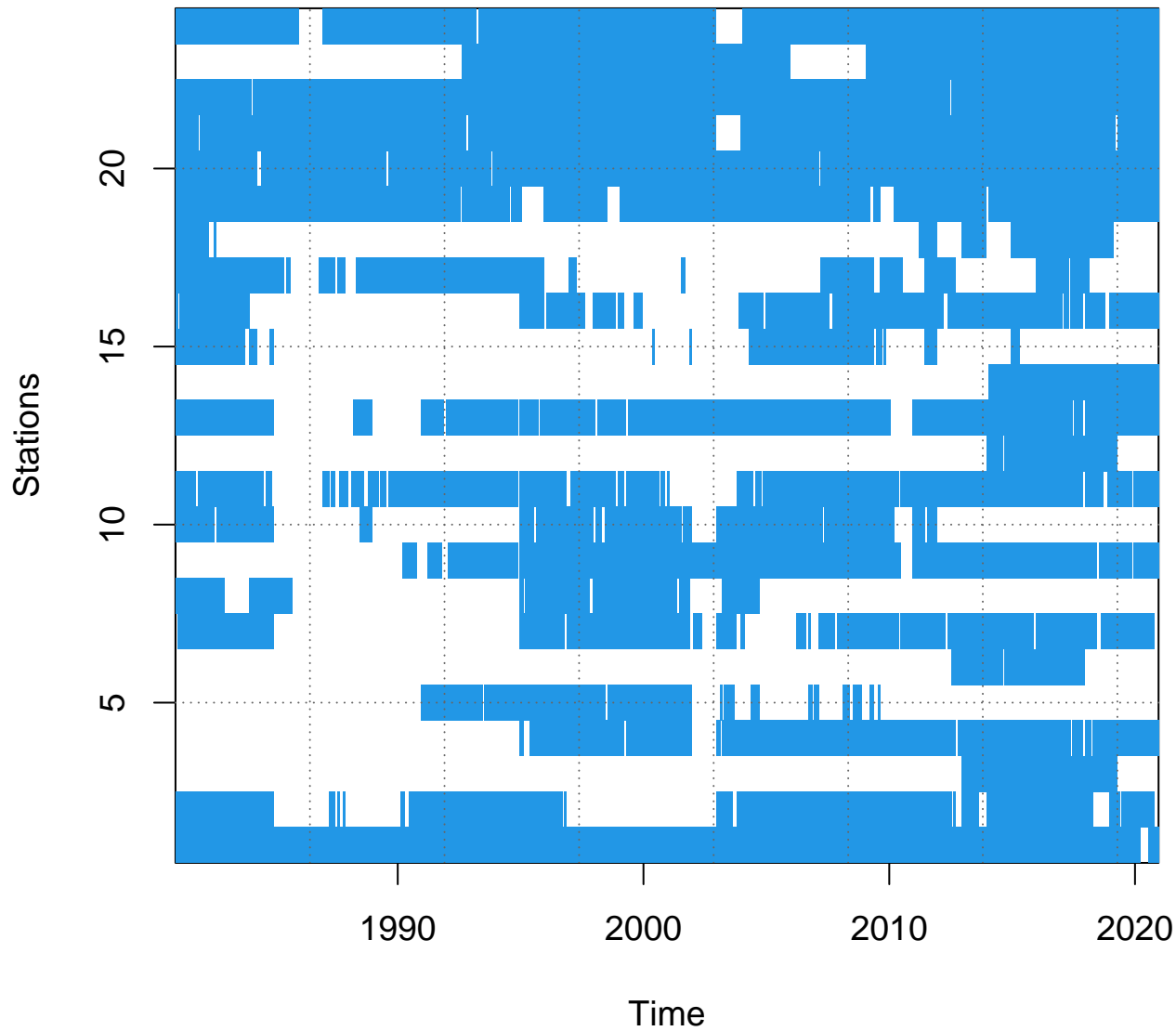


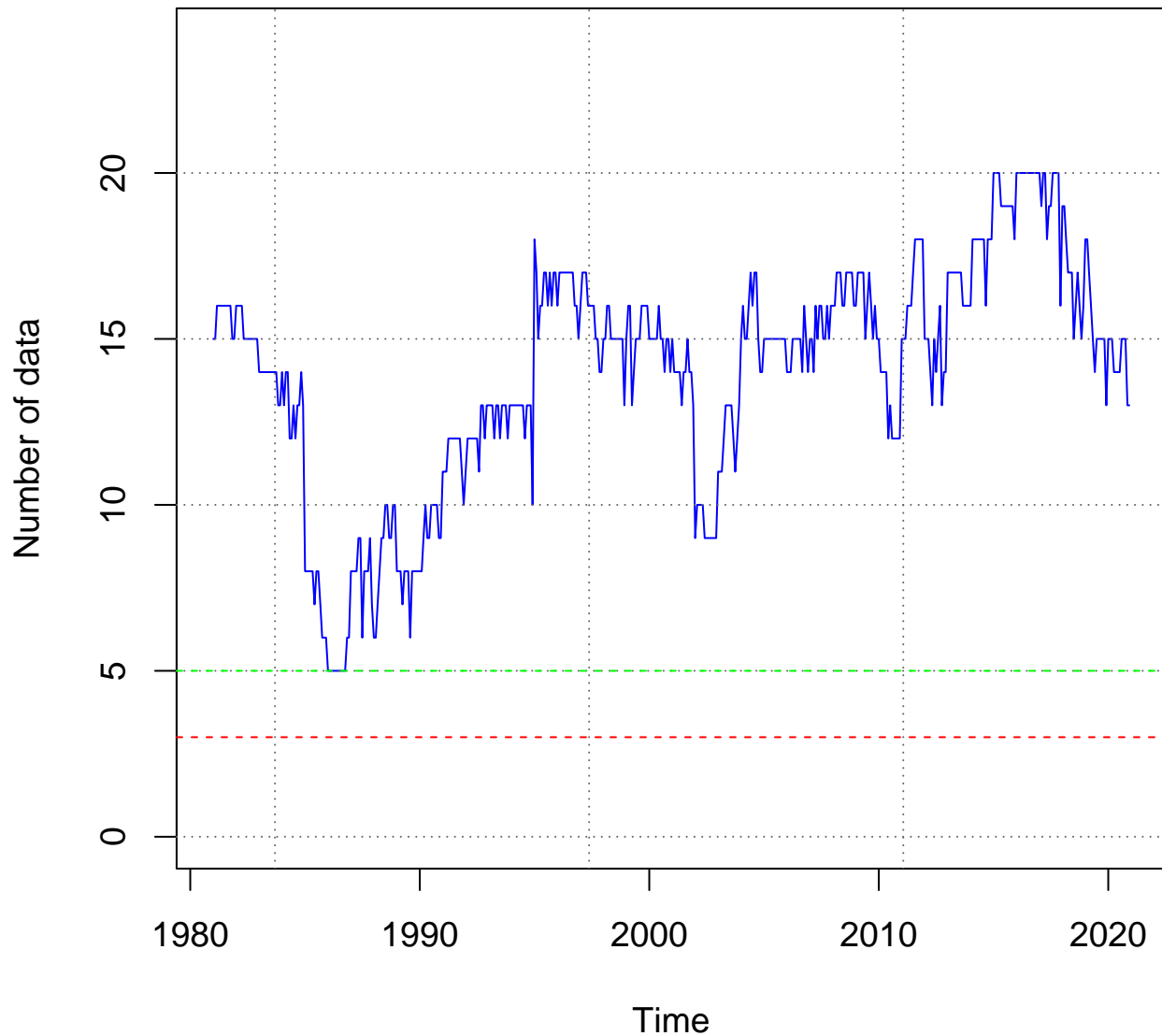
# CLIMATOL 3.1.1

Homogenization  
graphic output of  
pre-m  
1981–2020

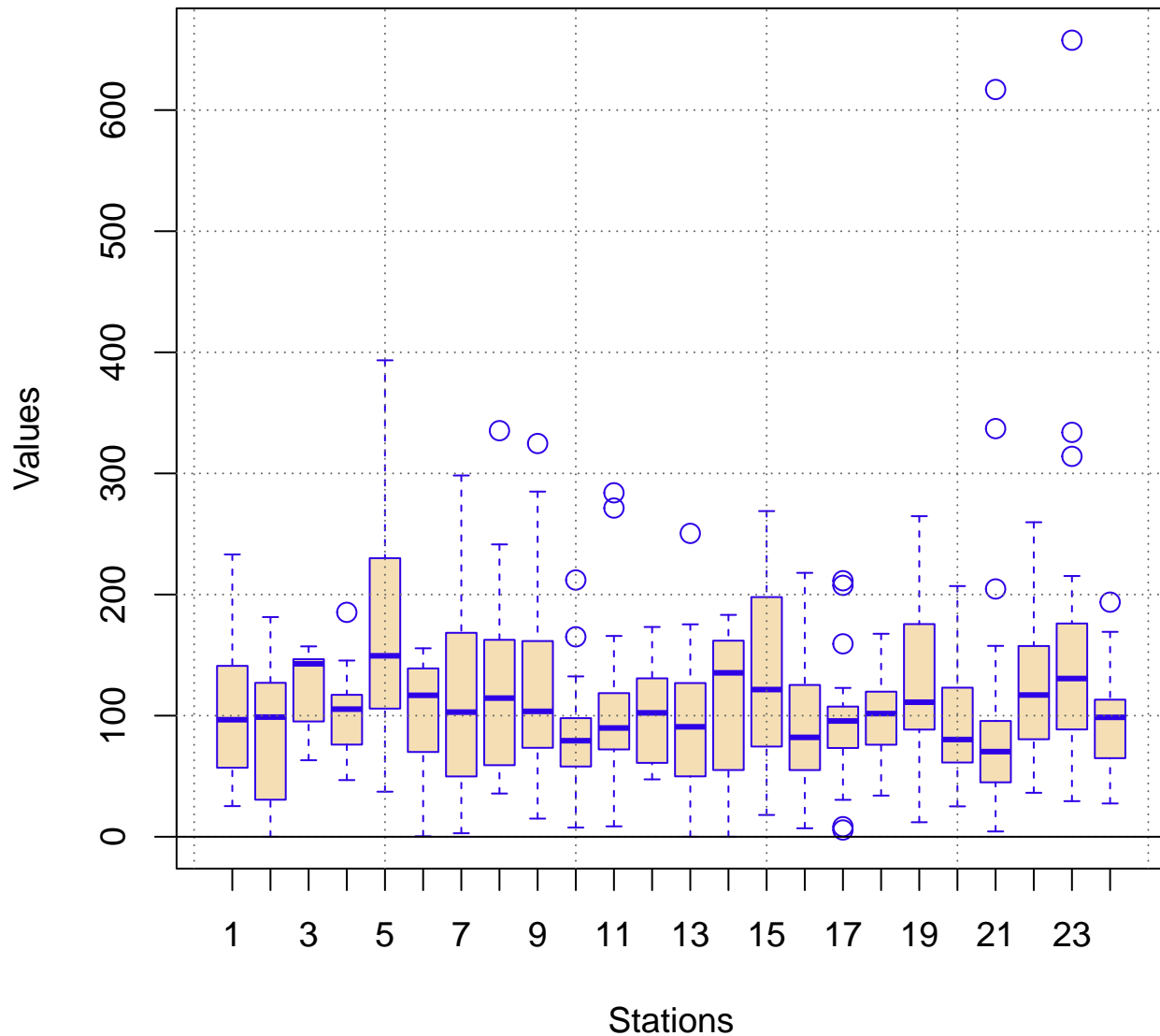
# pre-m data availability



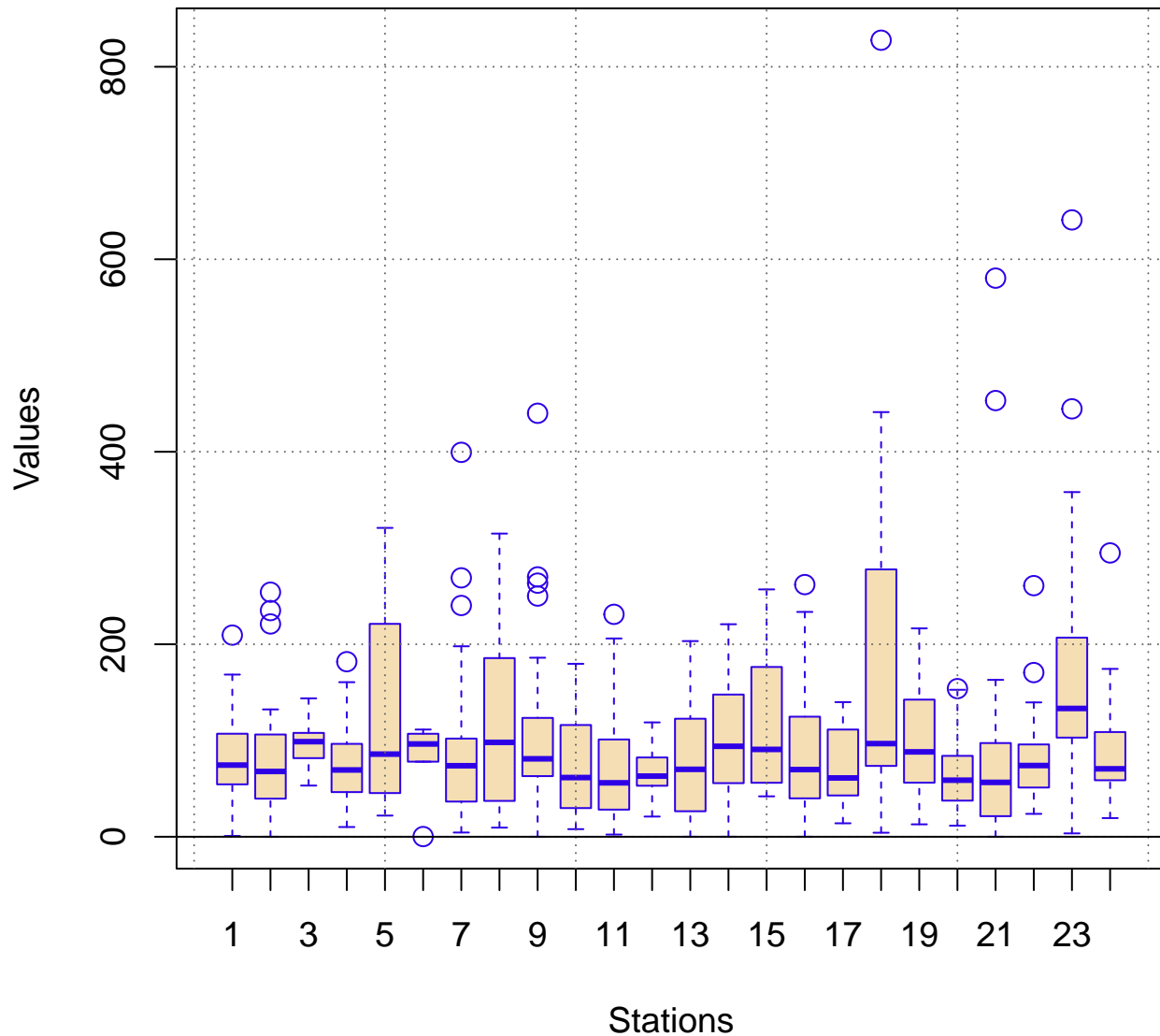
# Number of pre-m data in all stations



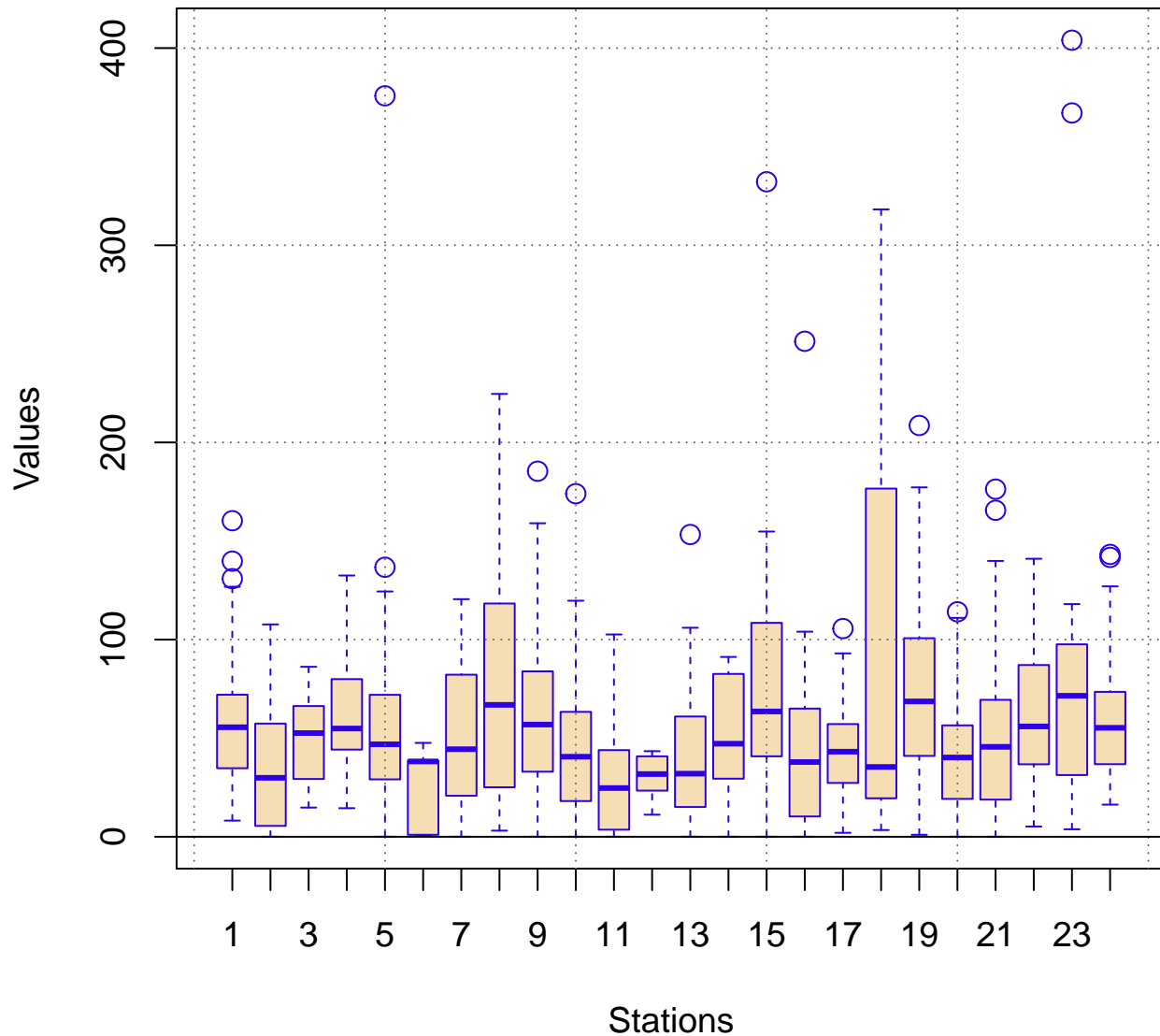
## Data values of pre-m (Jan)



