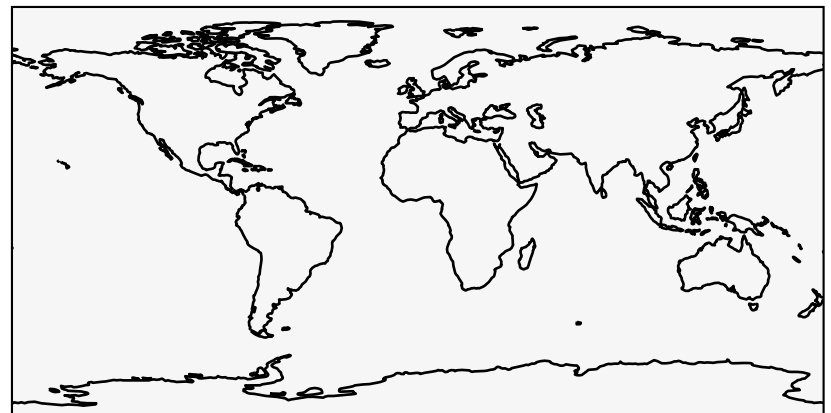
GCC\_13.0.0 (Dev)  
4.0x5.0



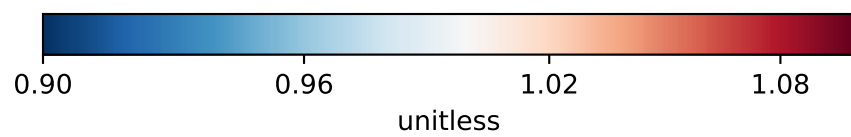
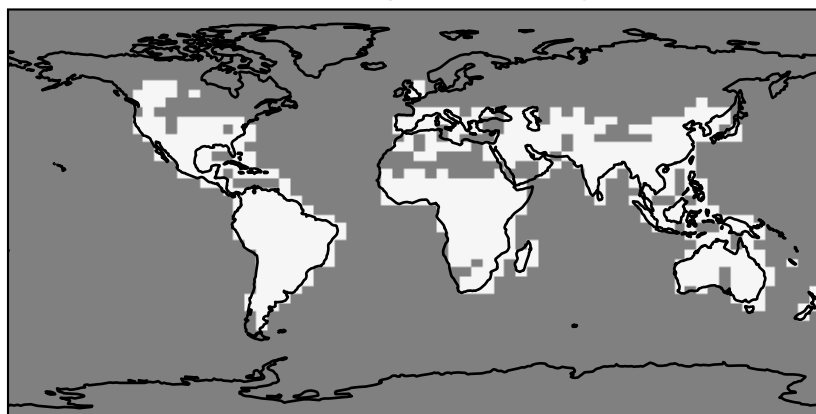
Difference  
Dev - Ref, Dynamic Range



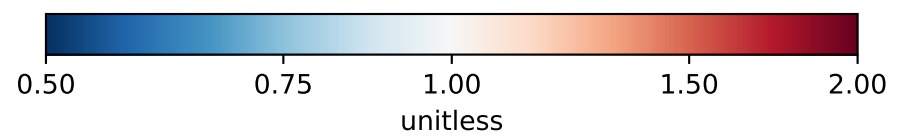
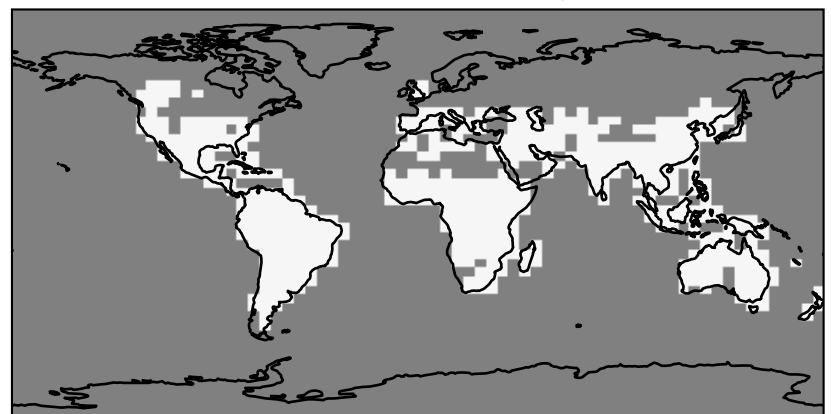
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

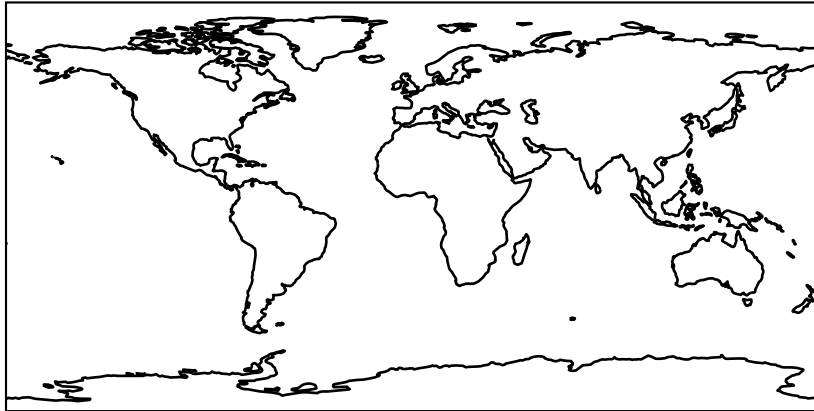


Ratio  
Dev/Ref, Fixed Range



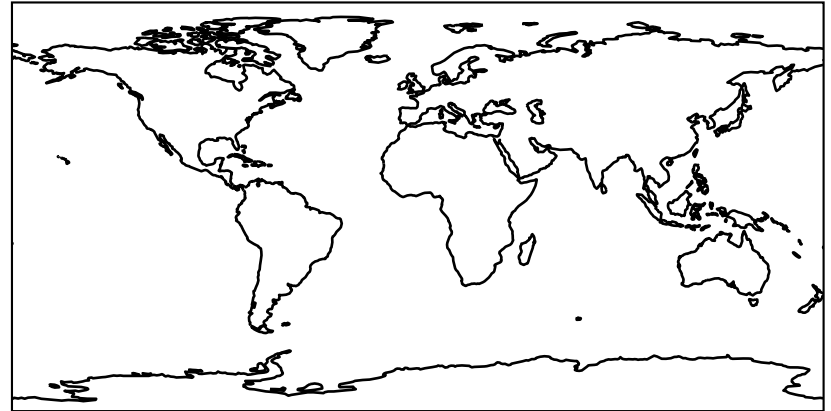
# EmisMEK\_Ship (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