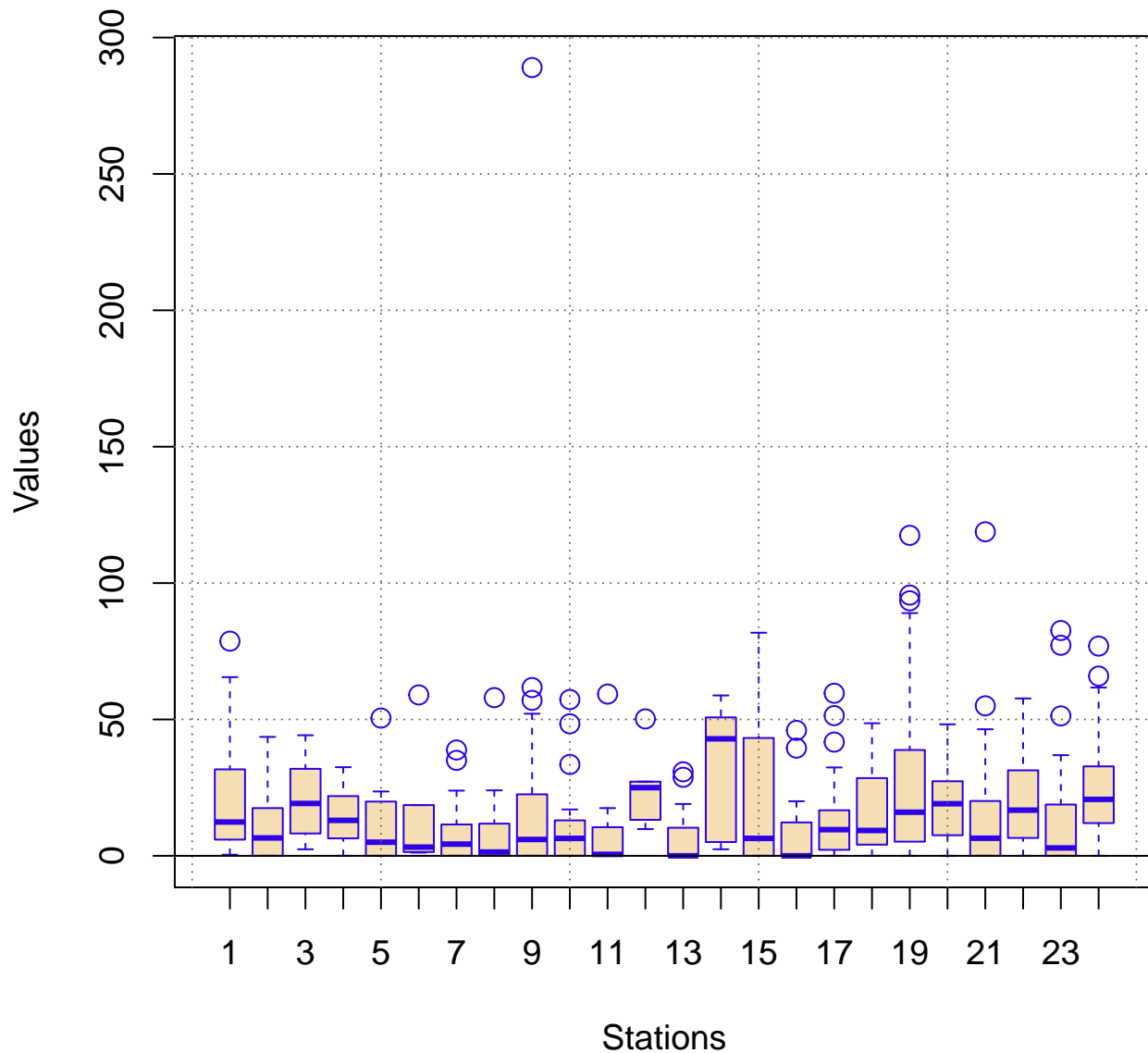
## Data values of pre-m (Feb)



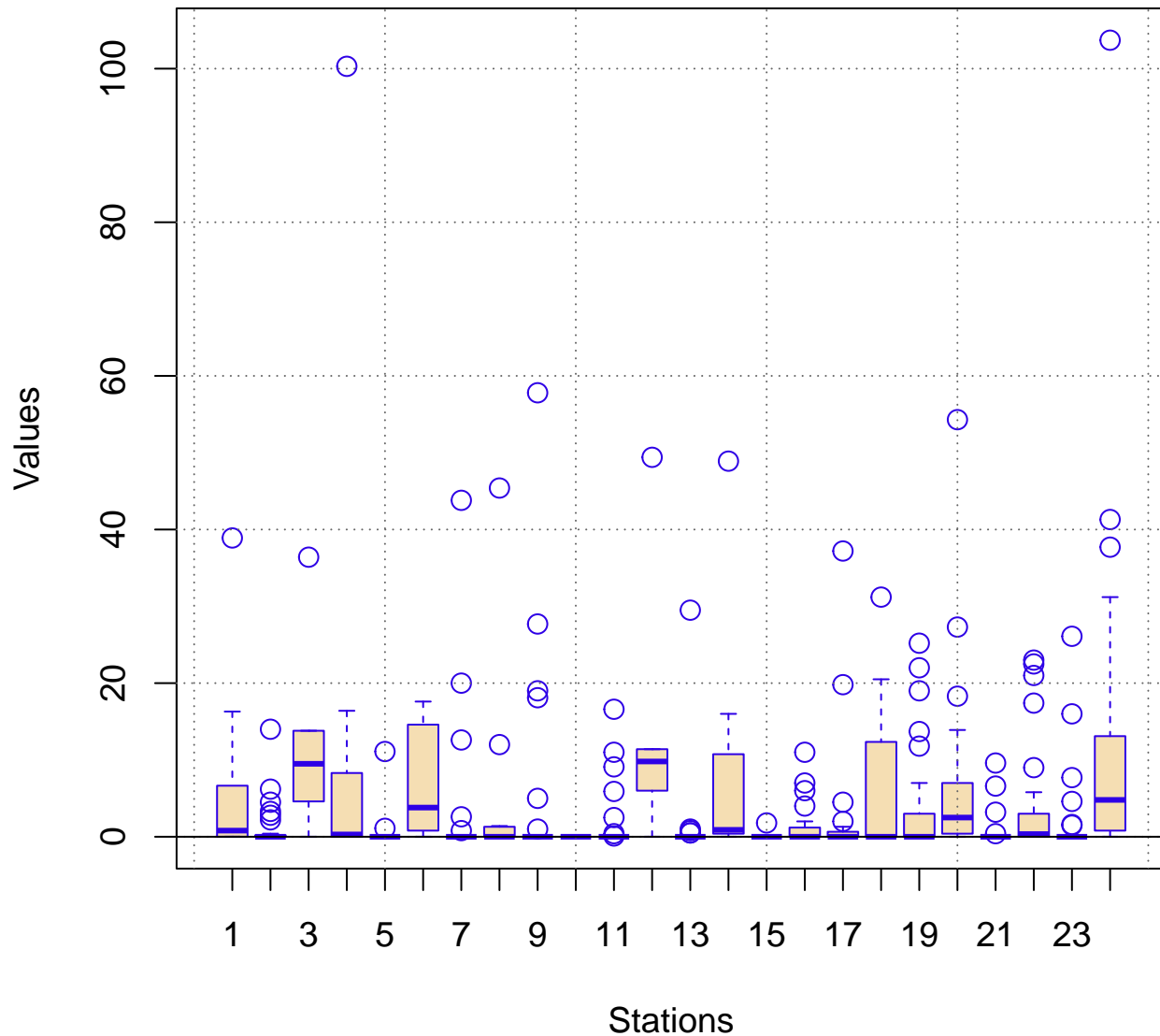
**Data values of pre-m (Mar)**



**Data values of pre-m (Apr)**

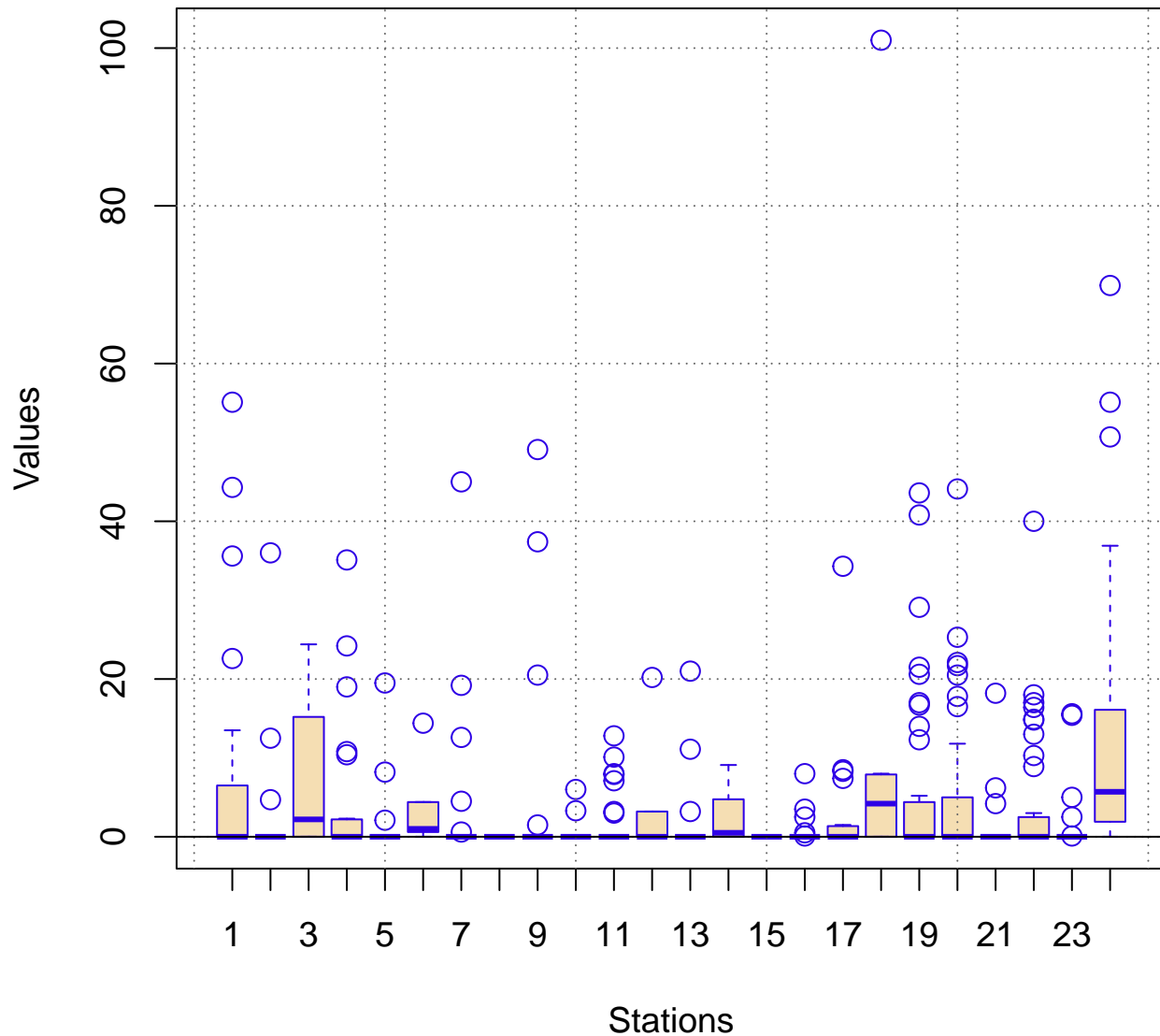


## Data values of pre-m (May)

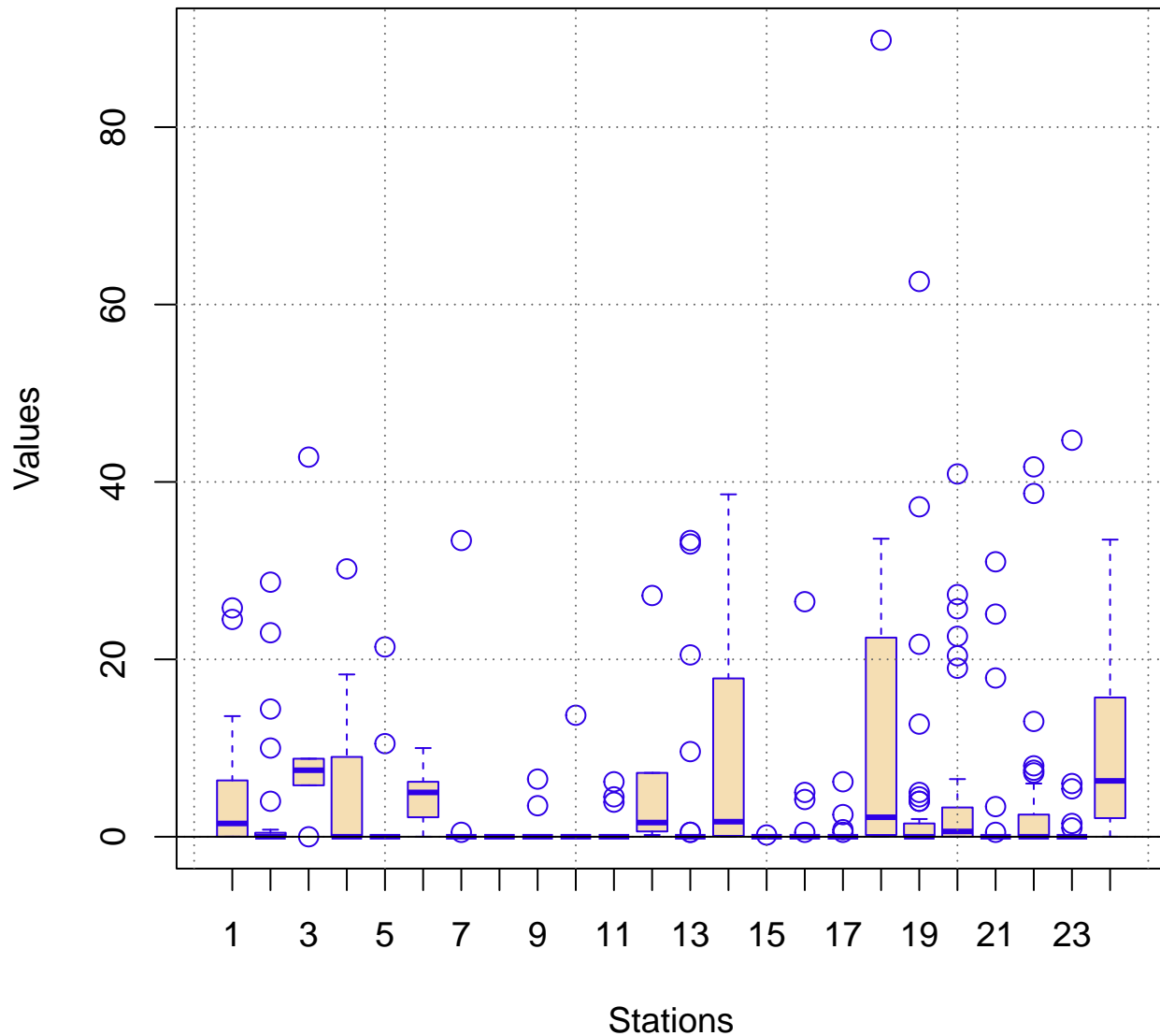




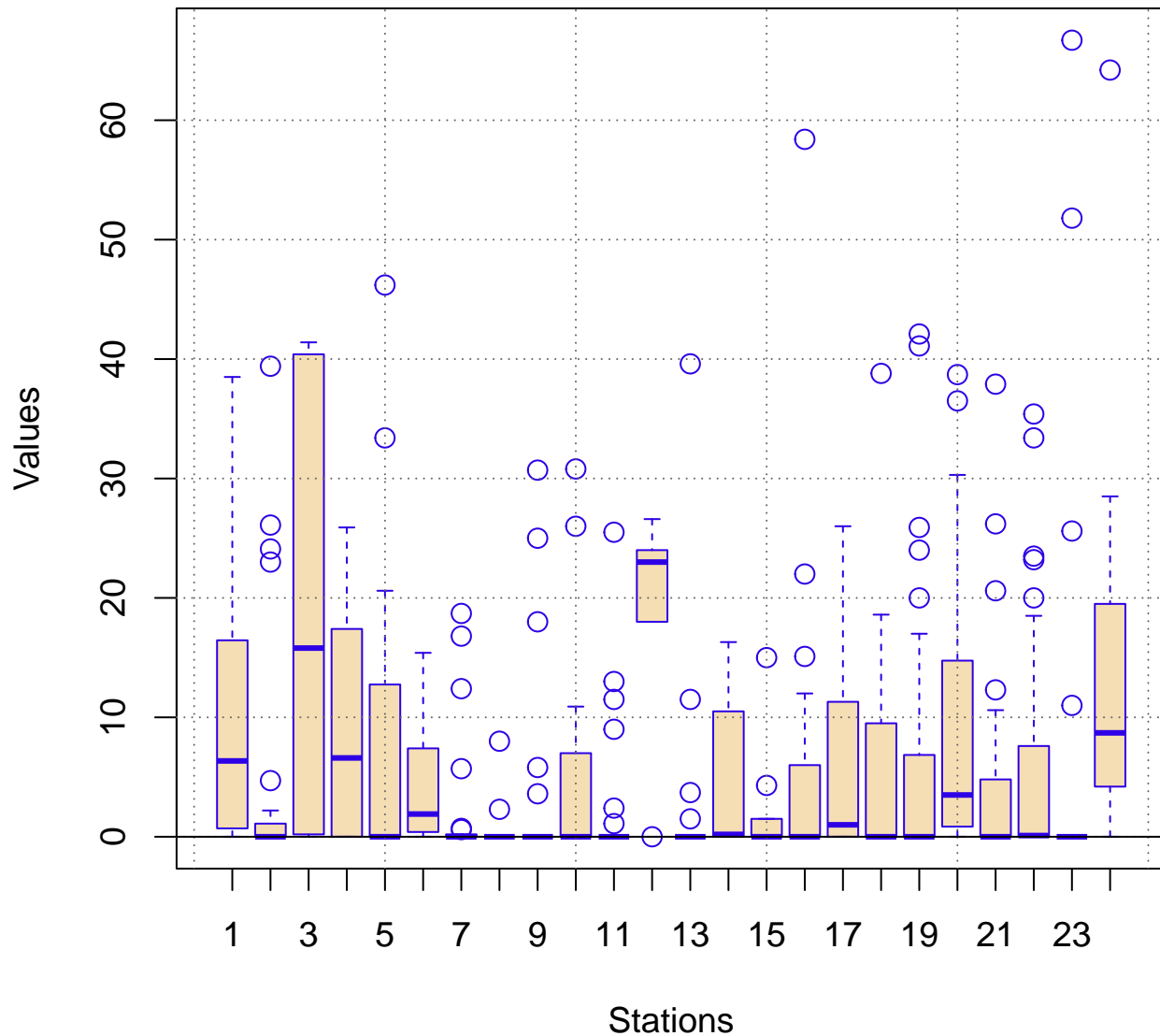
## Data values of pre-m (Jun)



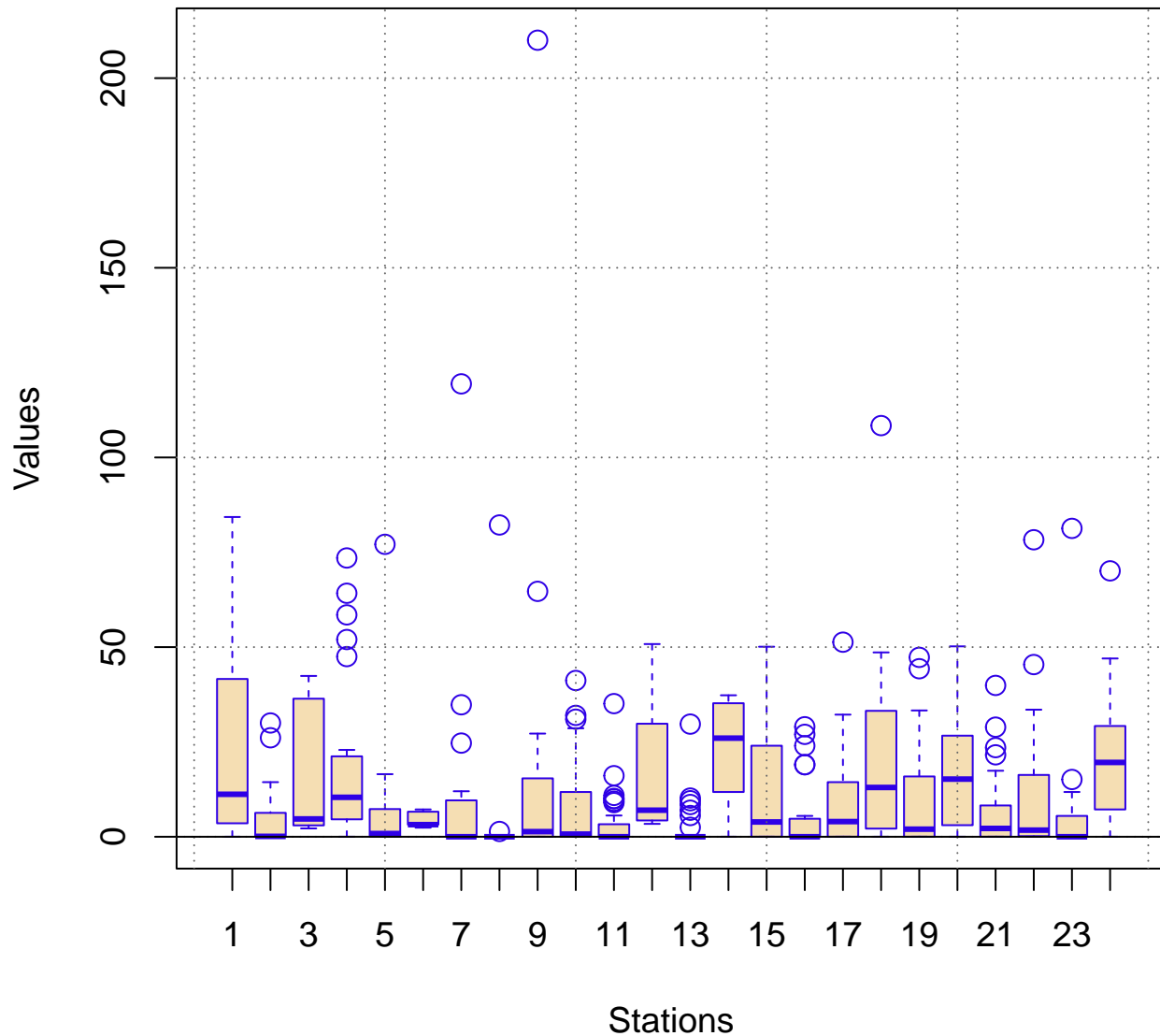
**Data values of pre-m (Jul)**



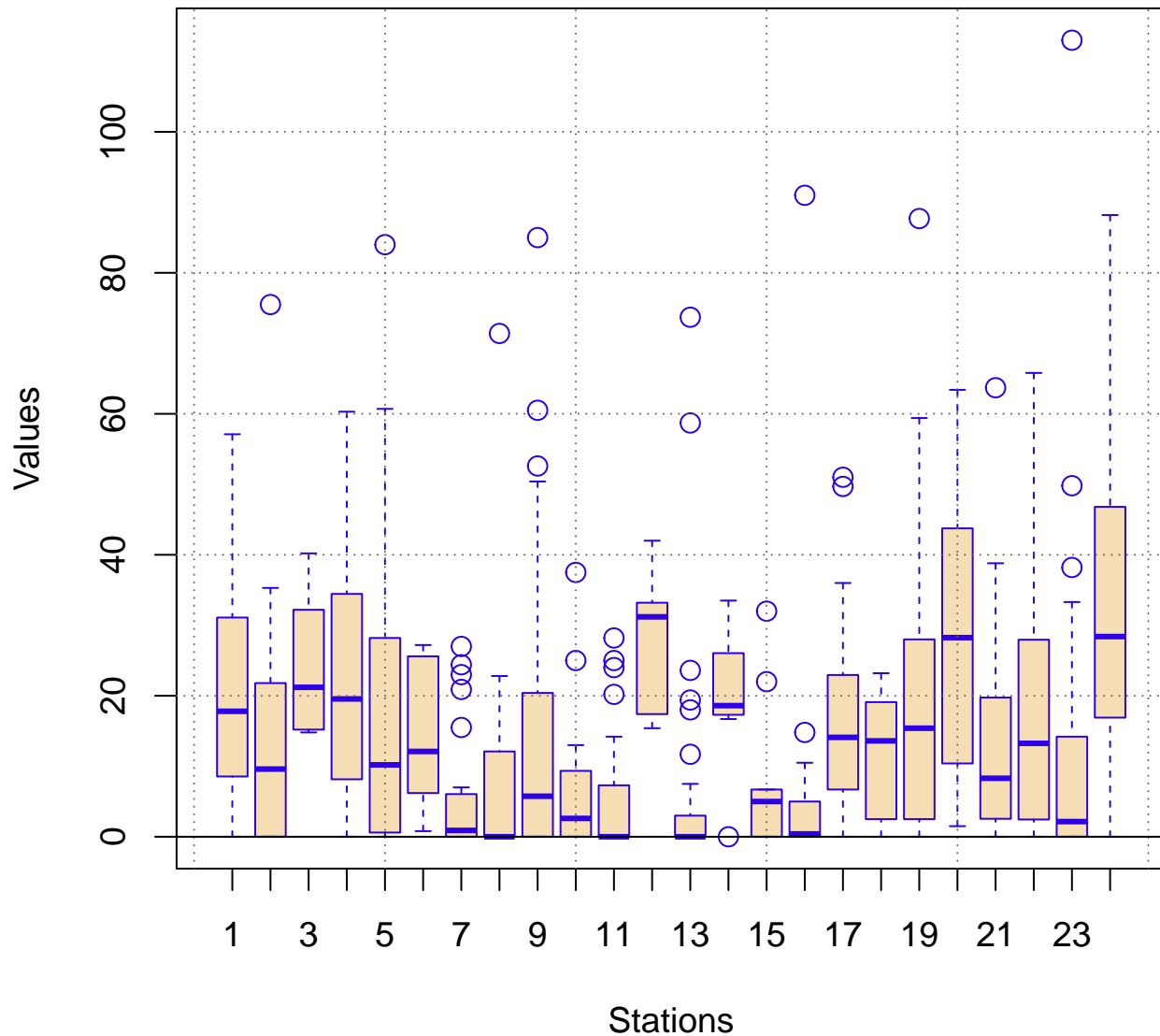
**Data values of pre-m (Aug)**



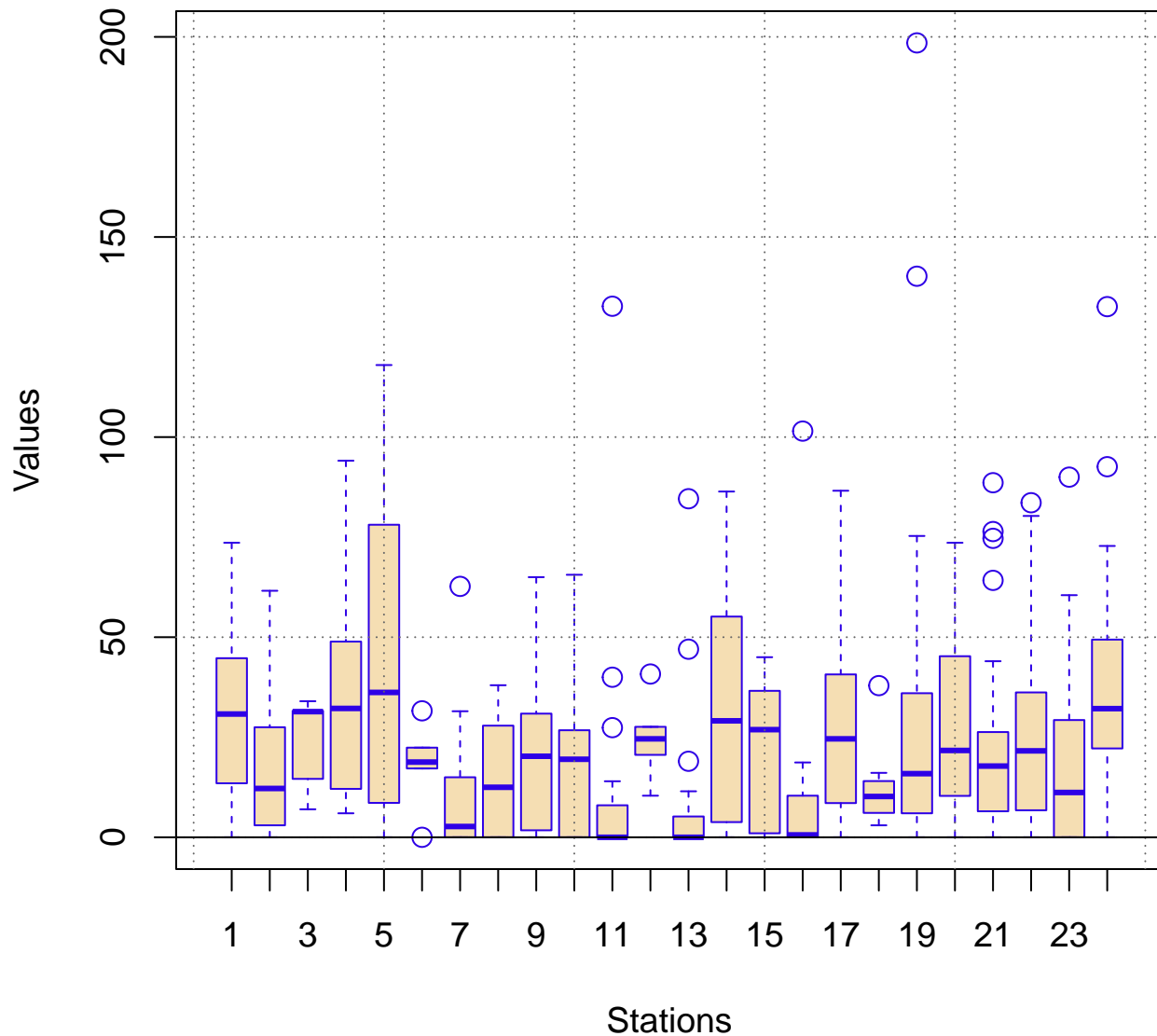
**Data values of pre-m (Sep)**



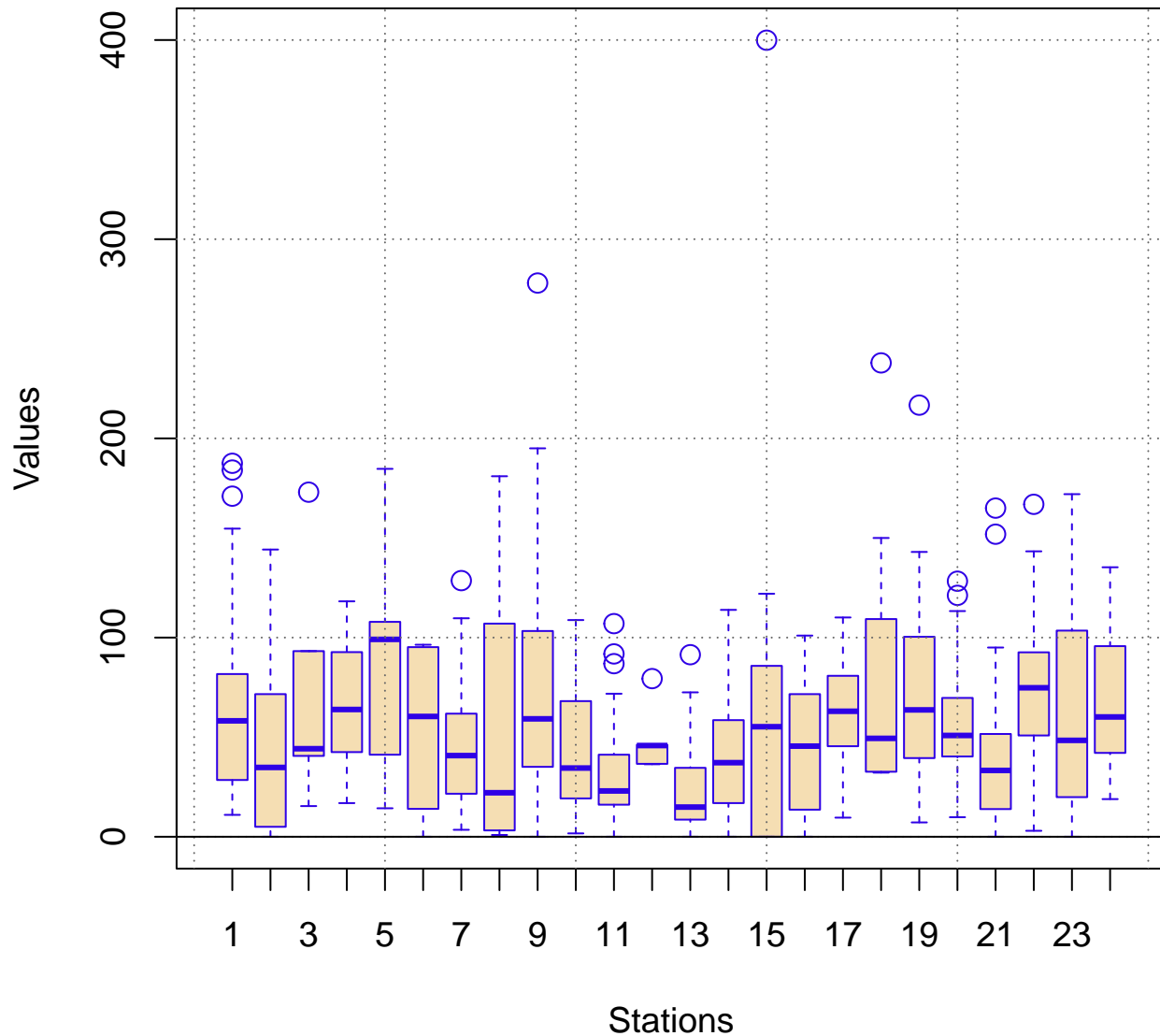
## Data values of pre-m (Oct)



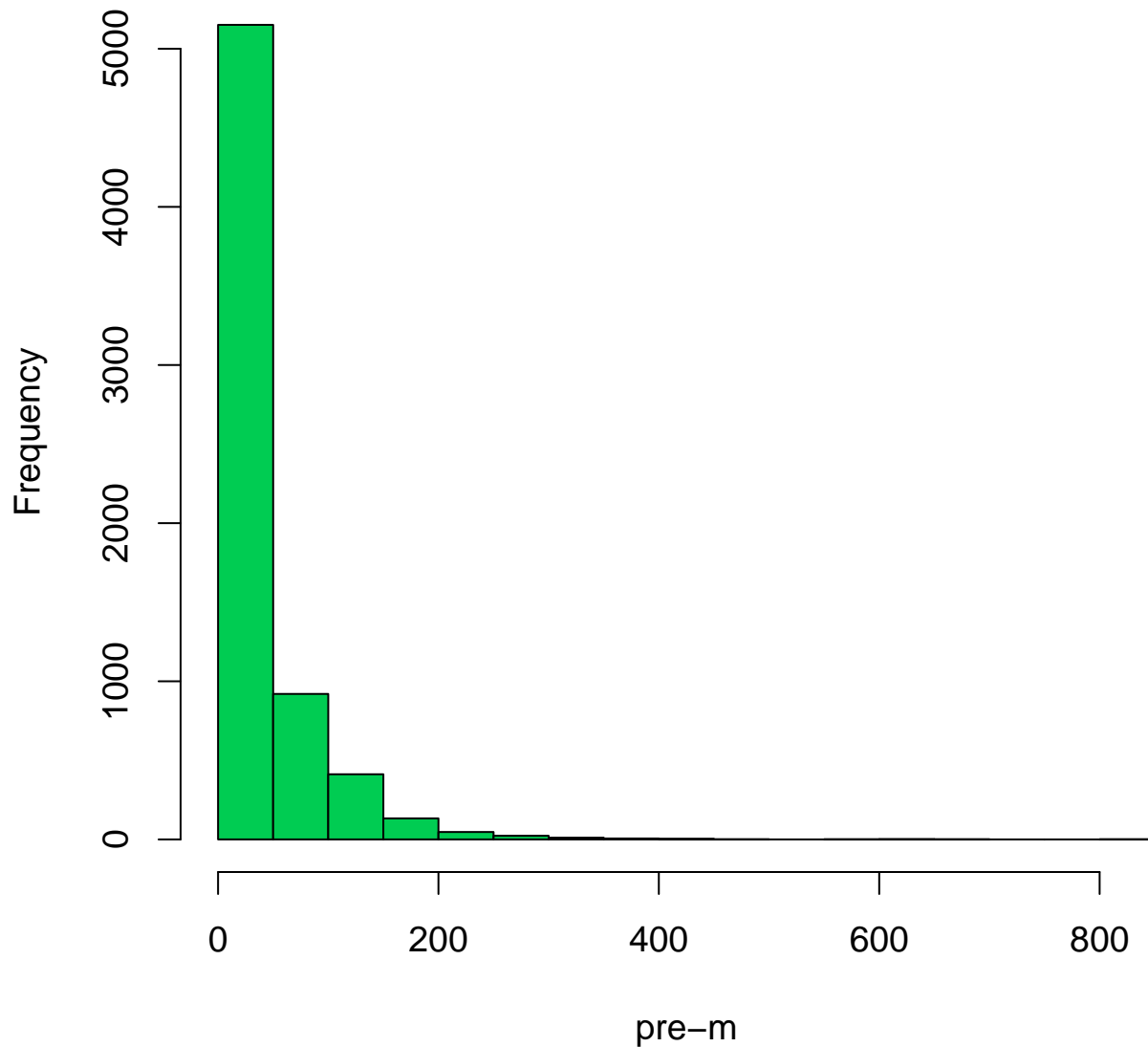
## Data values of pre-m (Nov)