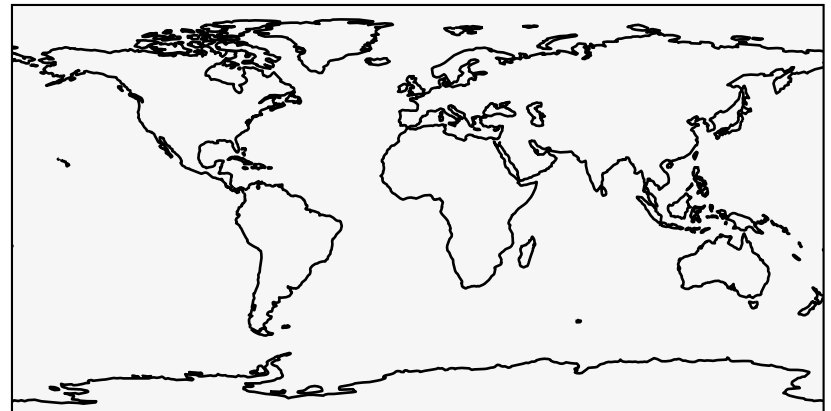
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



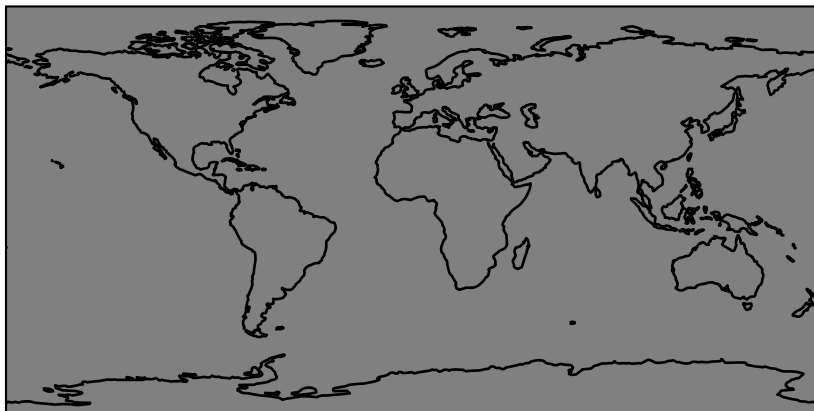
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



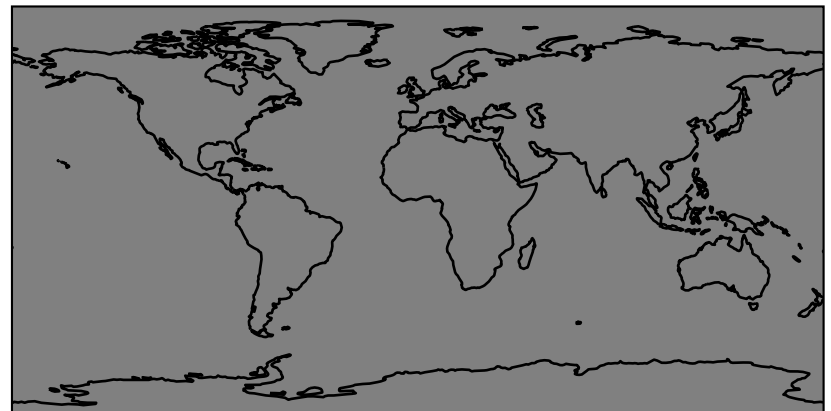
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

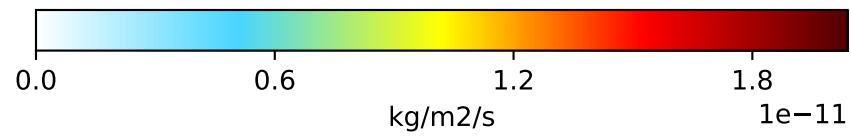
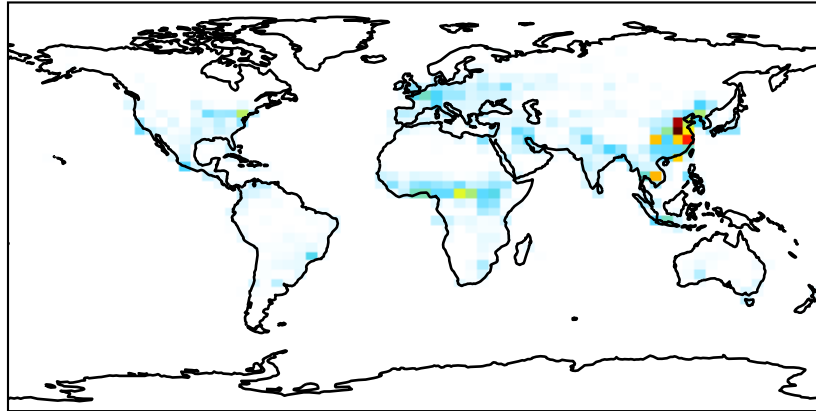
Ratio  
Dev/Ref, Fixed Range



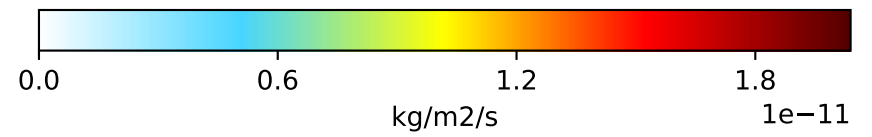
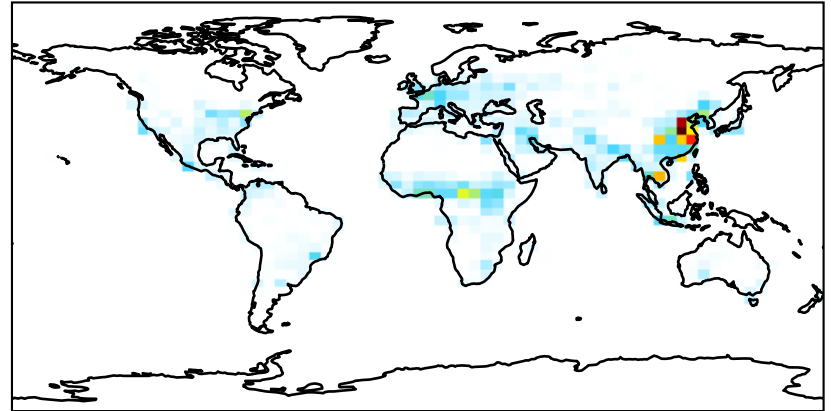
Undefined throughout domain  
unitless

# EmisMEK\_Total (Jan2019)

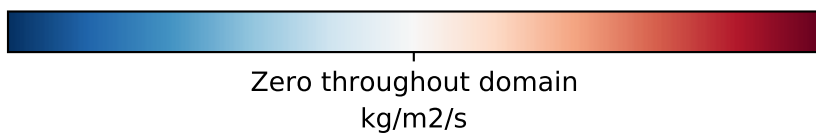
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



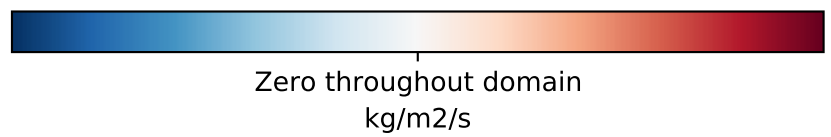
GCC\_13.0.0 (Dev)  
4.0x5.0



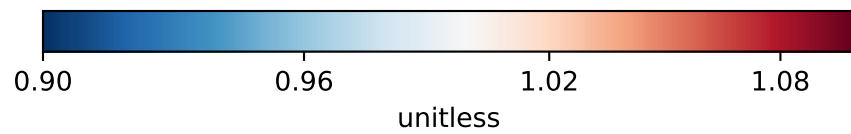
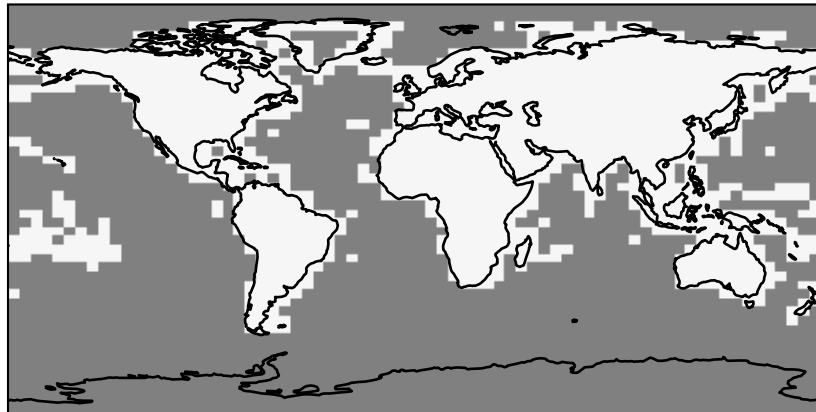
Difference  
Dev - Ref, Dynamic Range



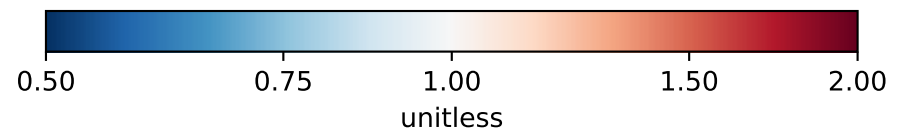
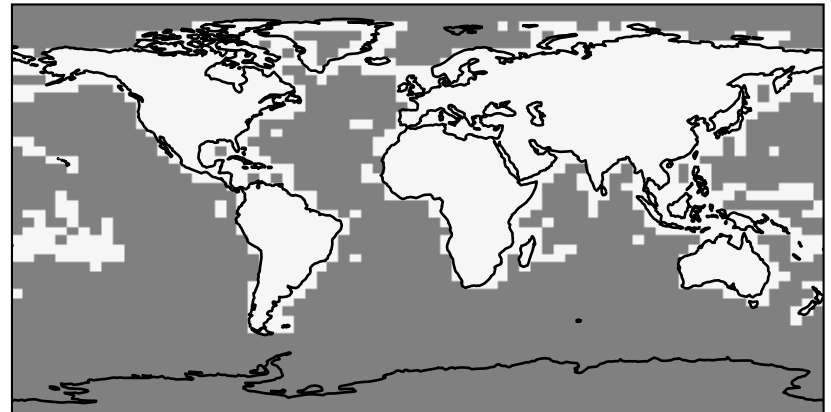
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range





# EmisMVK\_Anthro (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



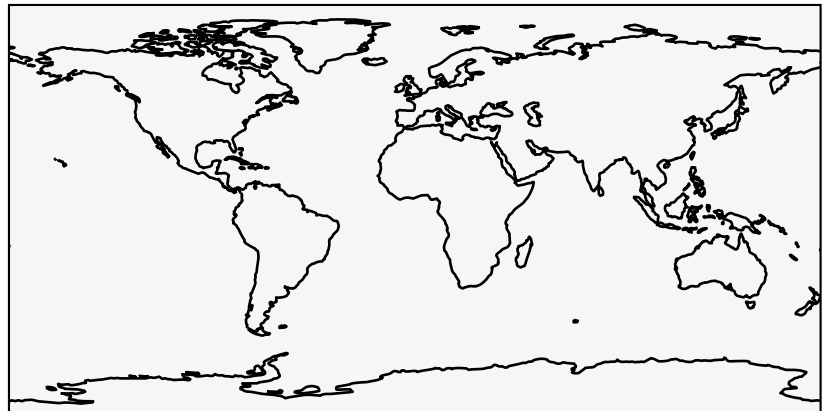
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



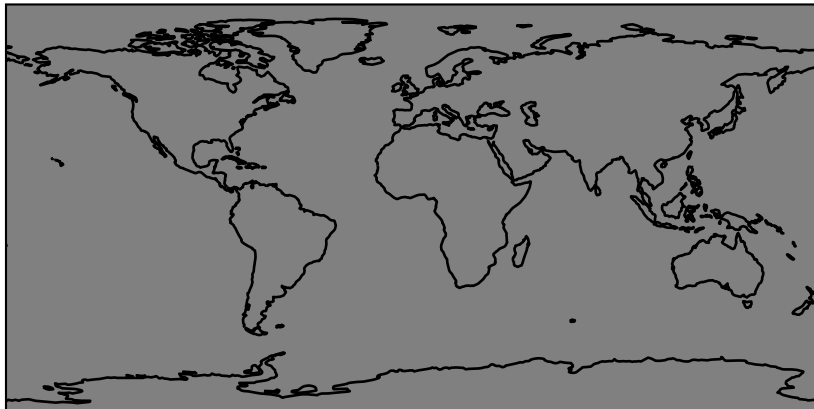
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



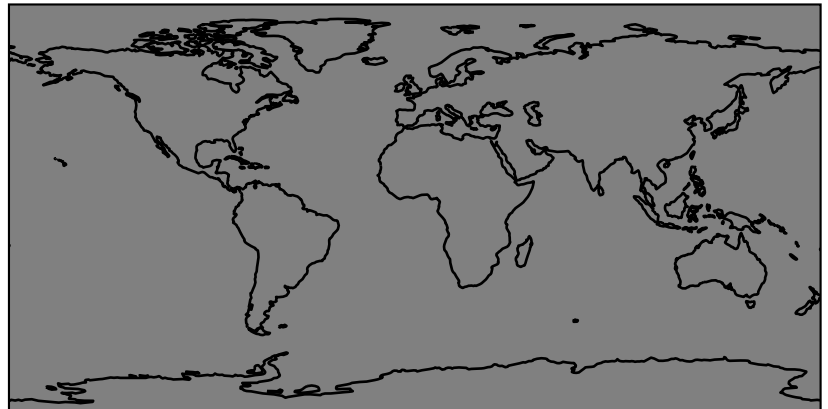
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