**Data values of pre-m (Dec)**

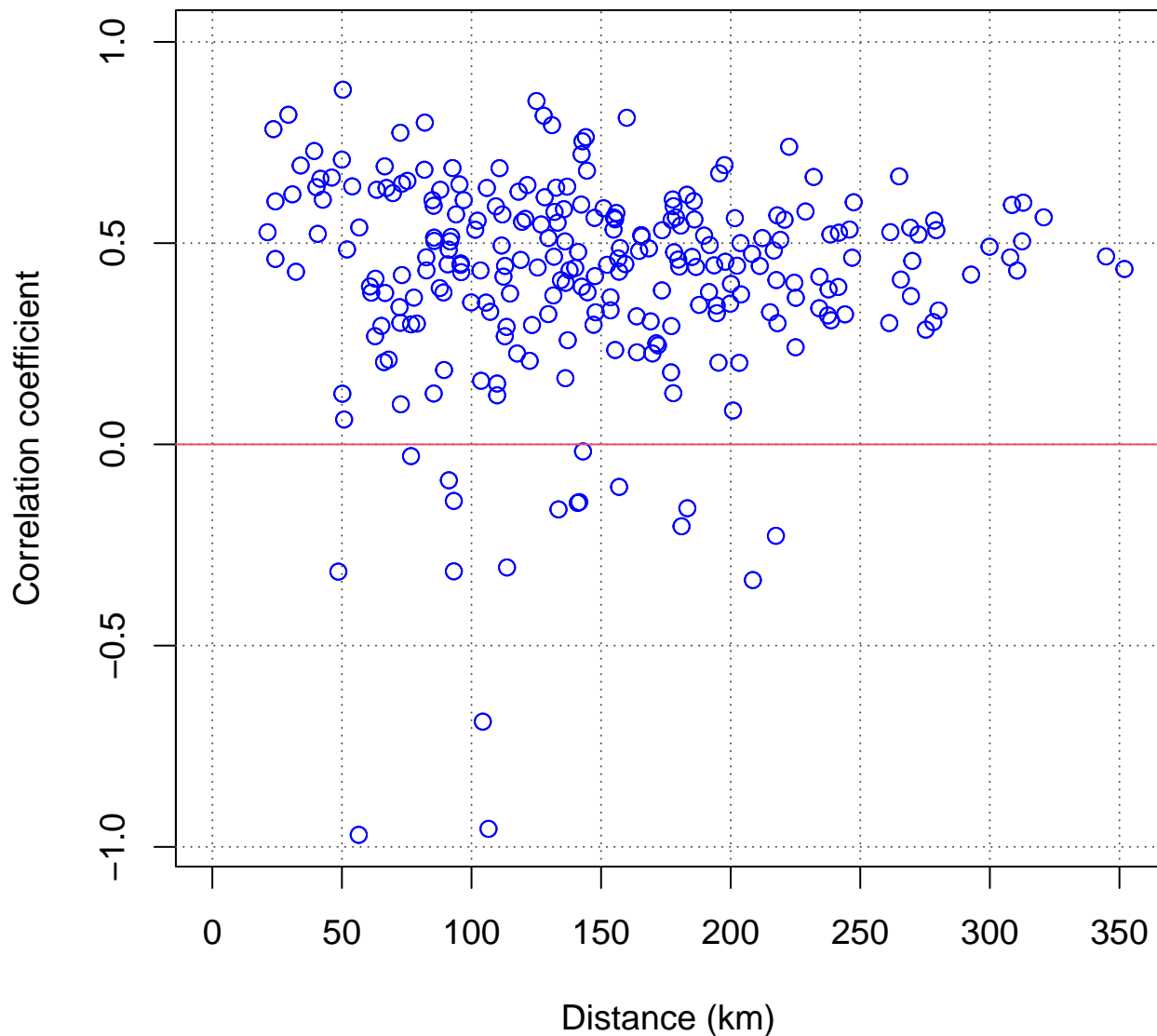


**Histogram of all data**

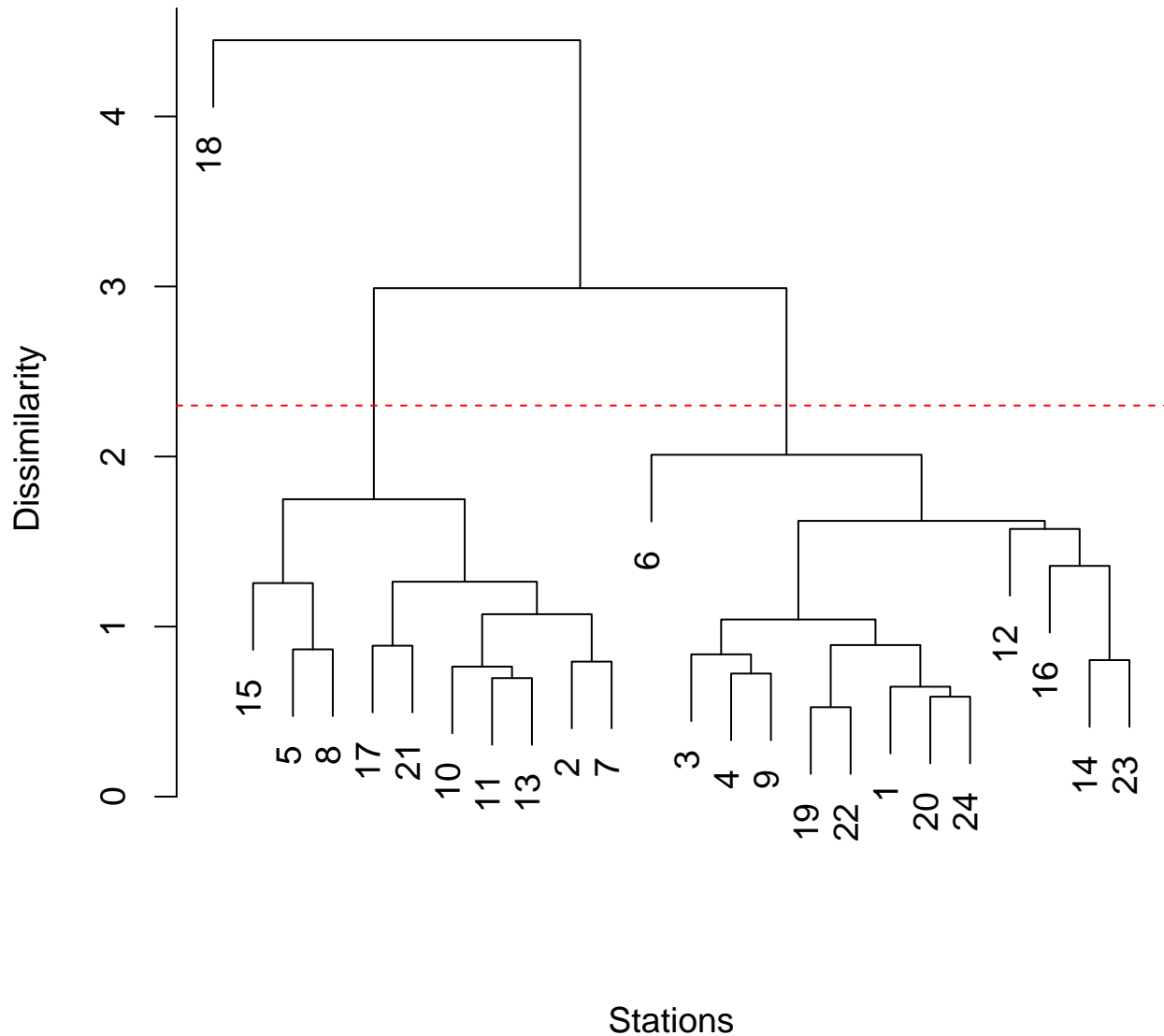




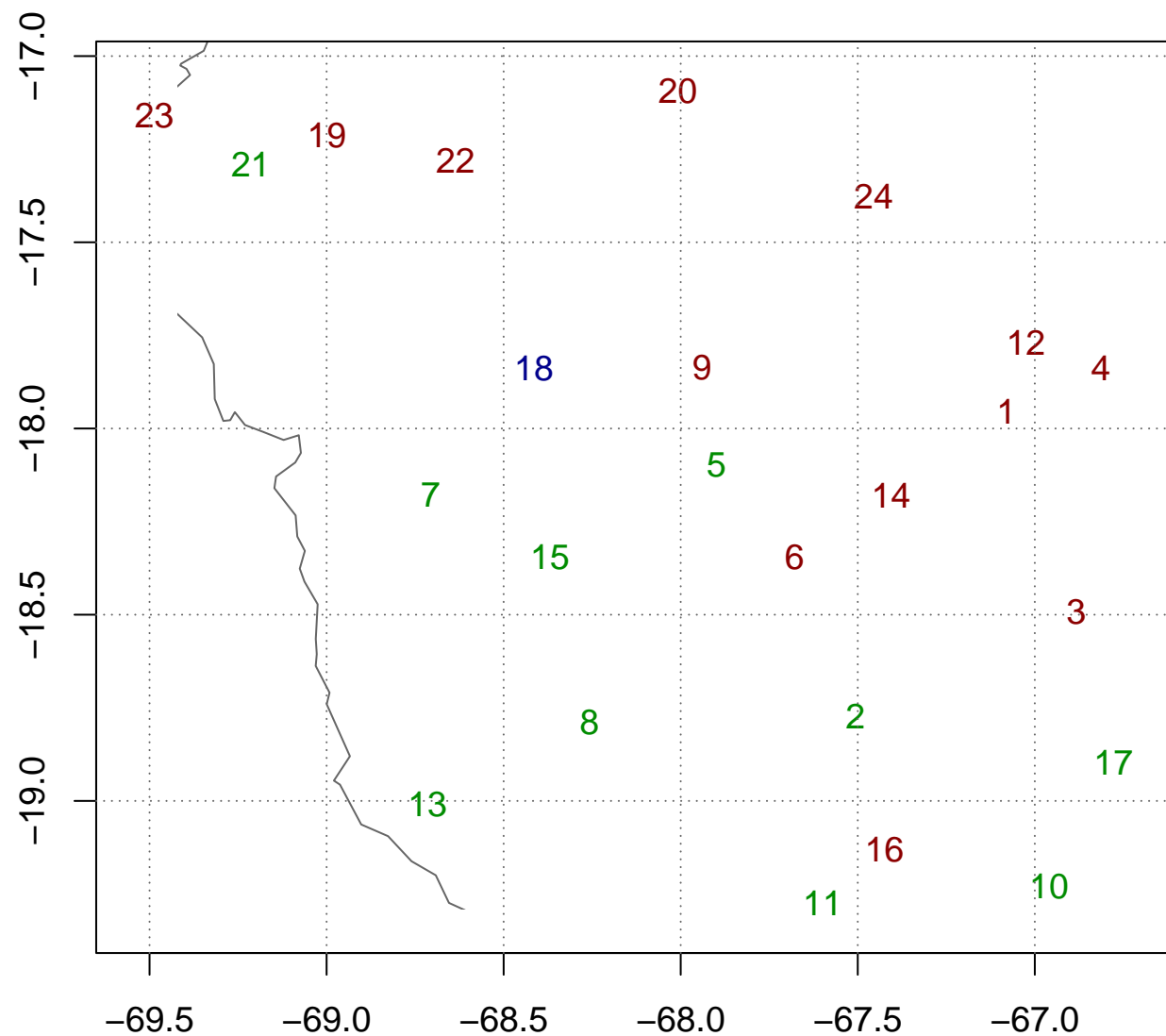
**Correlogram of first difference series**



# Dendrogram of station clusters



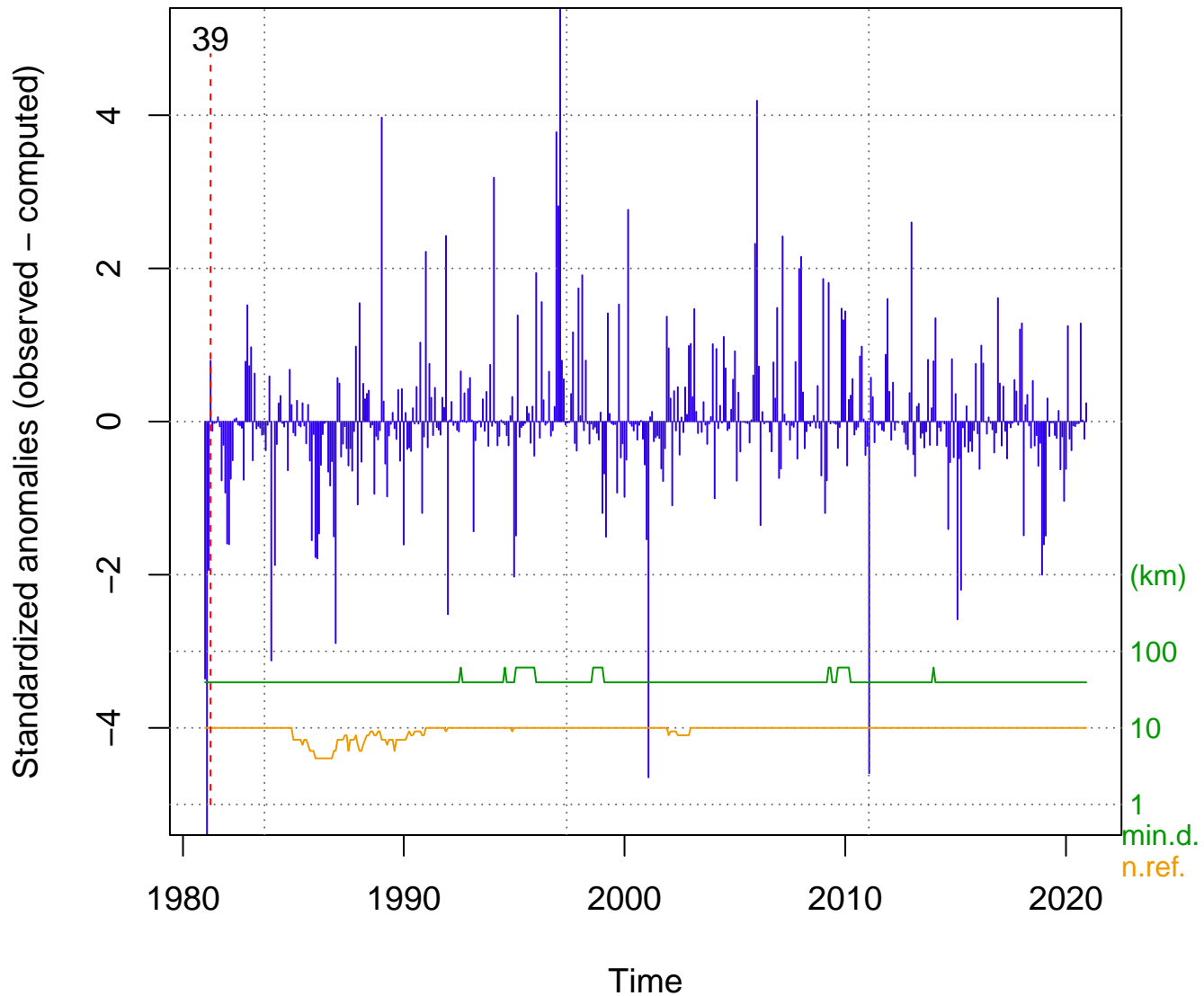
pre-m station locations (3 clusters)



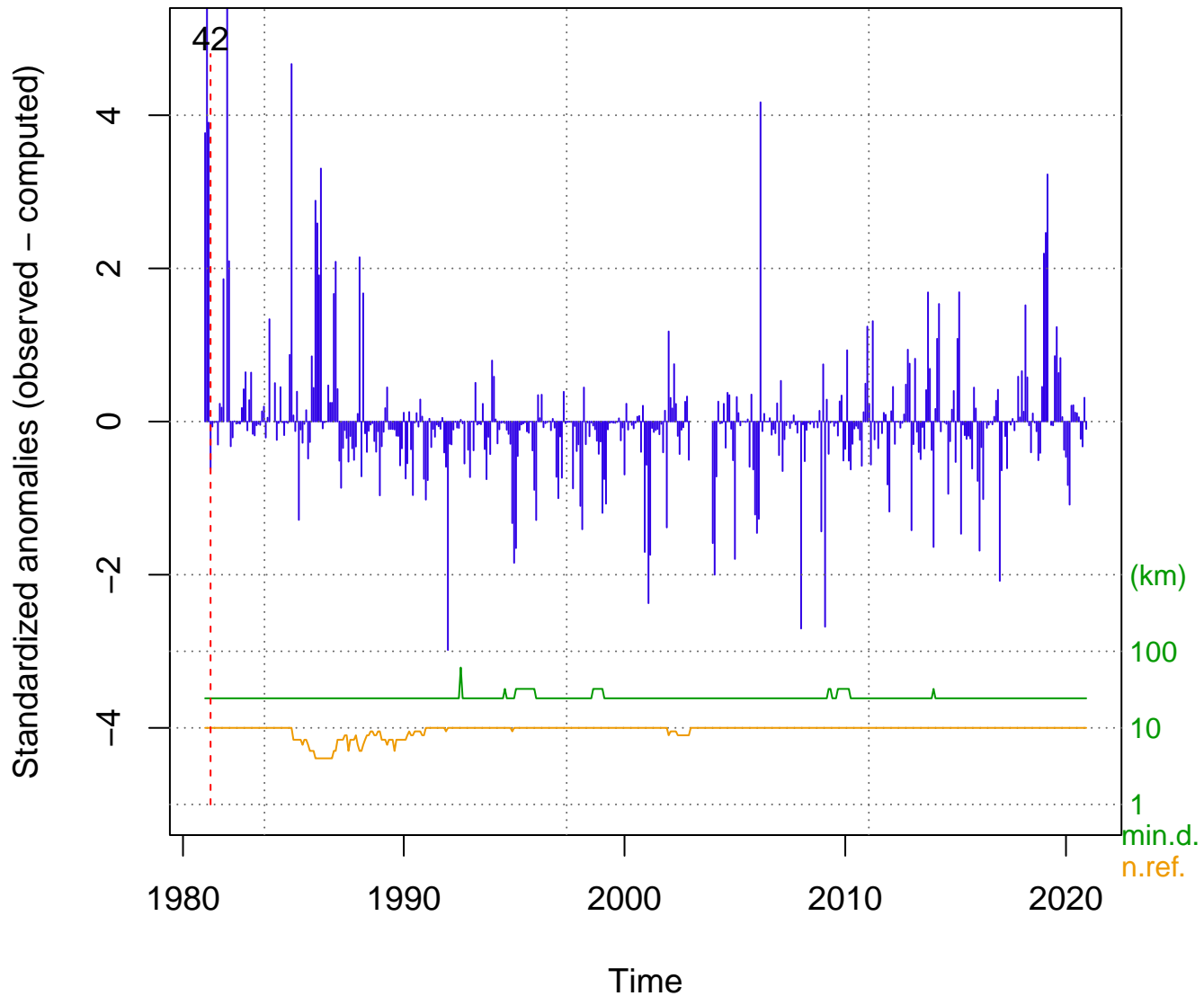
# Stage 1

Binary splits on 60 term  
stepped windows  
with  $\text{SNHT} > 30$   
and  $\text{wd} = 0 \text{ km}$

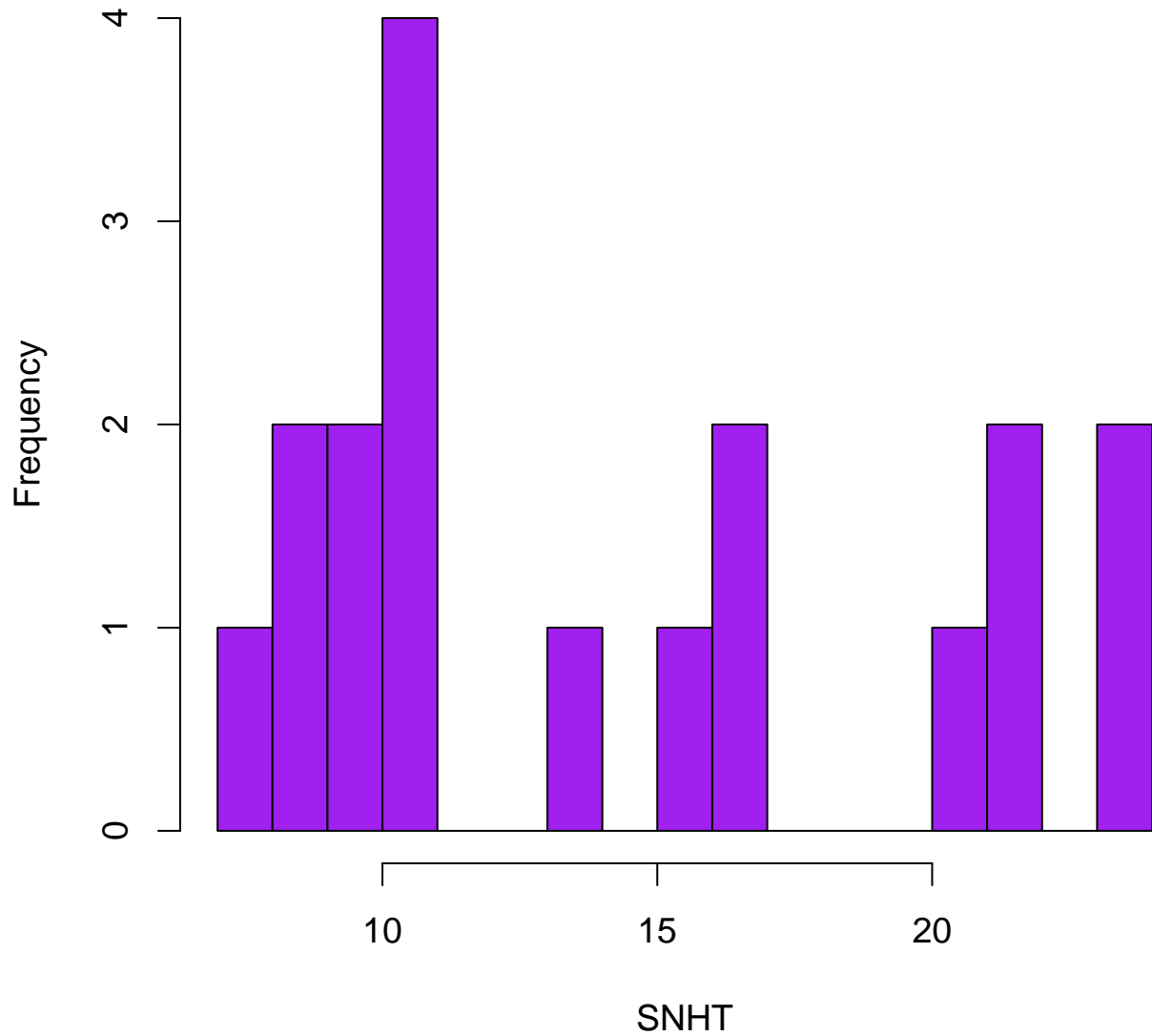
pre-m 22 (203)  
calacoto



pre-m 21 (202)  
berenguela



**Histogram of maximum SNHT (Stage 1)**

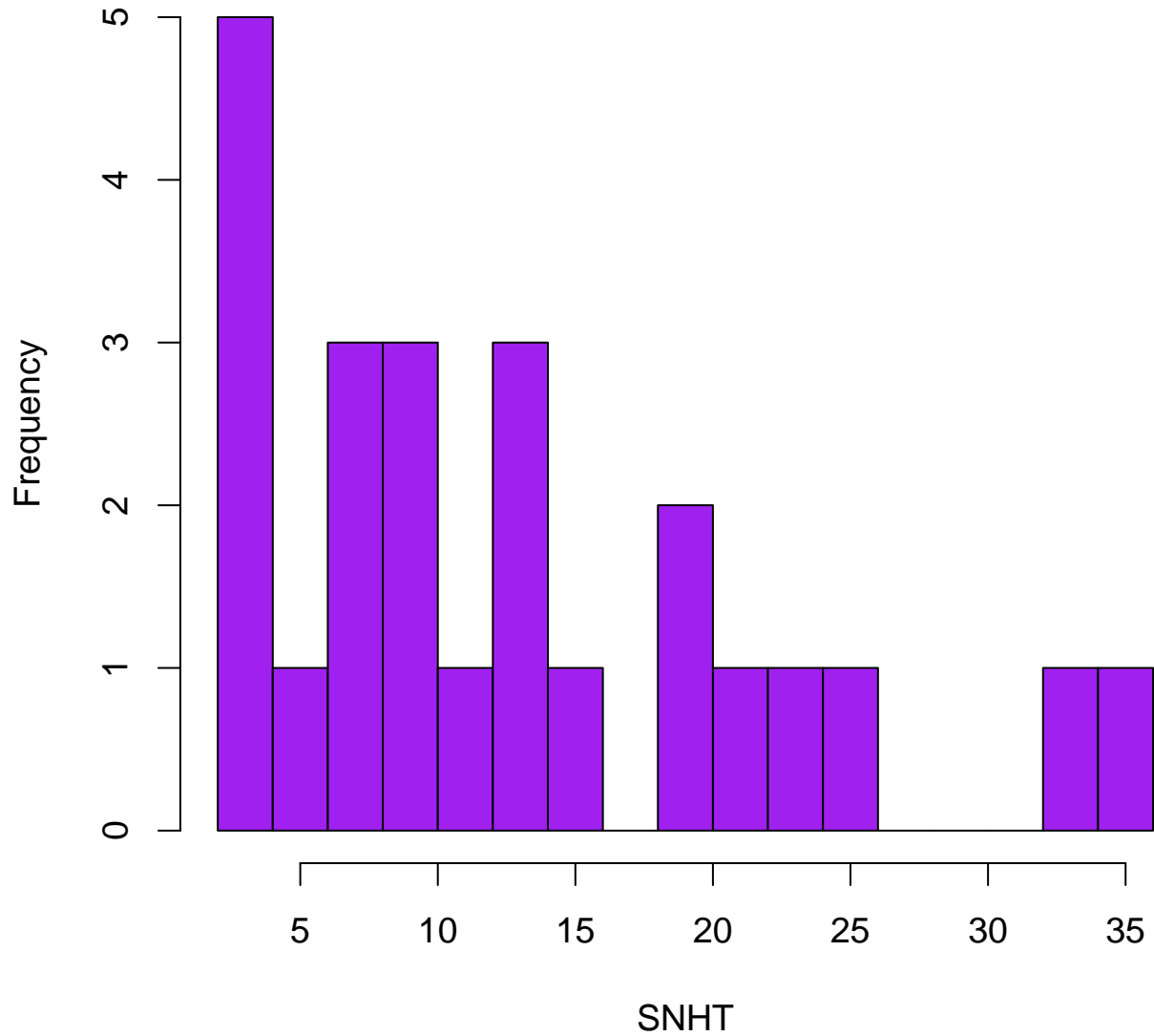


# Stage 2

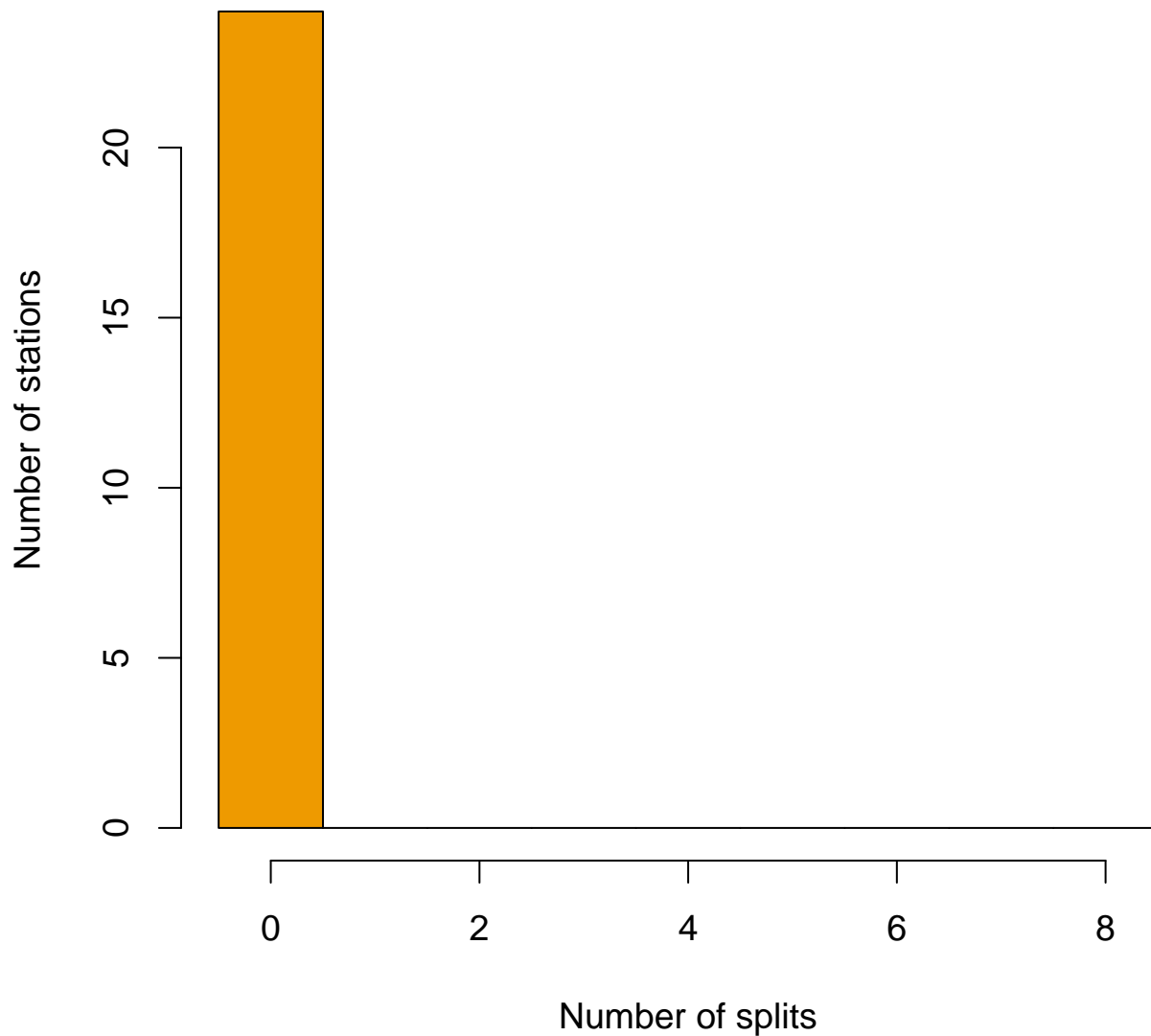
Binary splits on  
whole series  
with  $SNHT > 44$   
and  $wd = 0$  km



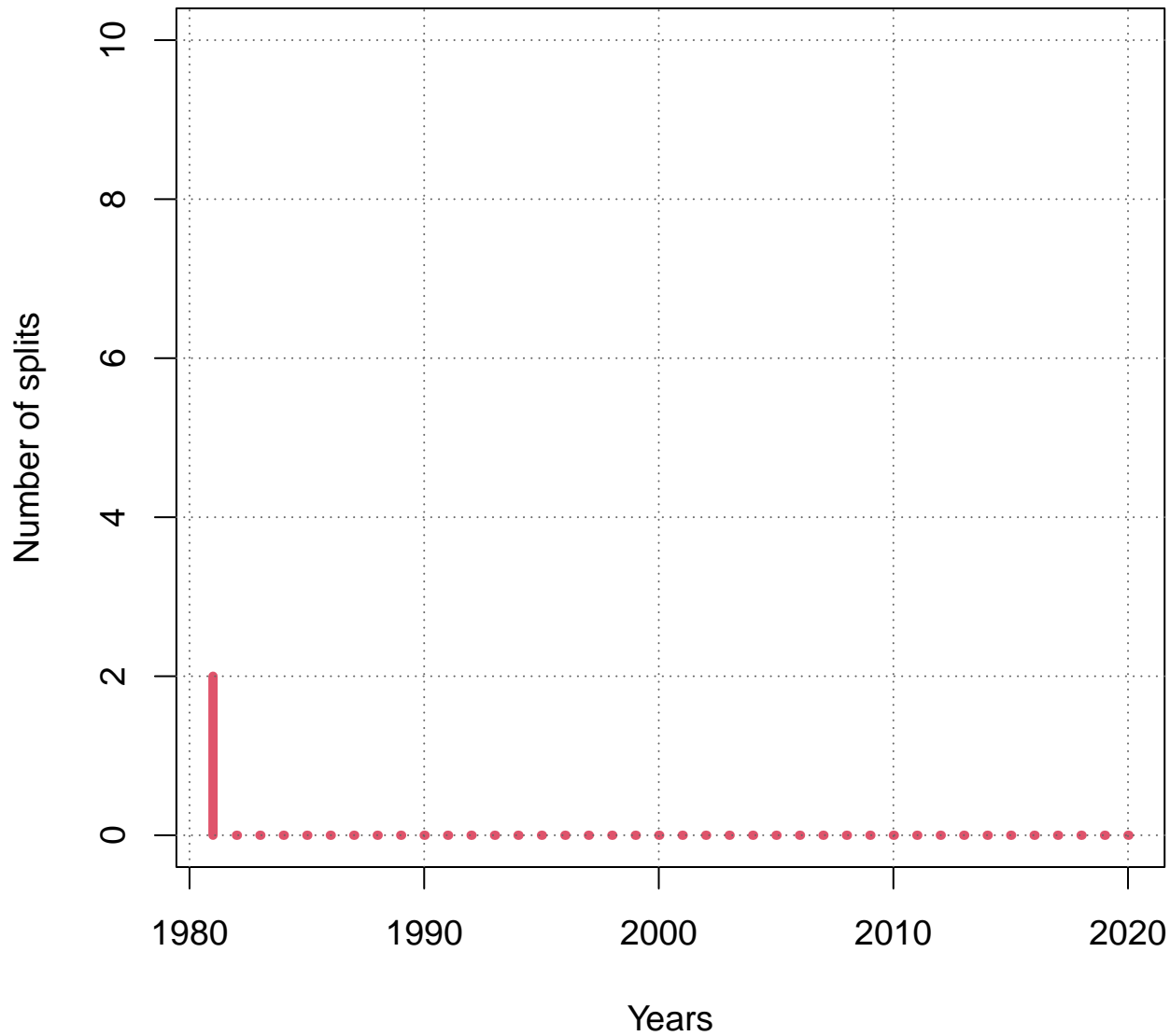
**Histogram of maximum SNHT (Stage 2)**



## Number of splits per station



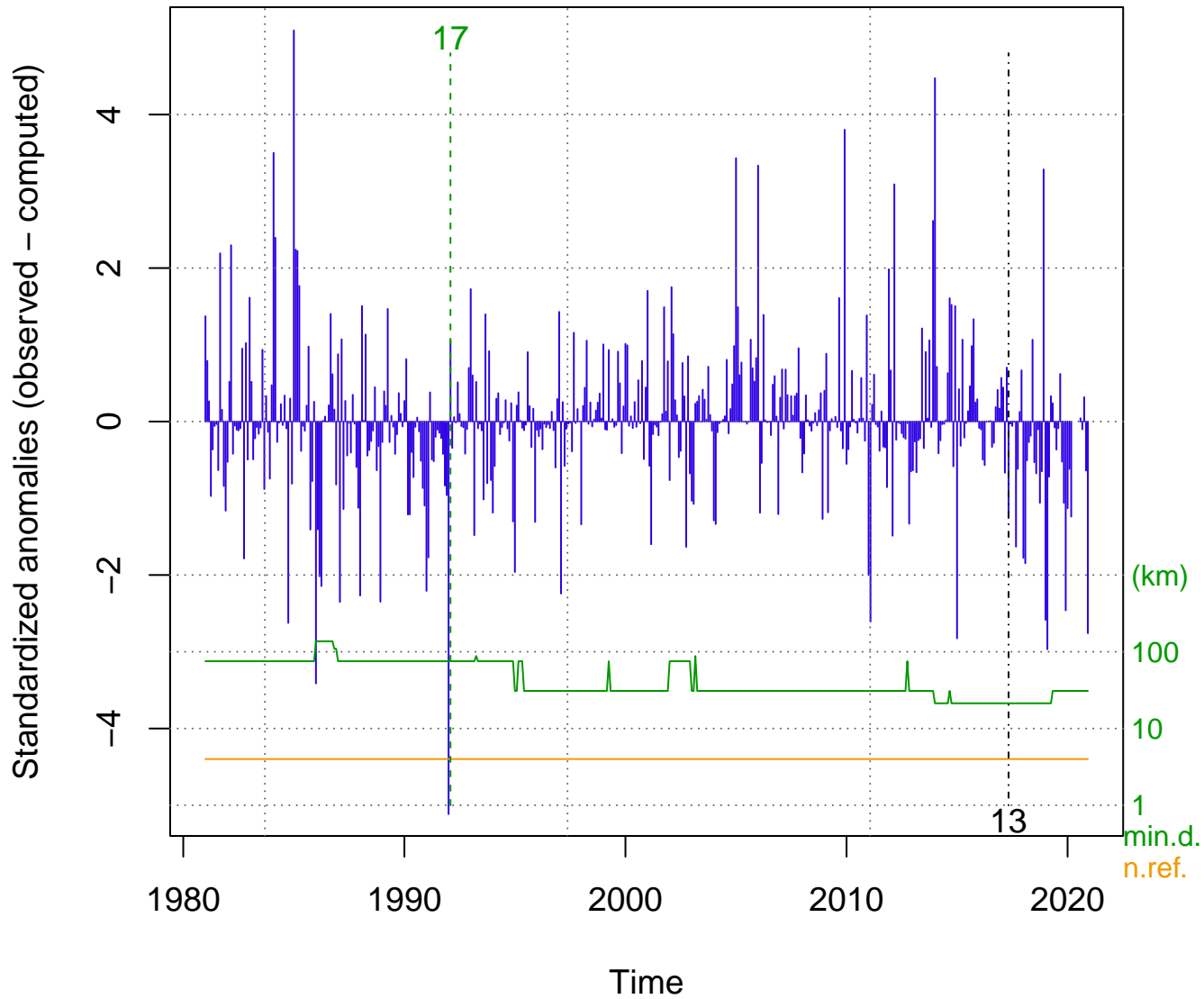
# Number of splits per year



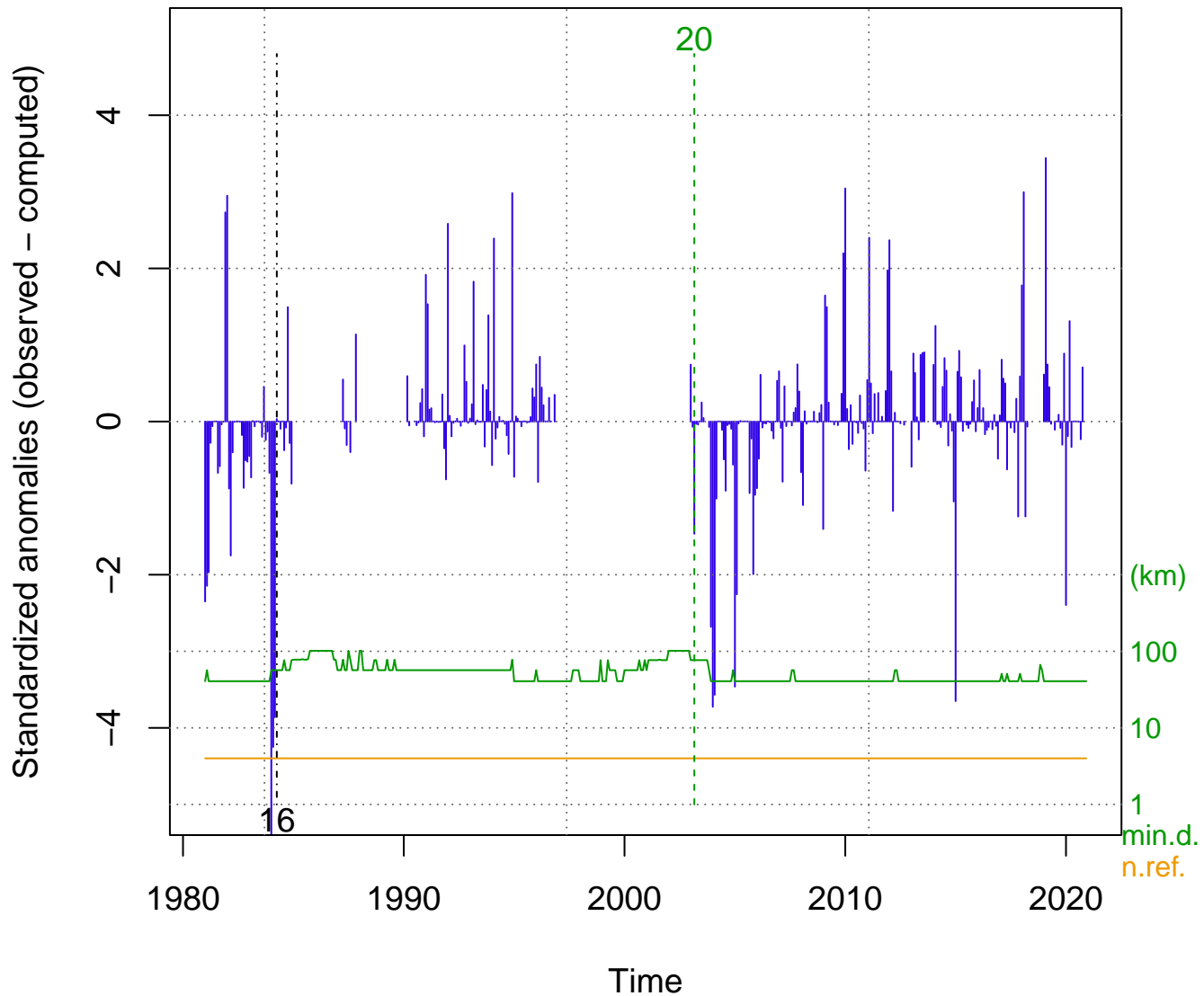
# Stage 3

Anomalies after  
missing data  
recalculation  
with  $wd = 100$  km  
(  $swa = 60$  )