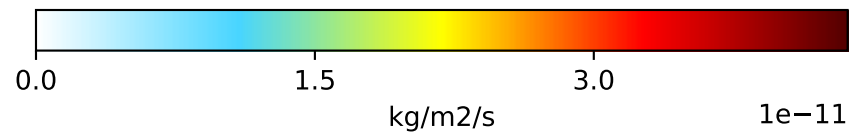
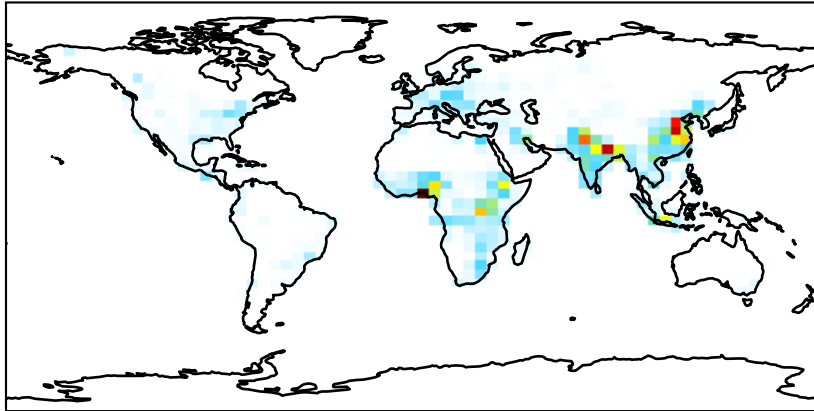
Ratio  
Dev/Ref, Fixed Range



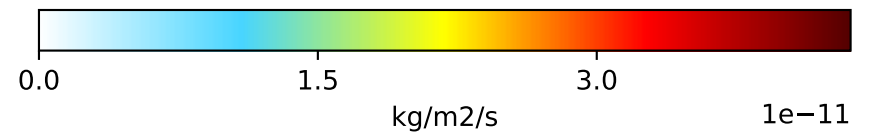
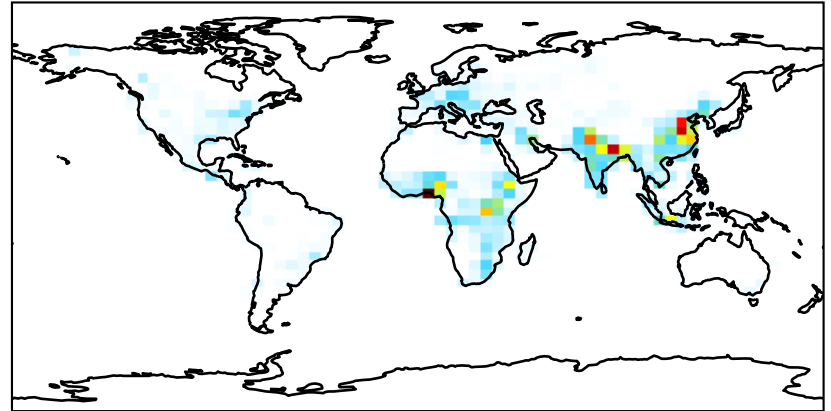
Undefined throughout domain  
unitless

# EmisHCOOH\_Anthro (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



GCC\_13.0.0 (Dev)  
4.0x5.0



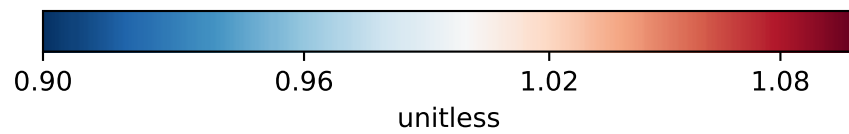
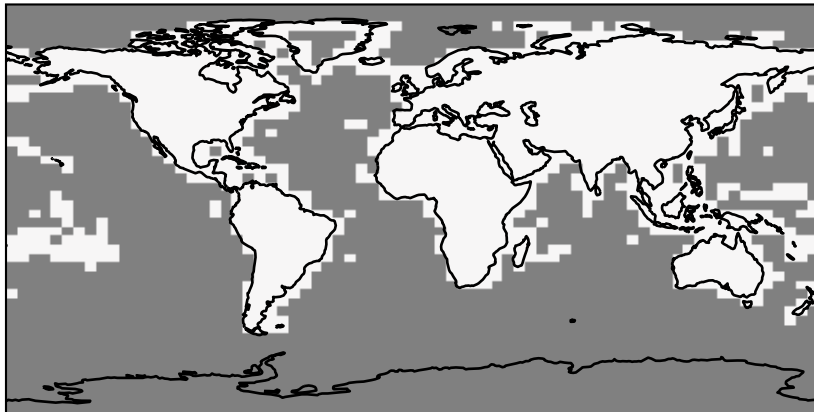
Difference  
Dev - Ref, Dynamic Range



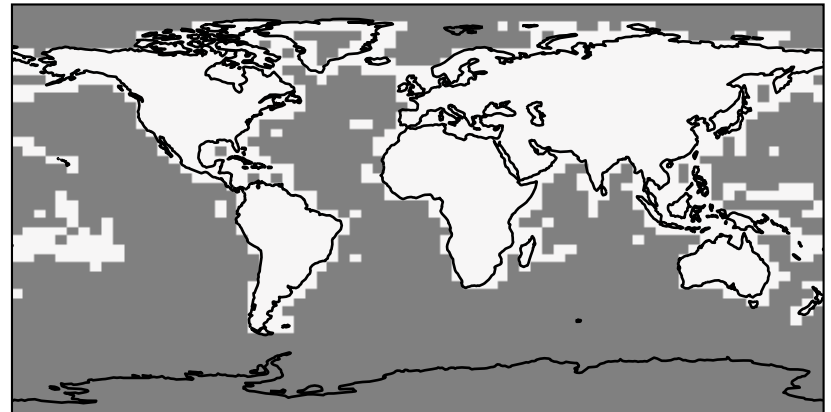
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range



# EmisHCOOH\_Ship (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



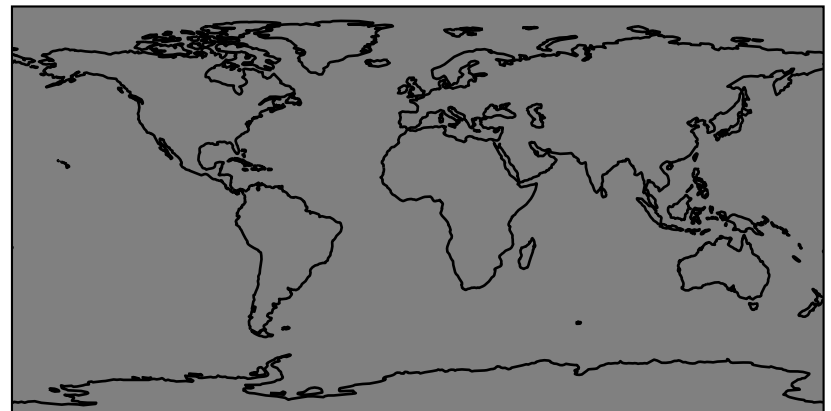
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

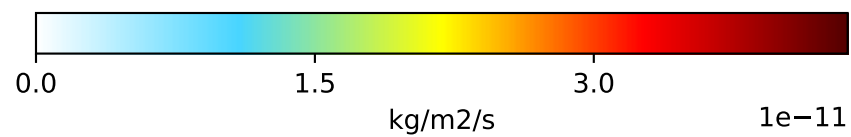
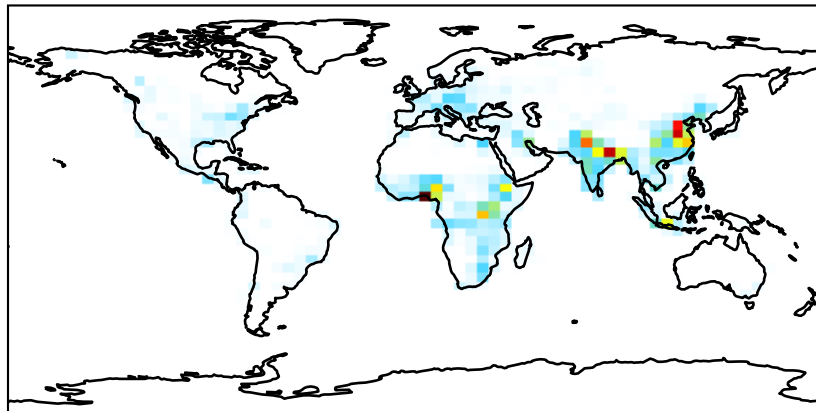
Ratio  
Dev/Ref, Fixed Range



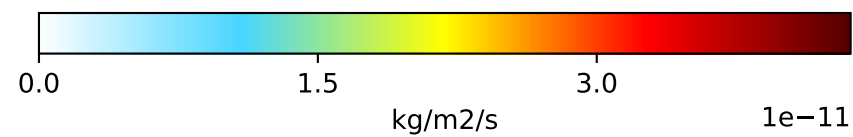
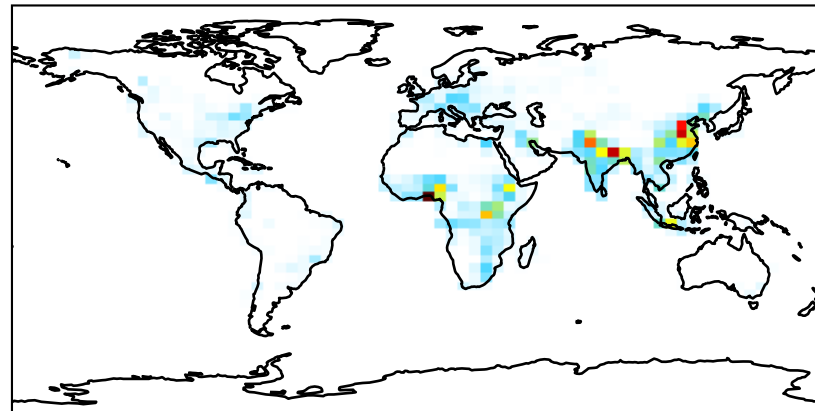
Undefined throughout domain  
unitless

# EmisHCOOH\_Total (Jan2019)

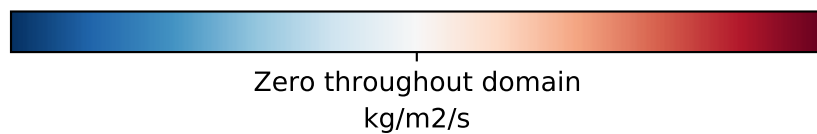
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



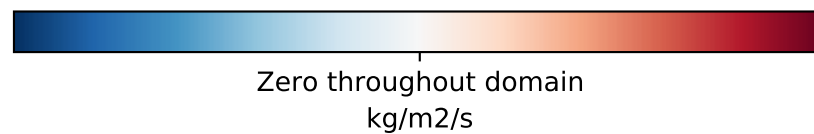
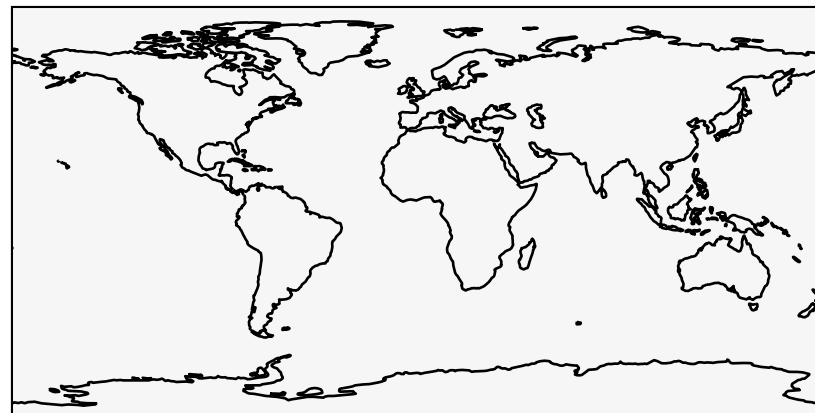
GCC\_13.0.0 (Dev)  
4.0x5.0



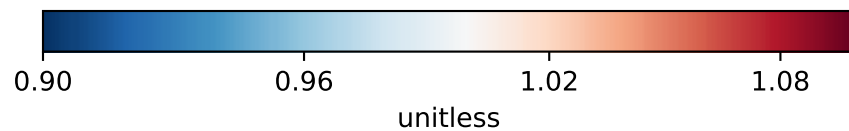
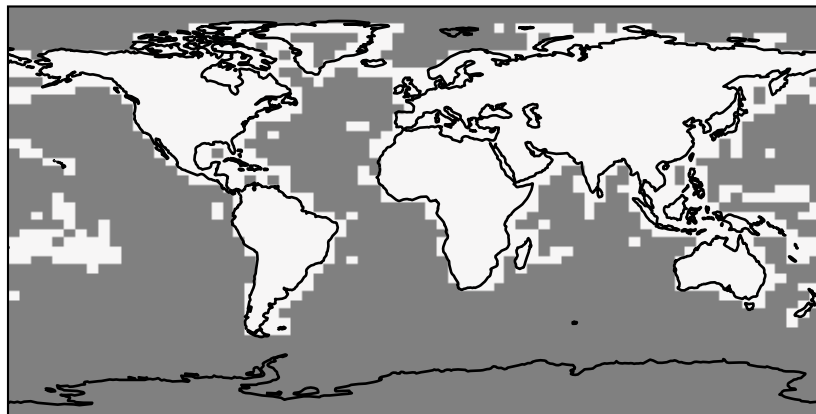
Difference  
Dev - Ref, Dynamic Range



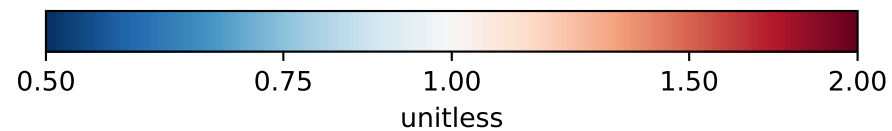
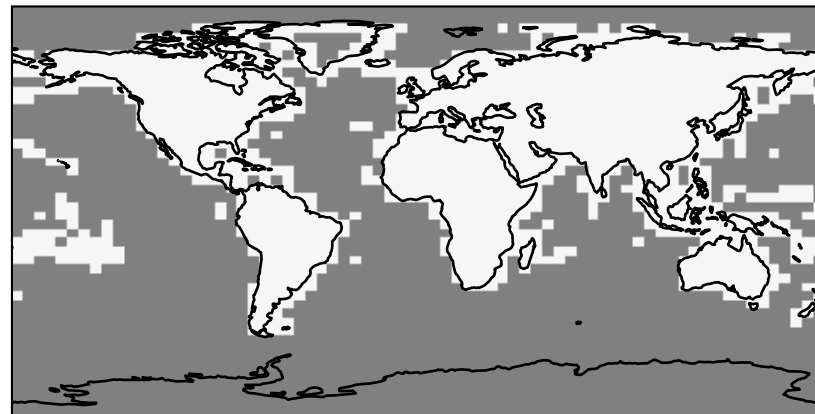
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range