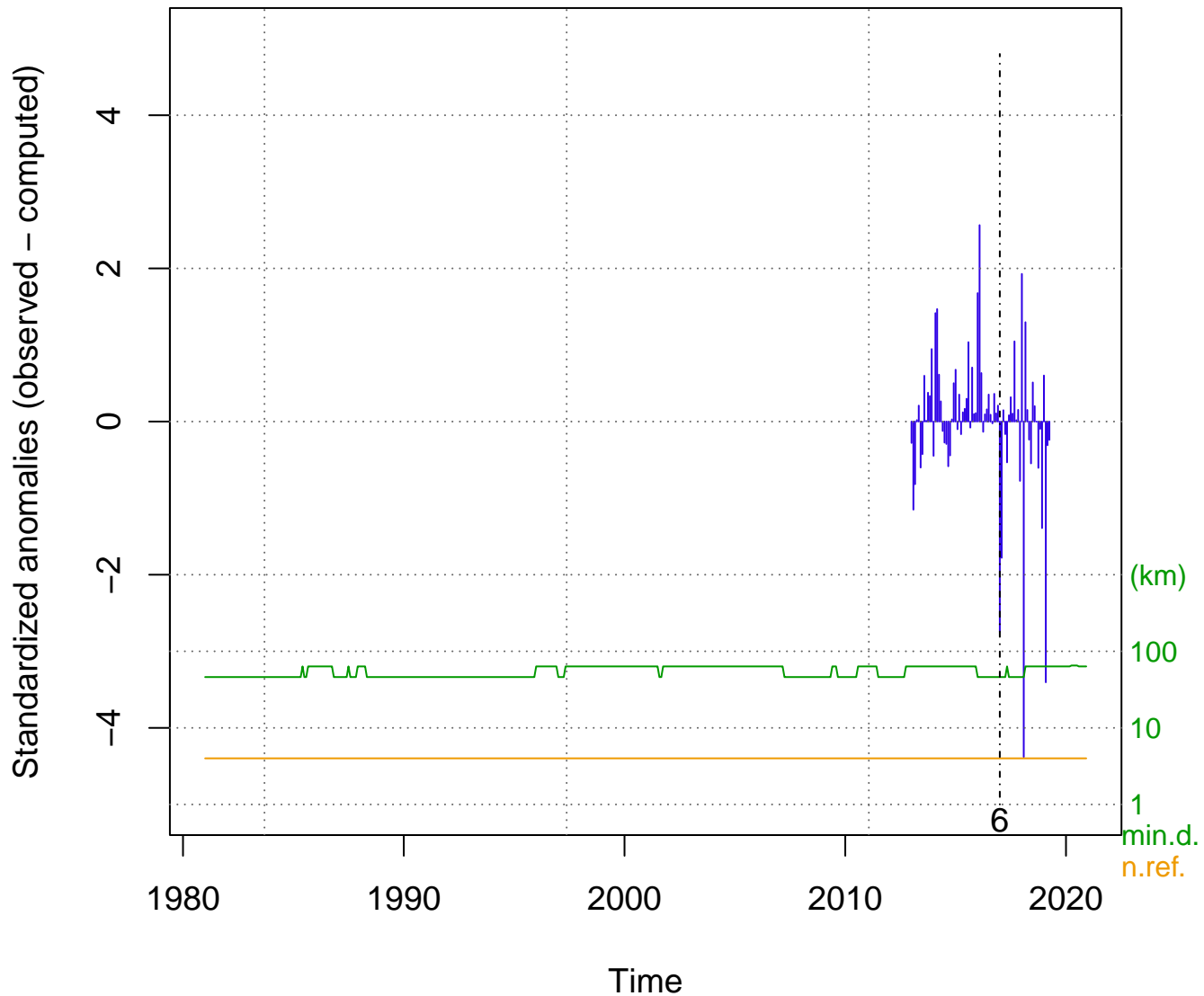
pre-m 1 (100)  
aeropuerto



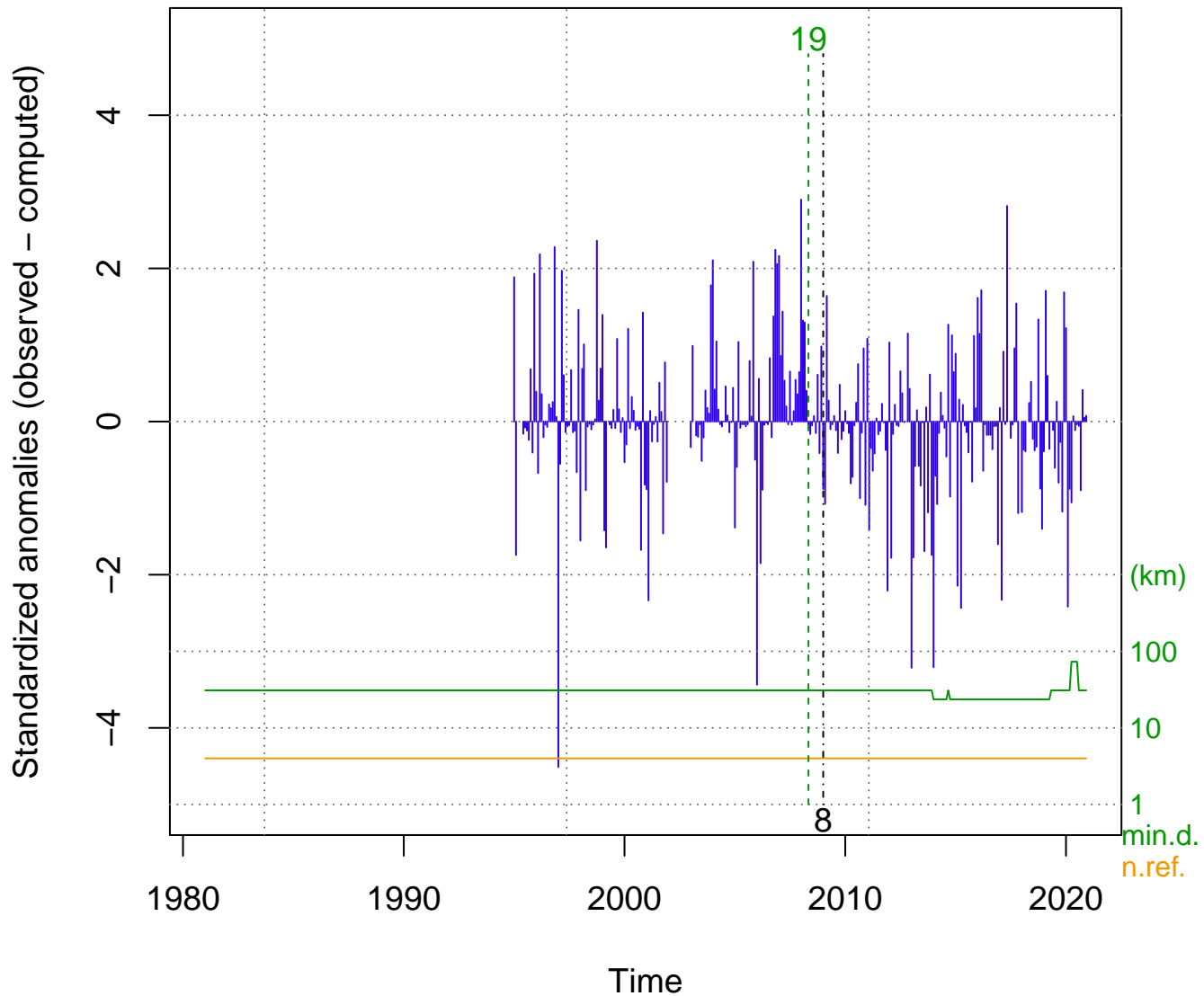
# pre-m 2 (101) andamarca



pre-m 3 (102)  
antequera

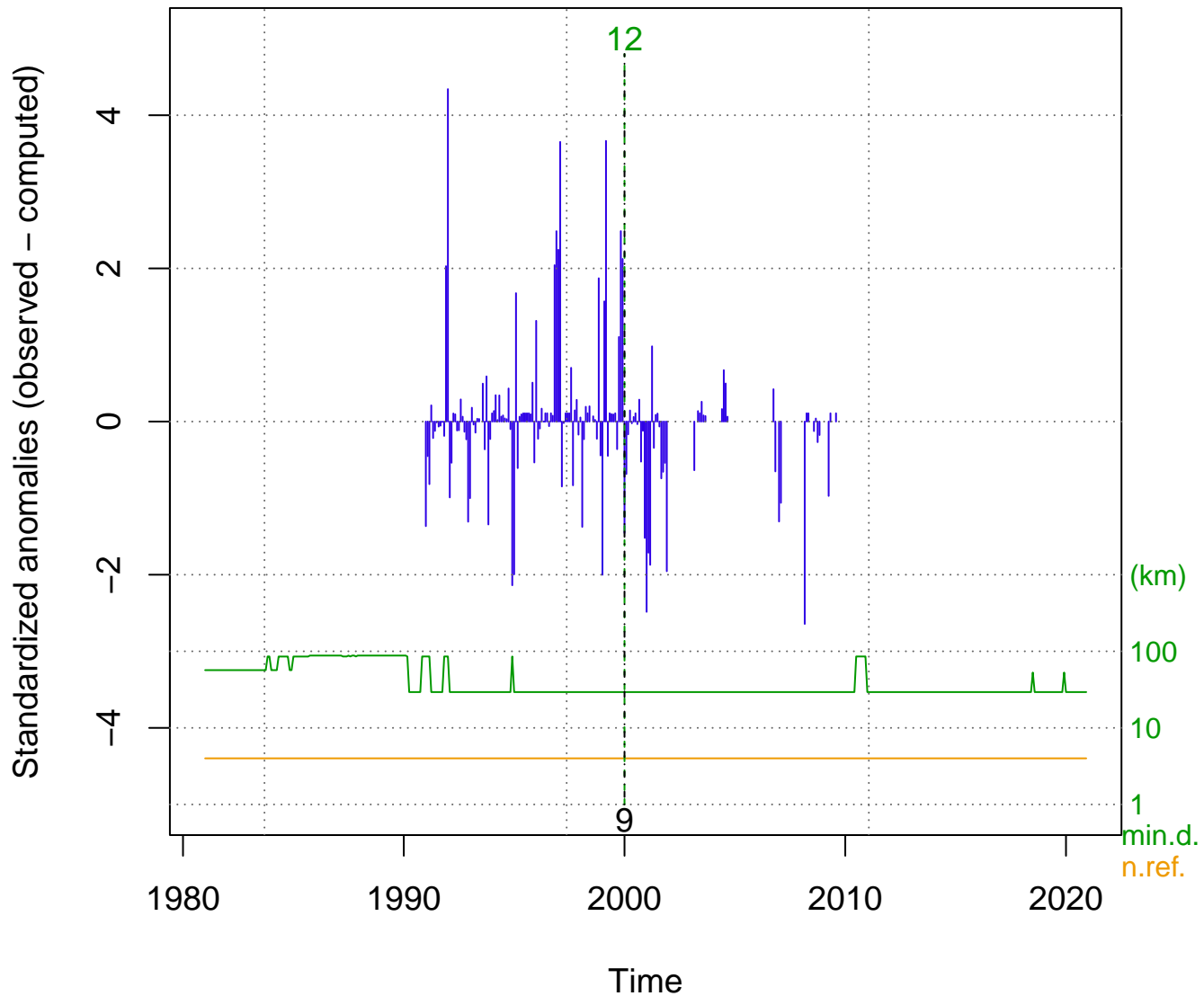


pre-m 4 (105)  
chillca

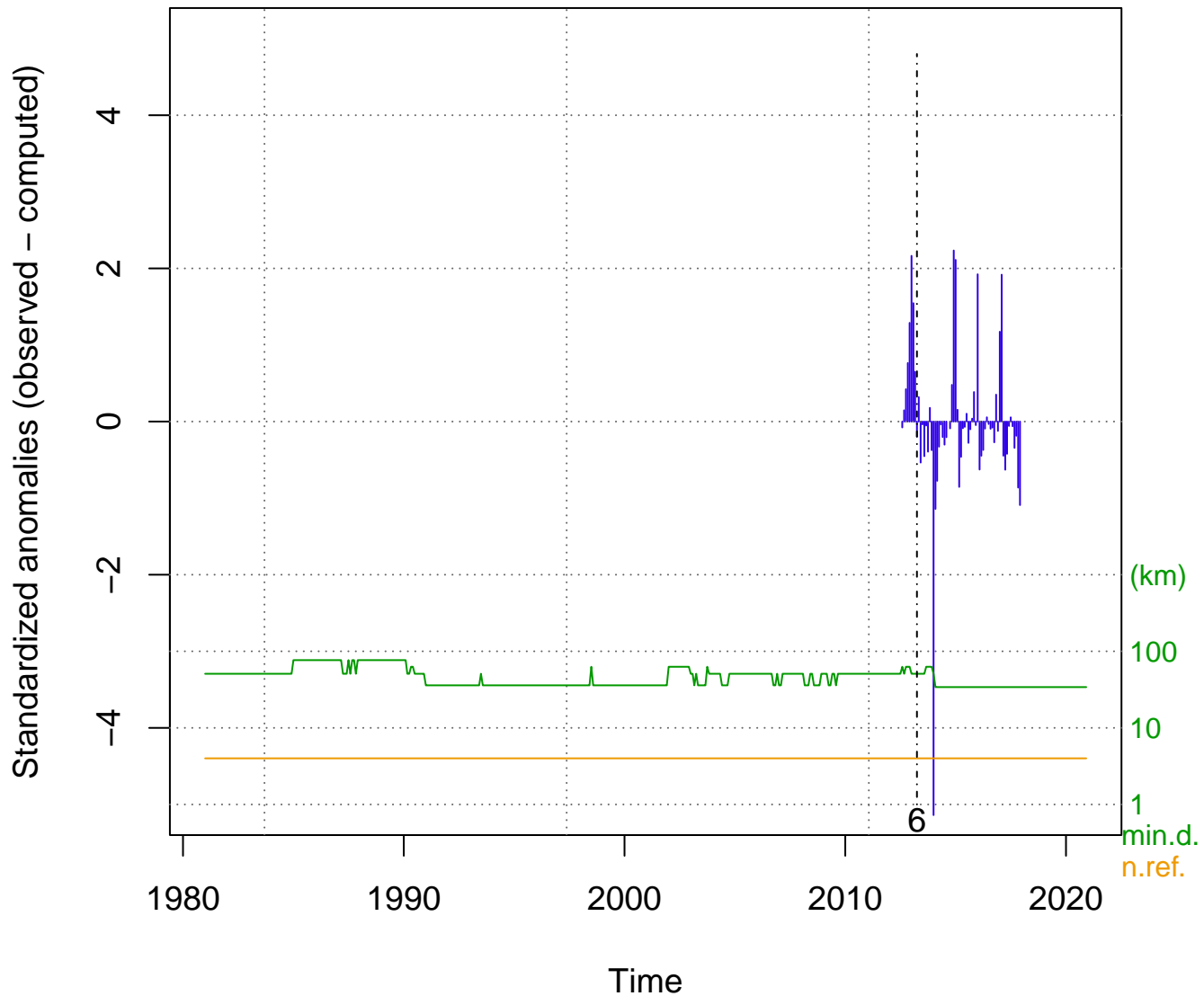




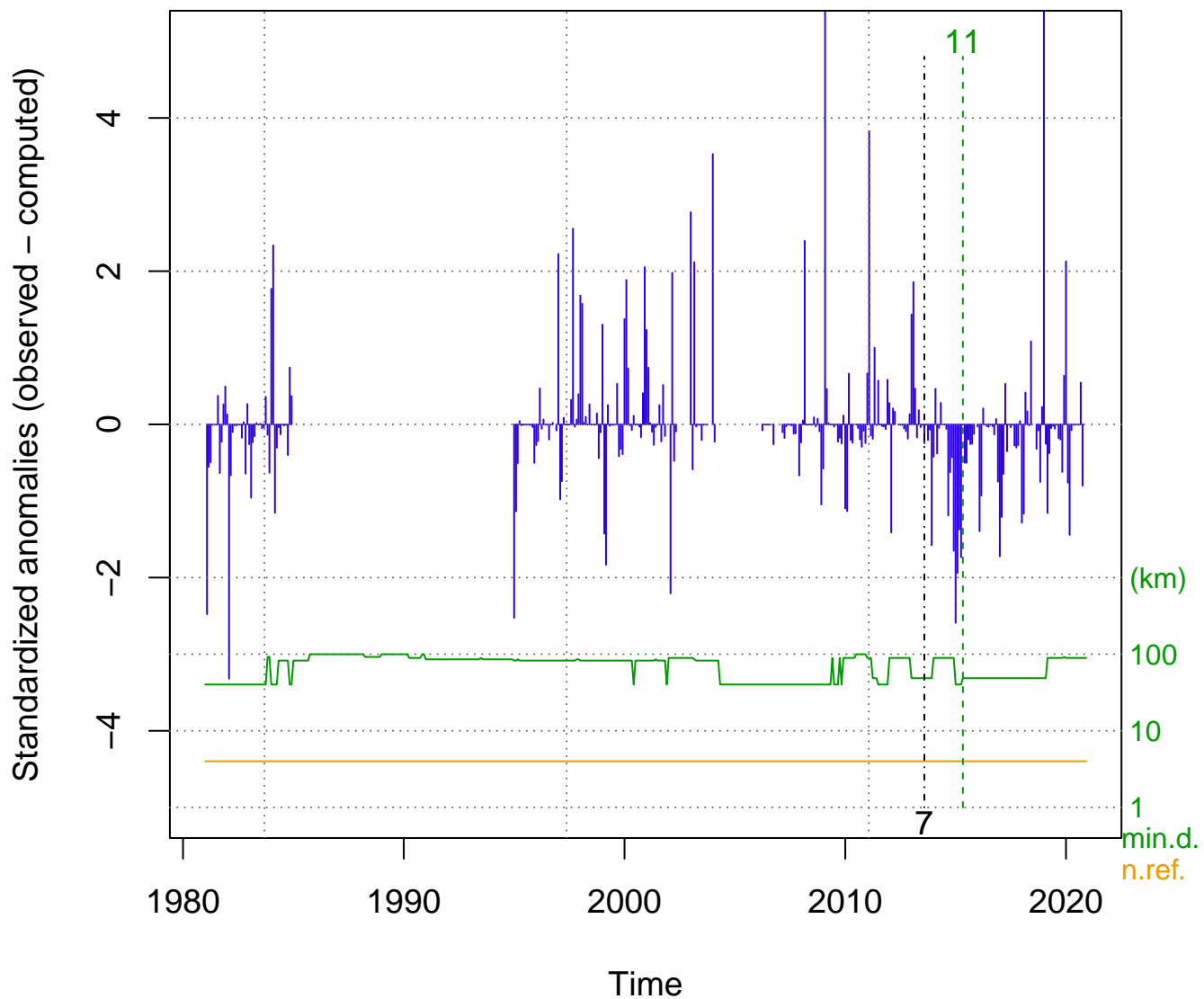
pre-m 5 (106)  
choquecota