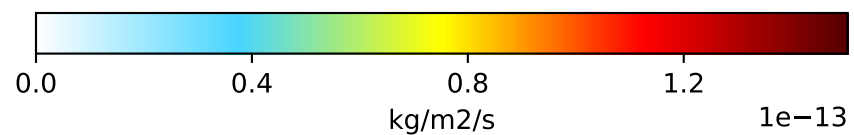
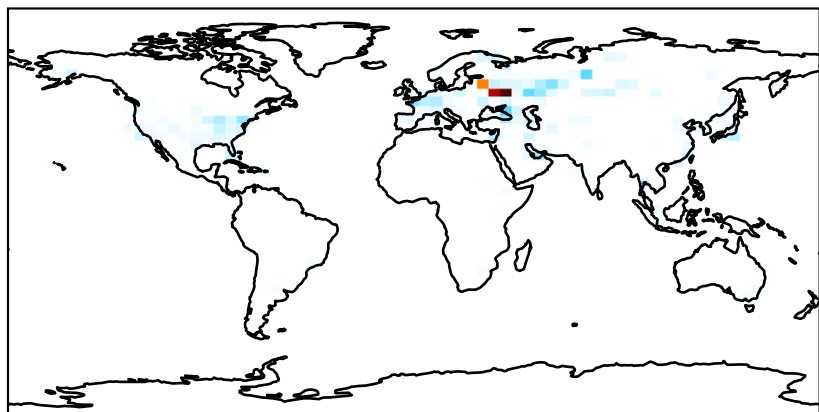


Ratio  
Dev/Ref, Fixed Range

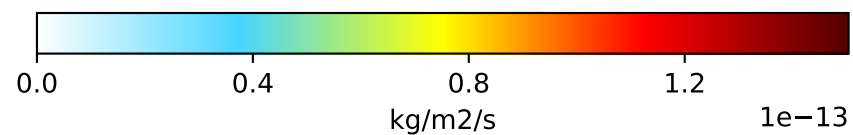
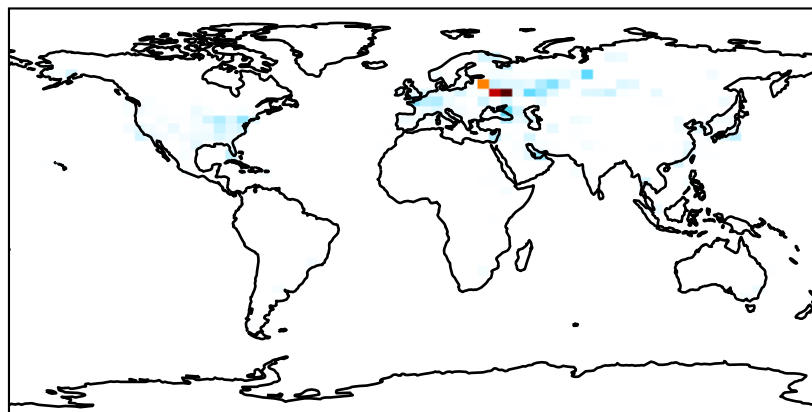


# EmisRCHO\_Aircraft (Jan2019)

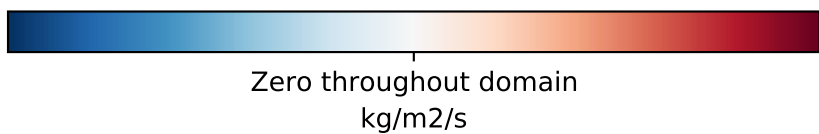
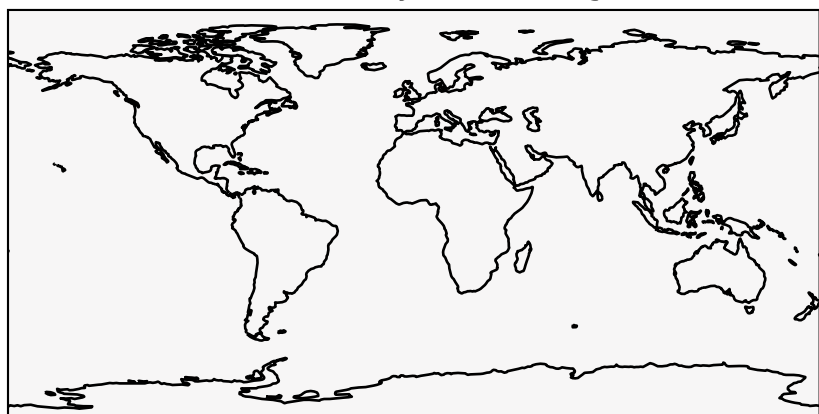
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



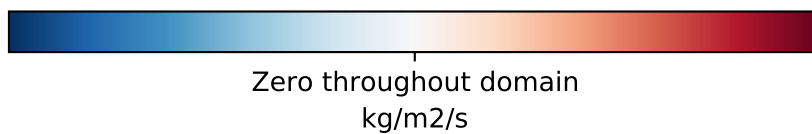
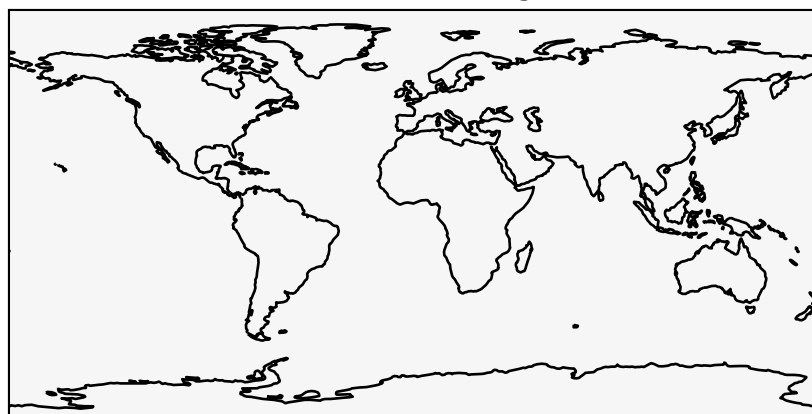
GCC\_13.0.0 (Dev)  
4.0x5.0



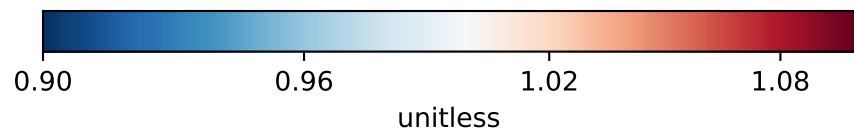
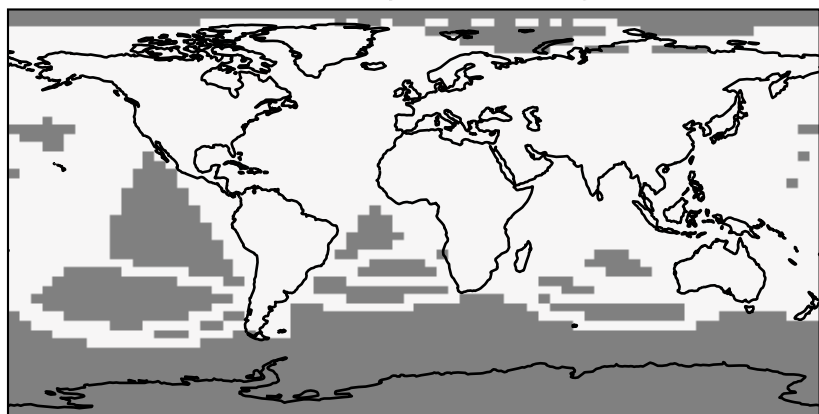
Difference  
Dev - Ref, Dynamic Range



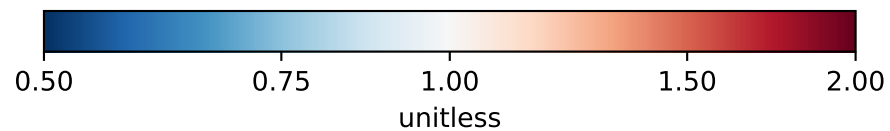
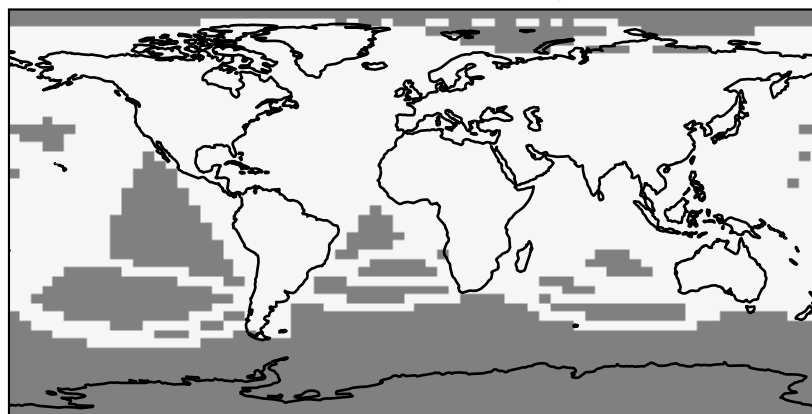
Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range



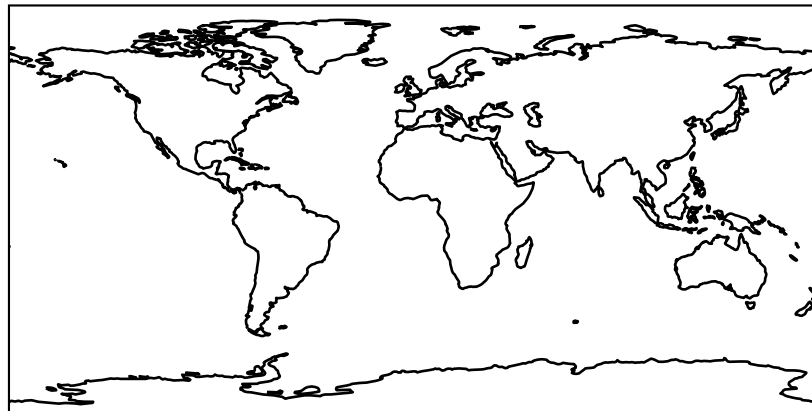
# EmisRCHO\_Anthro (Jan2019)

GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



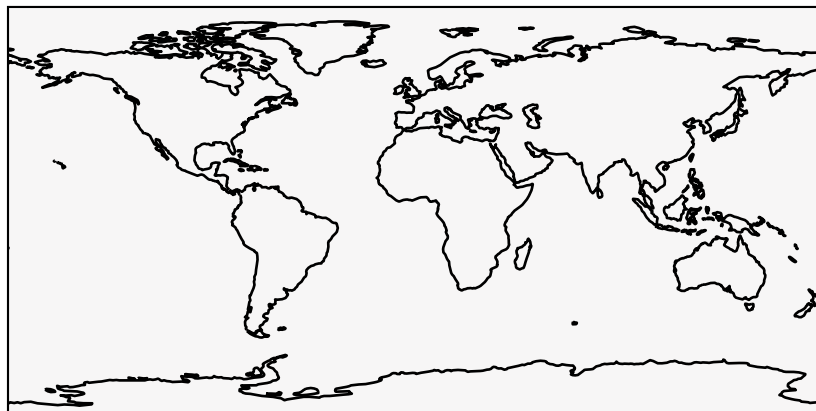
Zero throughout domain  
kg/m2/s

GCC\_13.0.0 (Dev)  
4.0x5.0



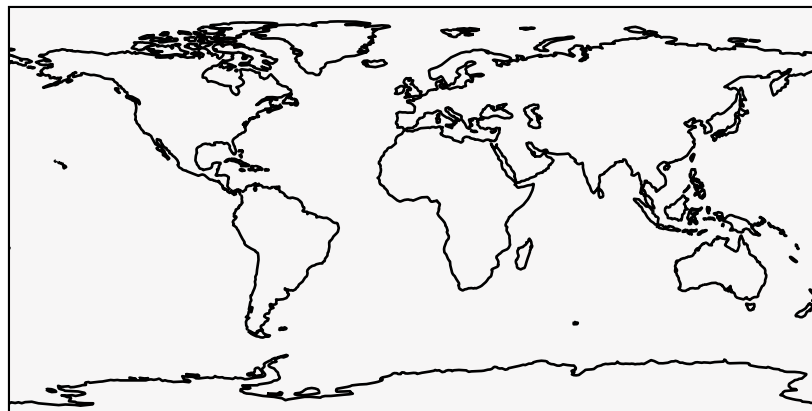
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Dynamic Range



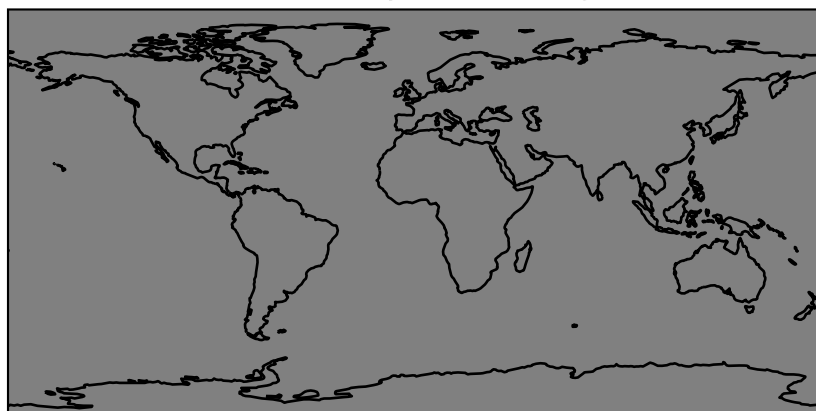
Zero throughout domain  
kg/m2/s

Difference  
Dev - Ref, Restricted Range [5%,95%]