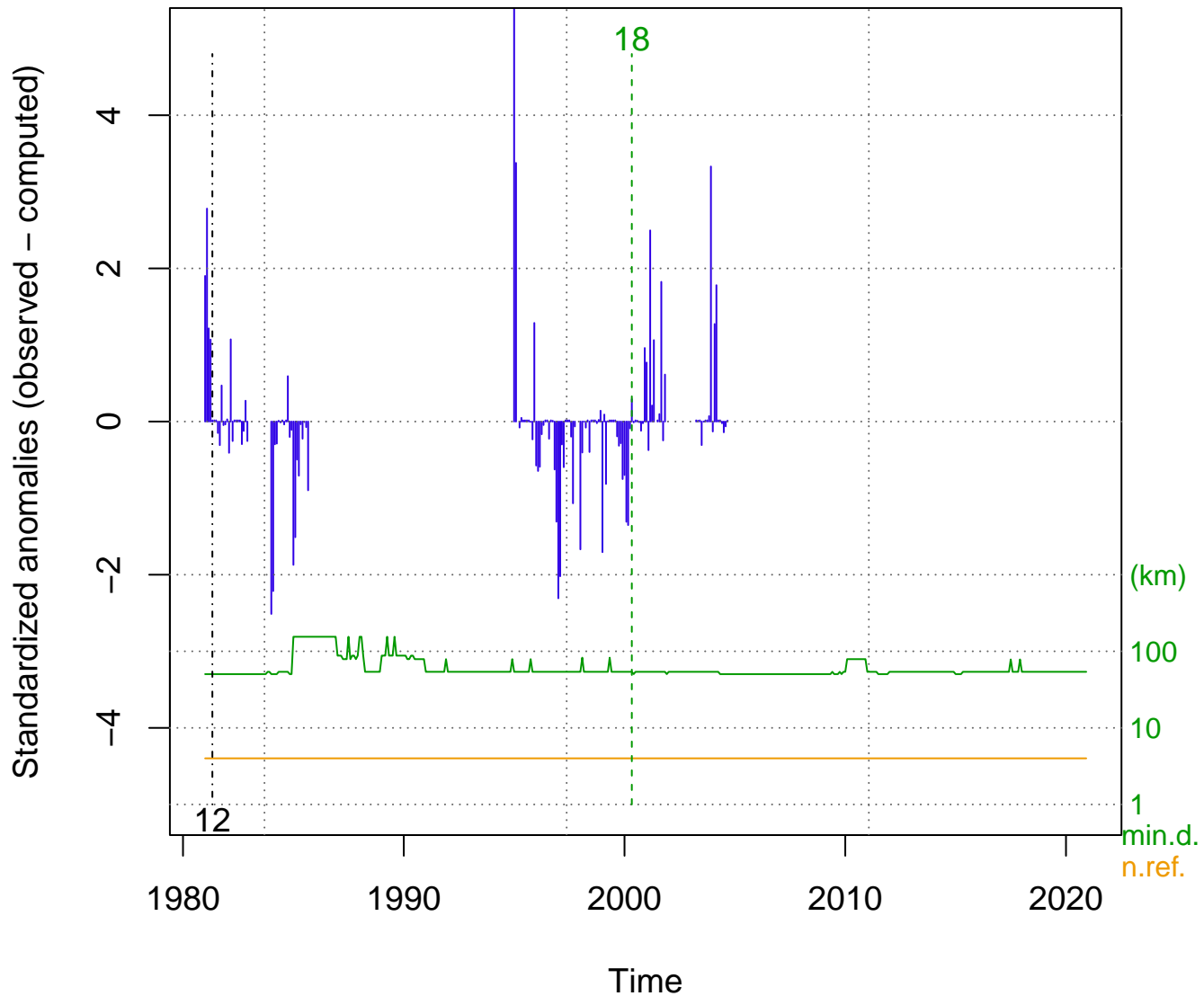
pre-m 6 (107)  
corque



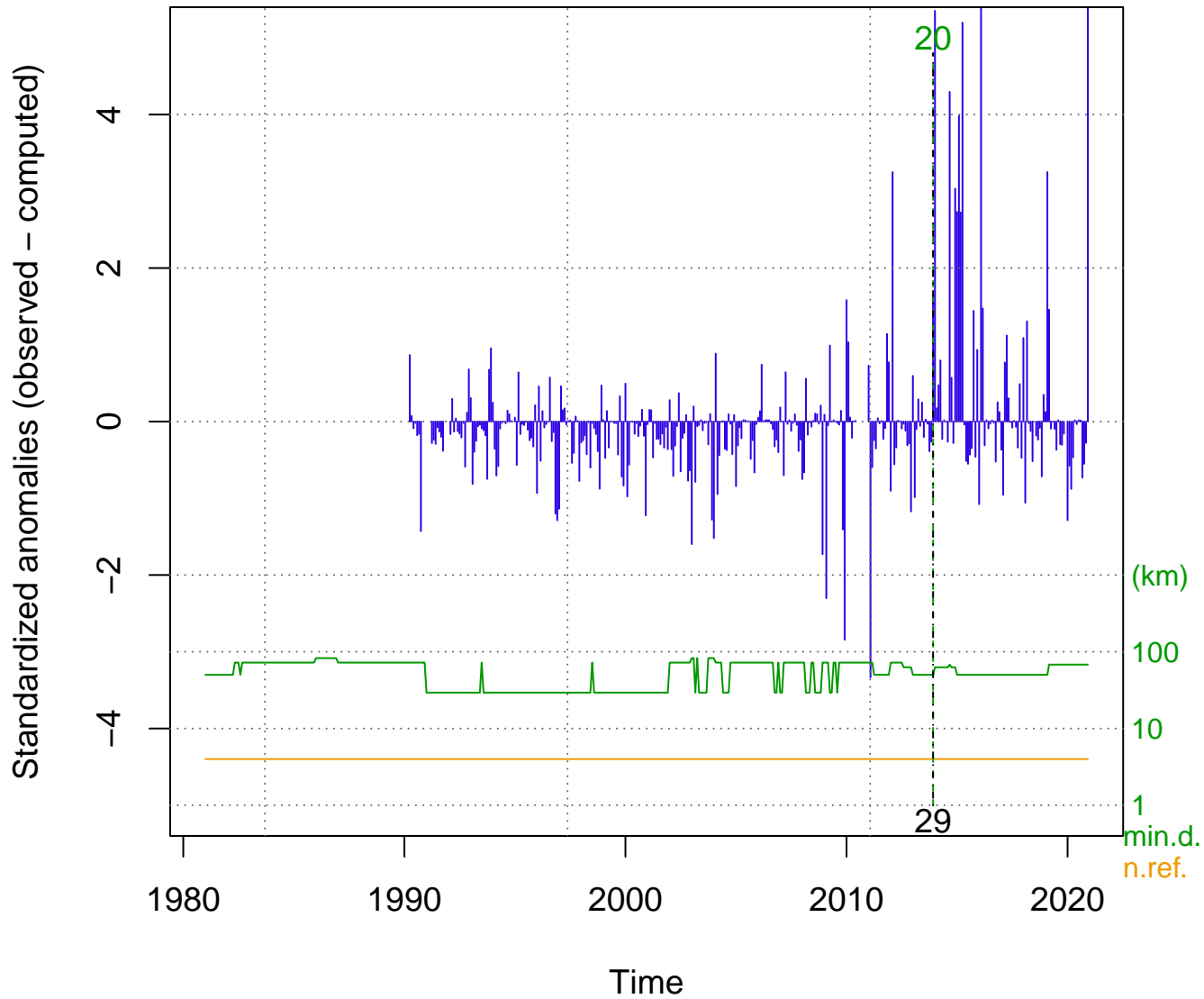
pre-m 7 (108)  
cosapa



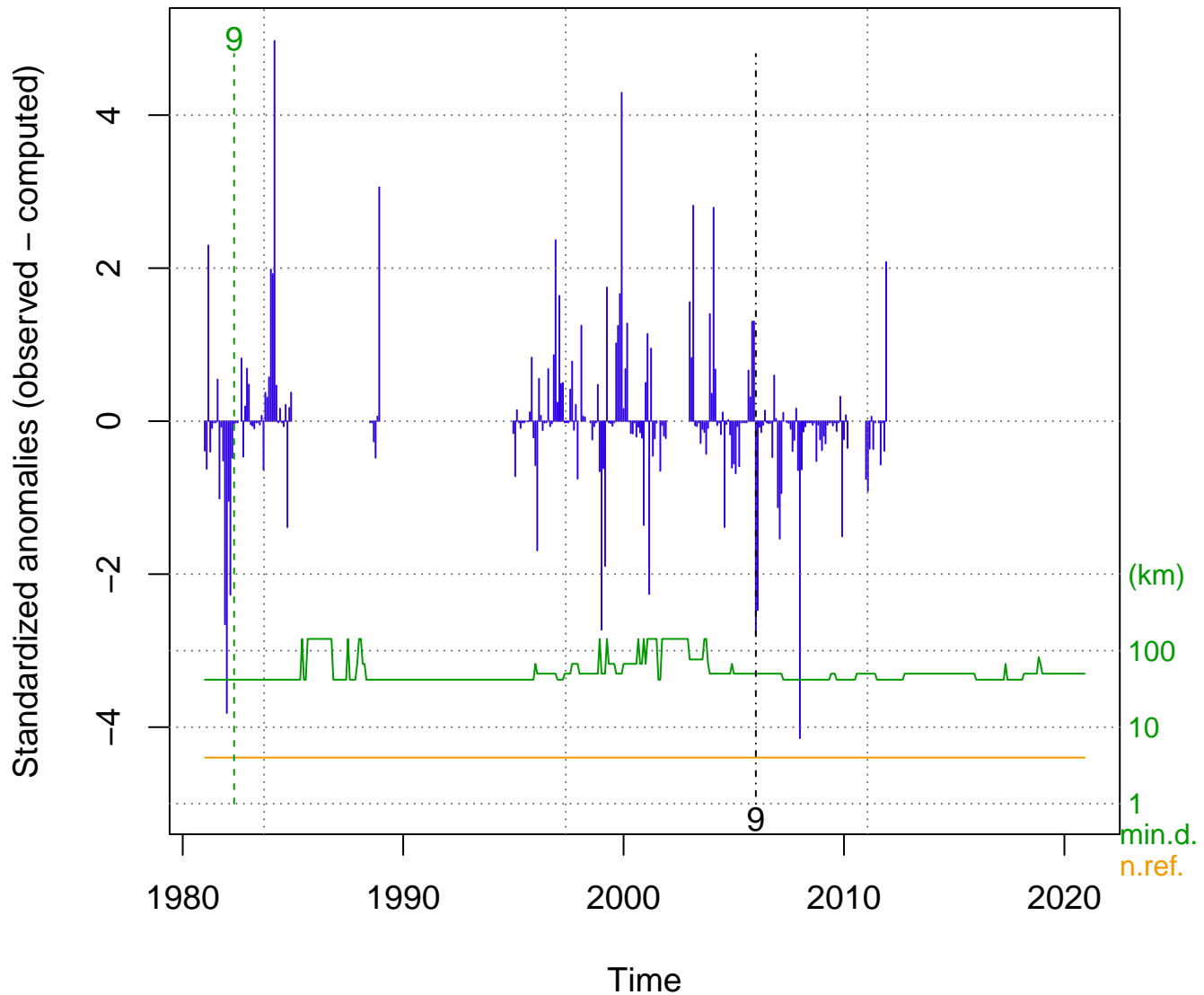
pre-m 8 (111)  
huachacalla



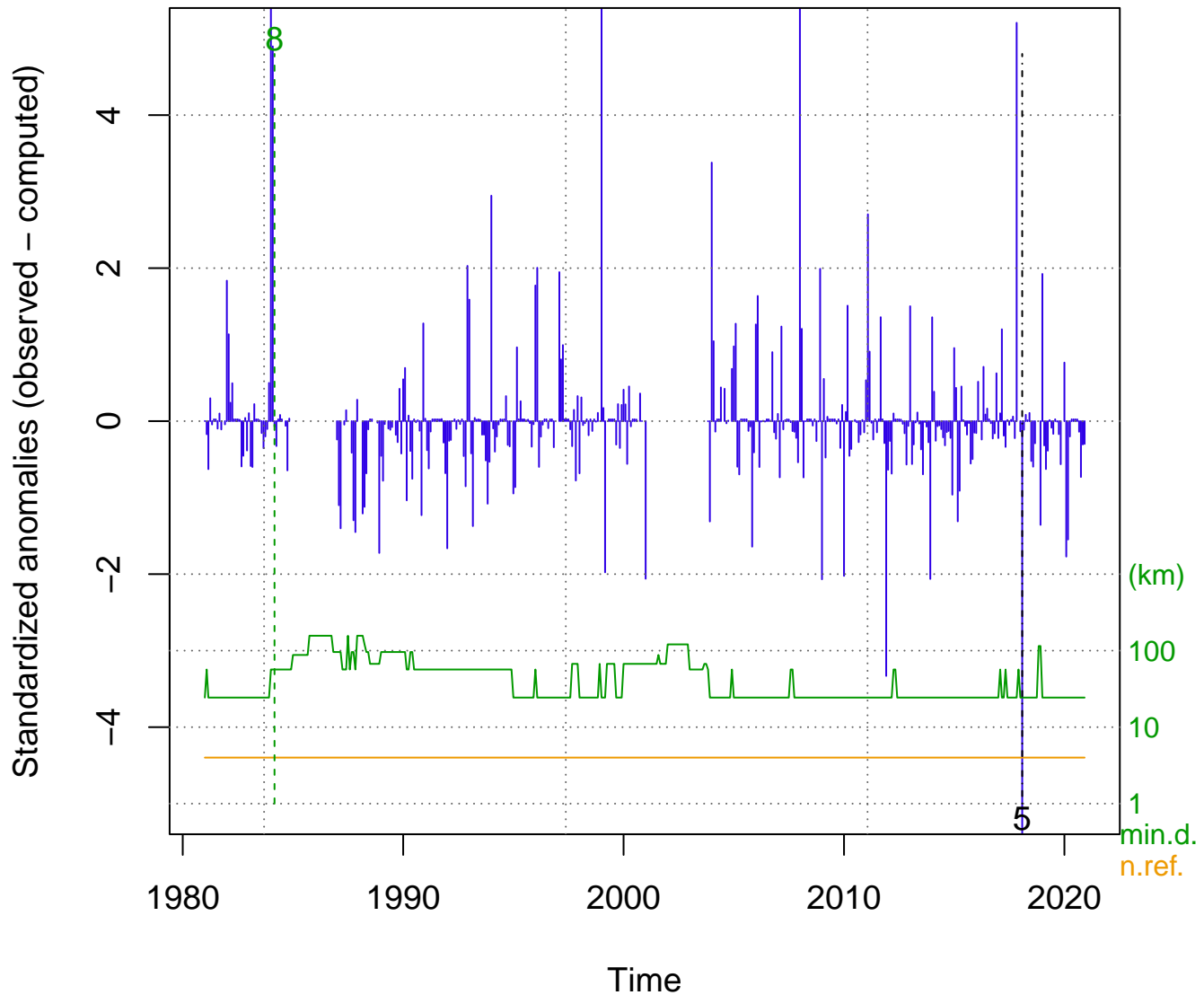
pre-m 9 (112)  
huayllamarca



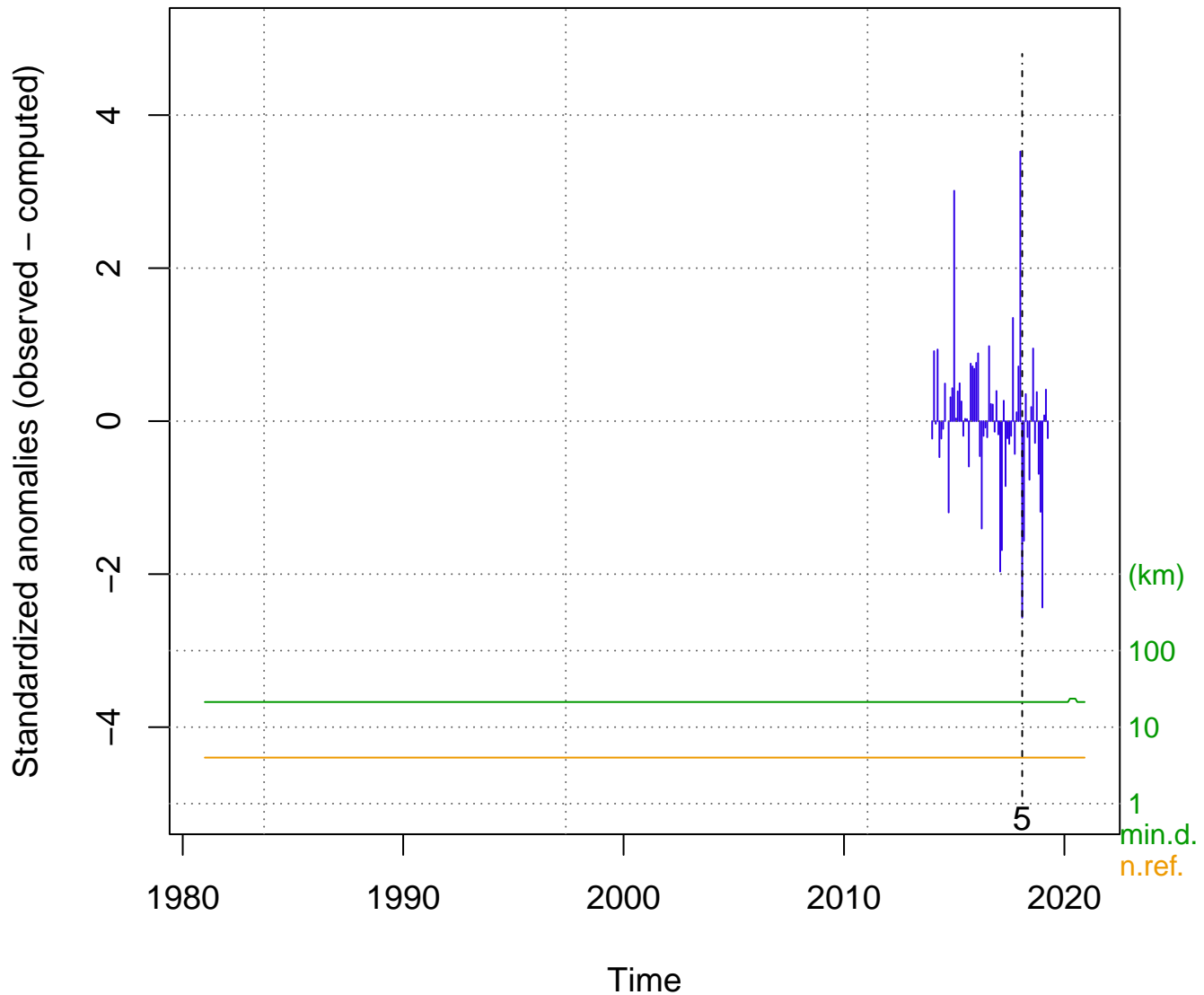
# pre-m 10 (113) quillacas



pre-m 11 (114)  