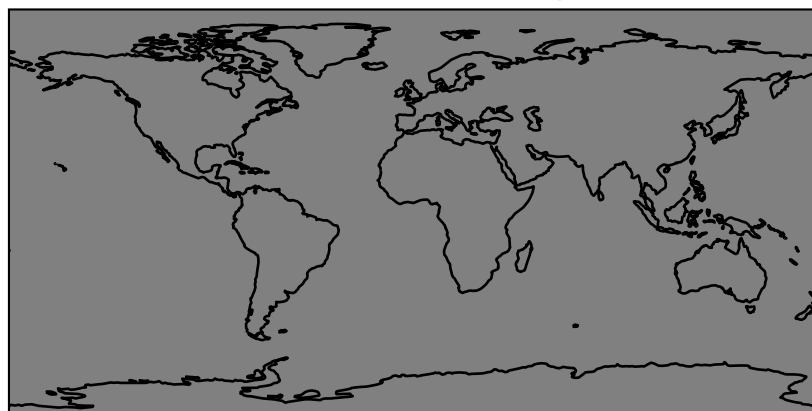
Zero throughout domain  
kg/m2/s

Ratio  
Dev/Ref, Dynamic Range



Undefined throughout domain  
unitless

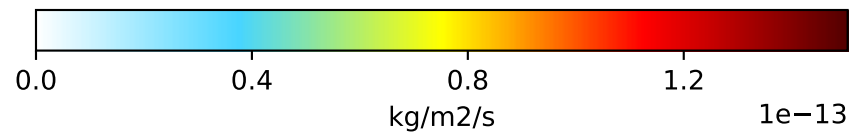
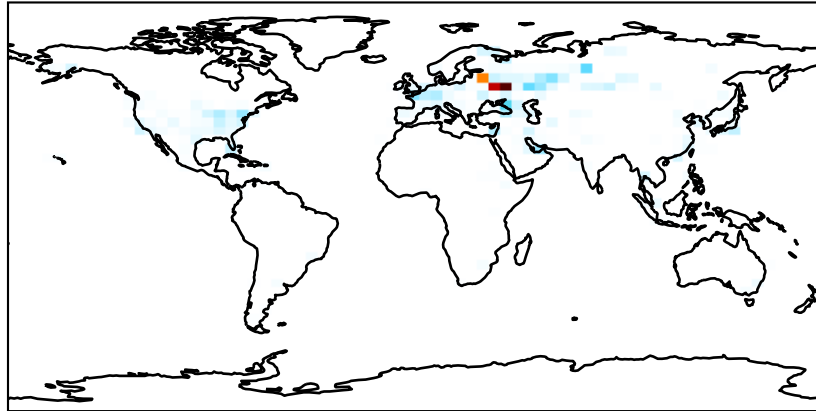
Ratio  
Dev/Ref, Fixed Range



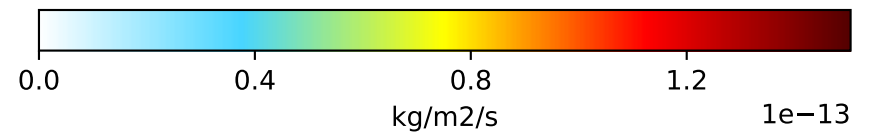
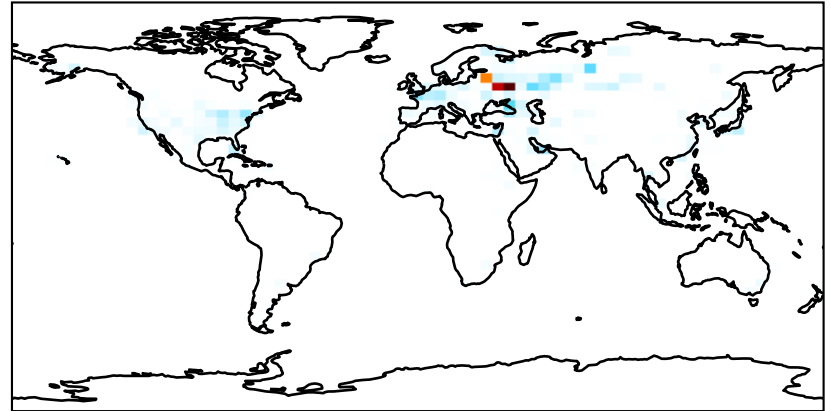
Undefined throughout domain  
unitless

# EmisRCHO\_Total (Jan2019)

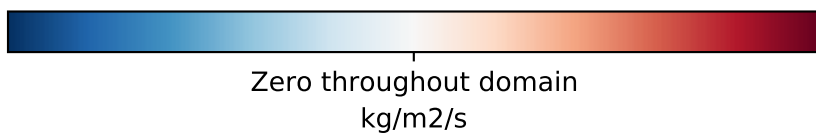
GCC\_13.0.0-beta.1 (Ref)  
4.0x5.0



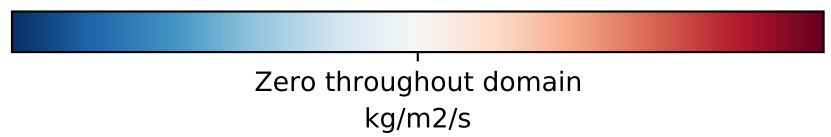
GCC\_13.0.0 (Dev)  
4.0x5.0



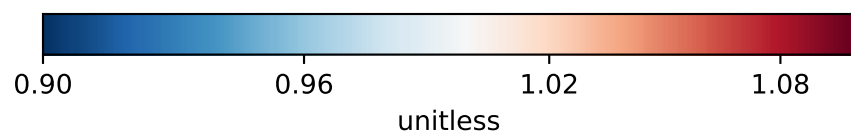
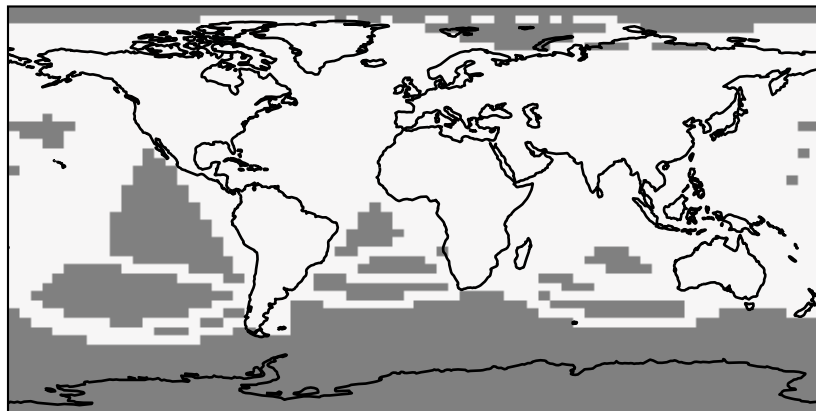
Difference  
Dev - Ref, Dynamic Range



Difference  
Dev - Ref, Restricted Range [5%,95%]



Ratio  
Dev/Ref, Dynamic Range



Ratio  
Dev/Ref, Fixed Range