san\_martin

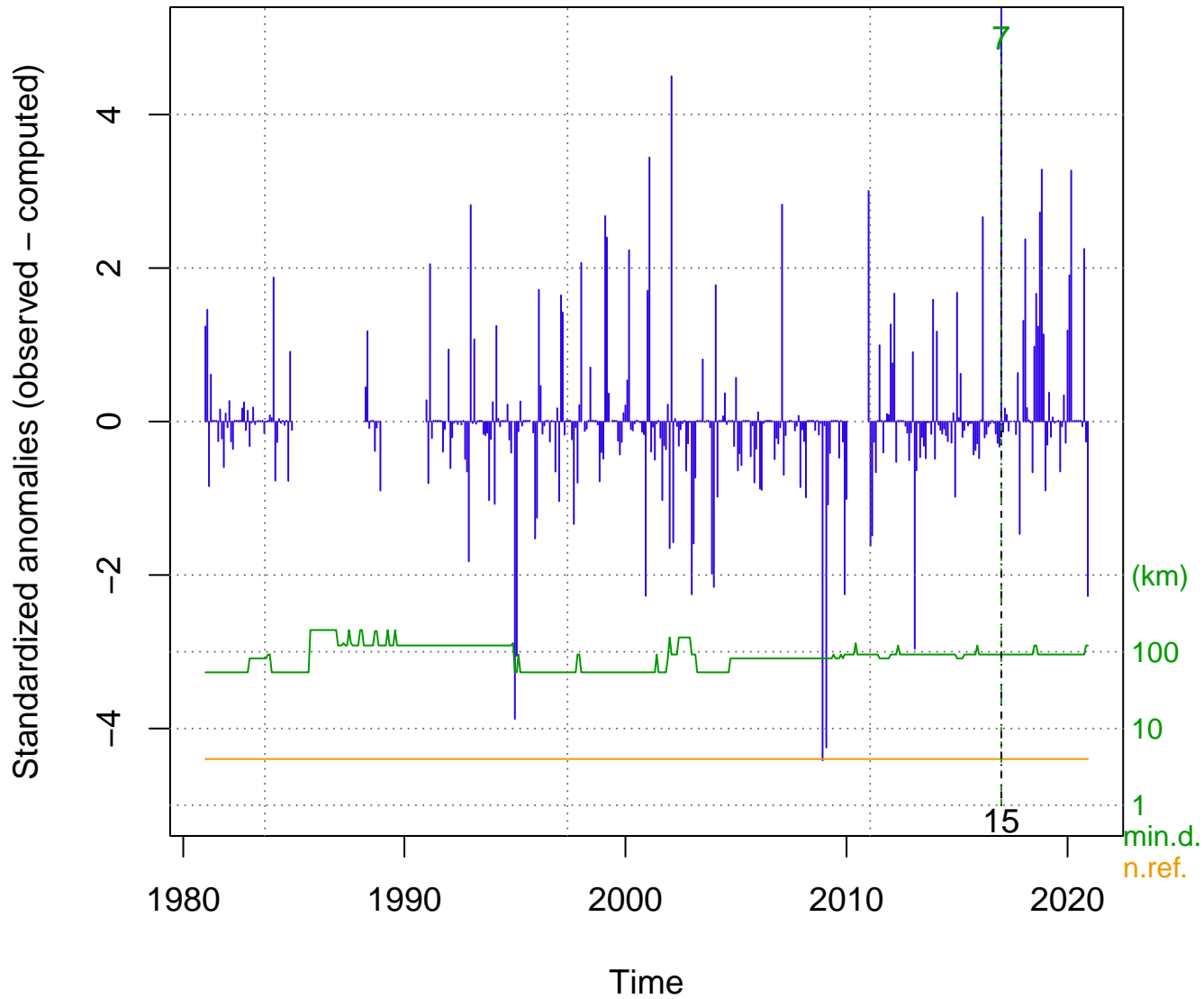


pre-m 12 (115)  
soracachi

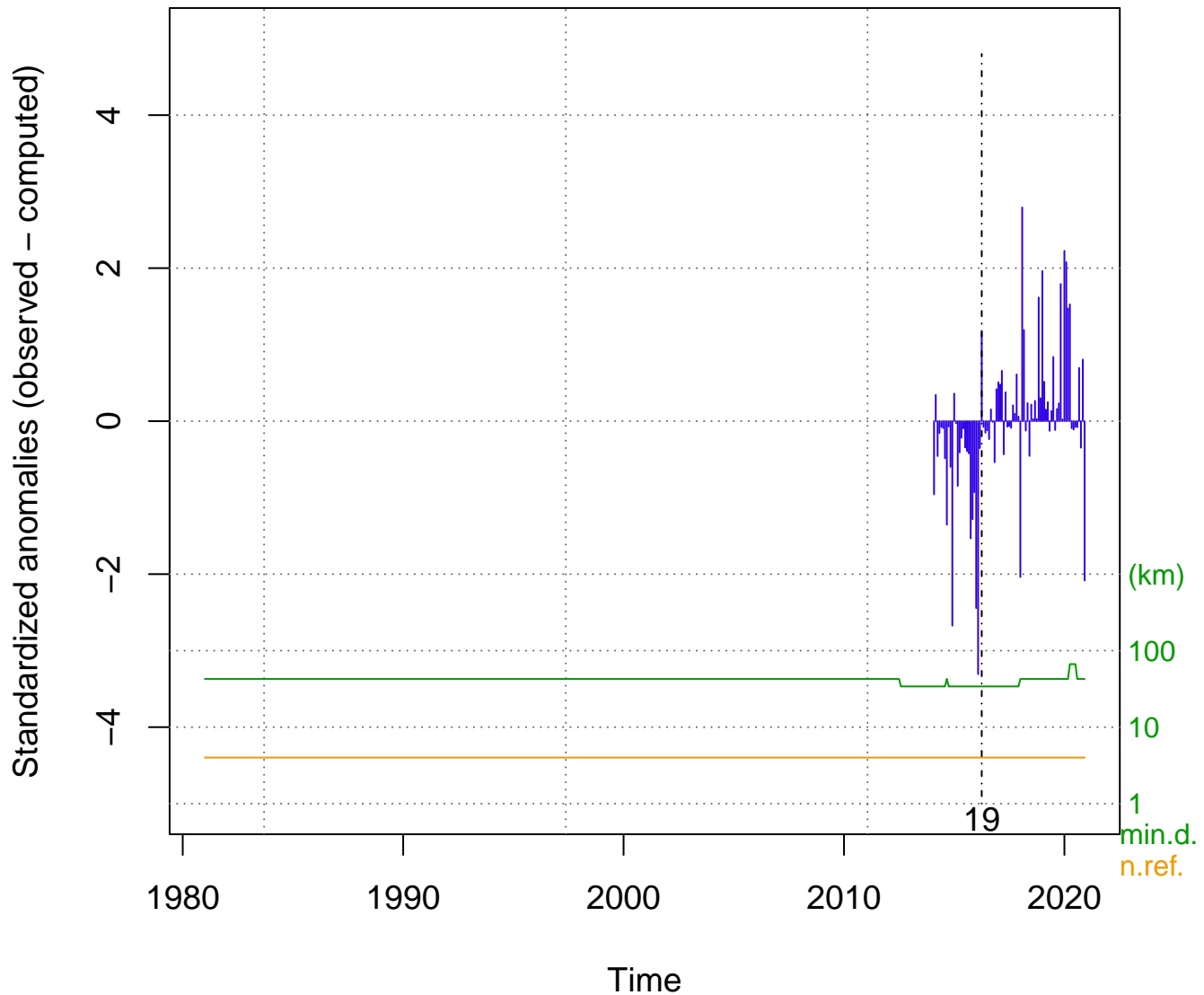




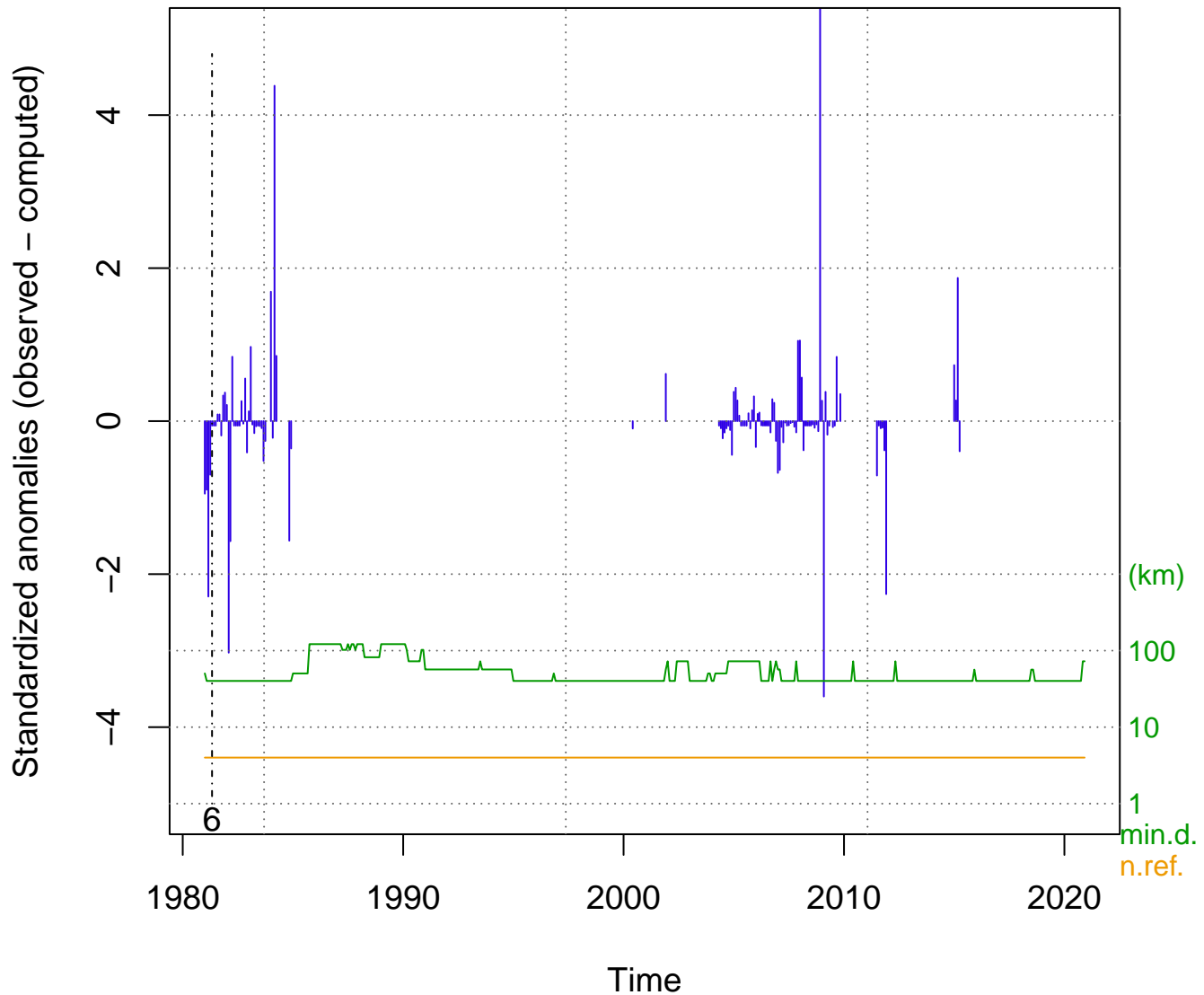
pre-m 13 (116)  
todo\_santos



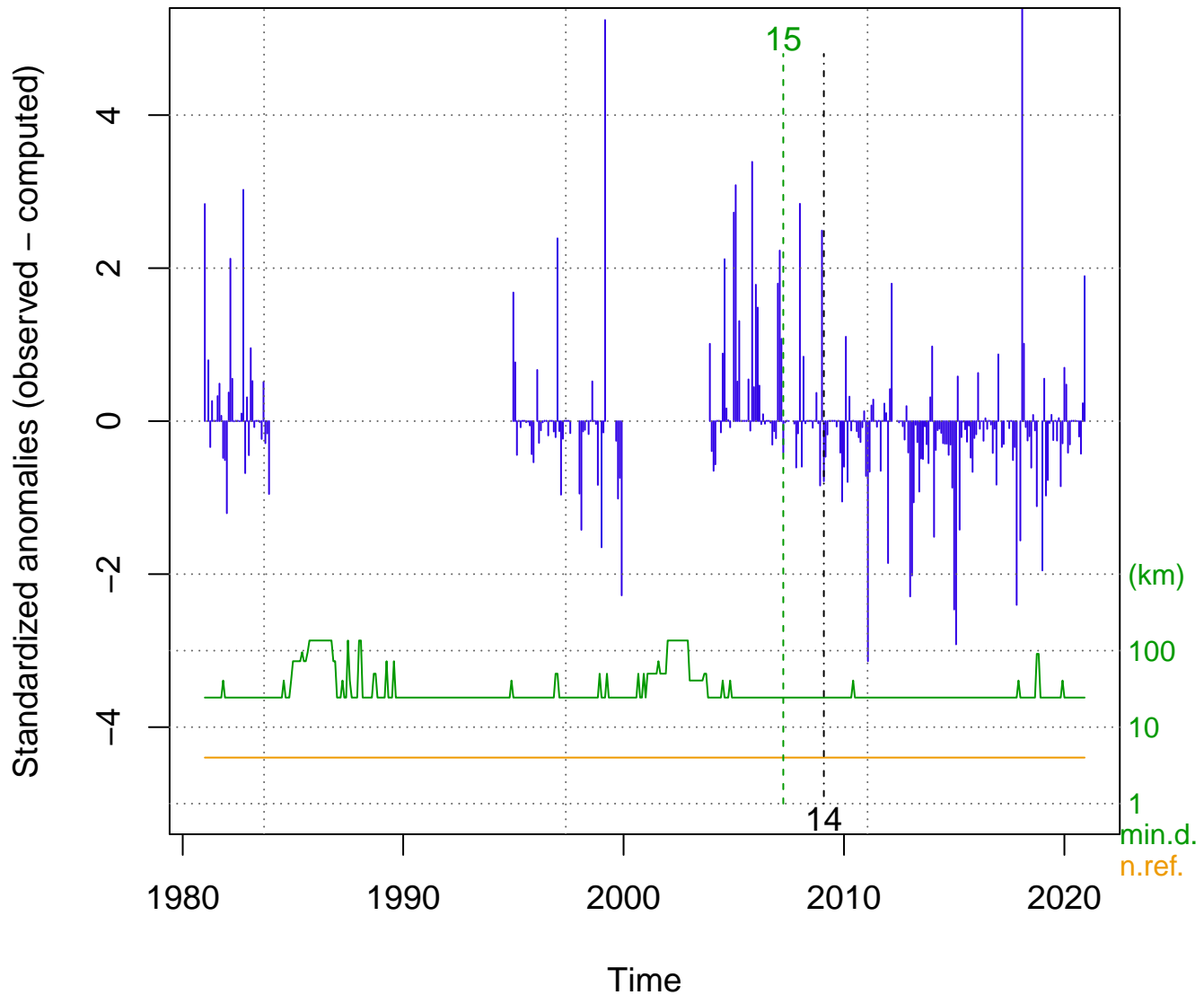
pre-m 14 (117)  
toledo



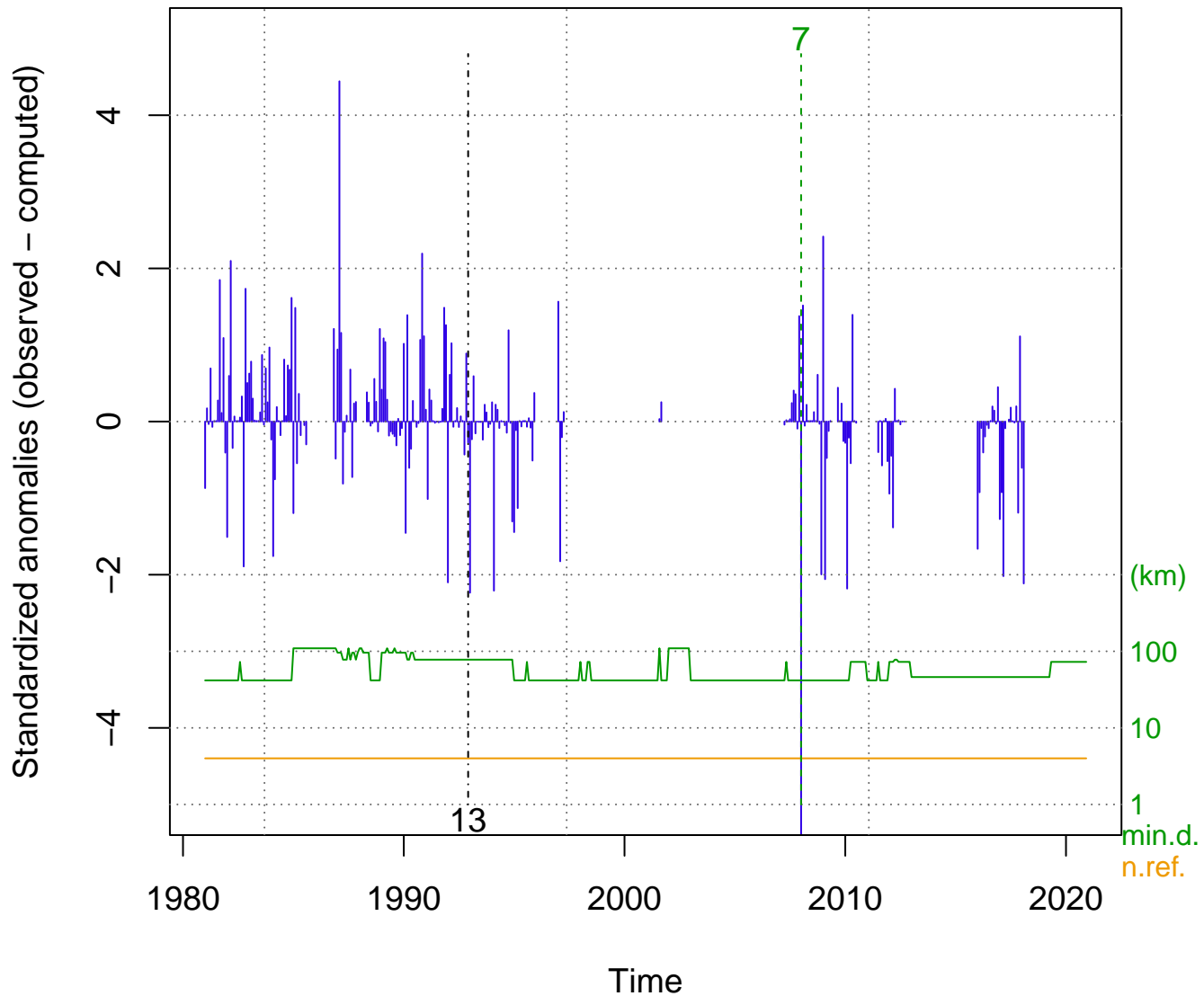
pre-m 15 (118)  
turco



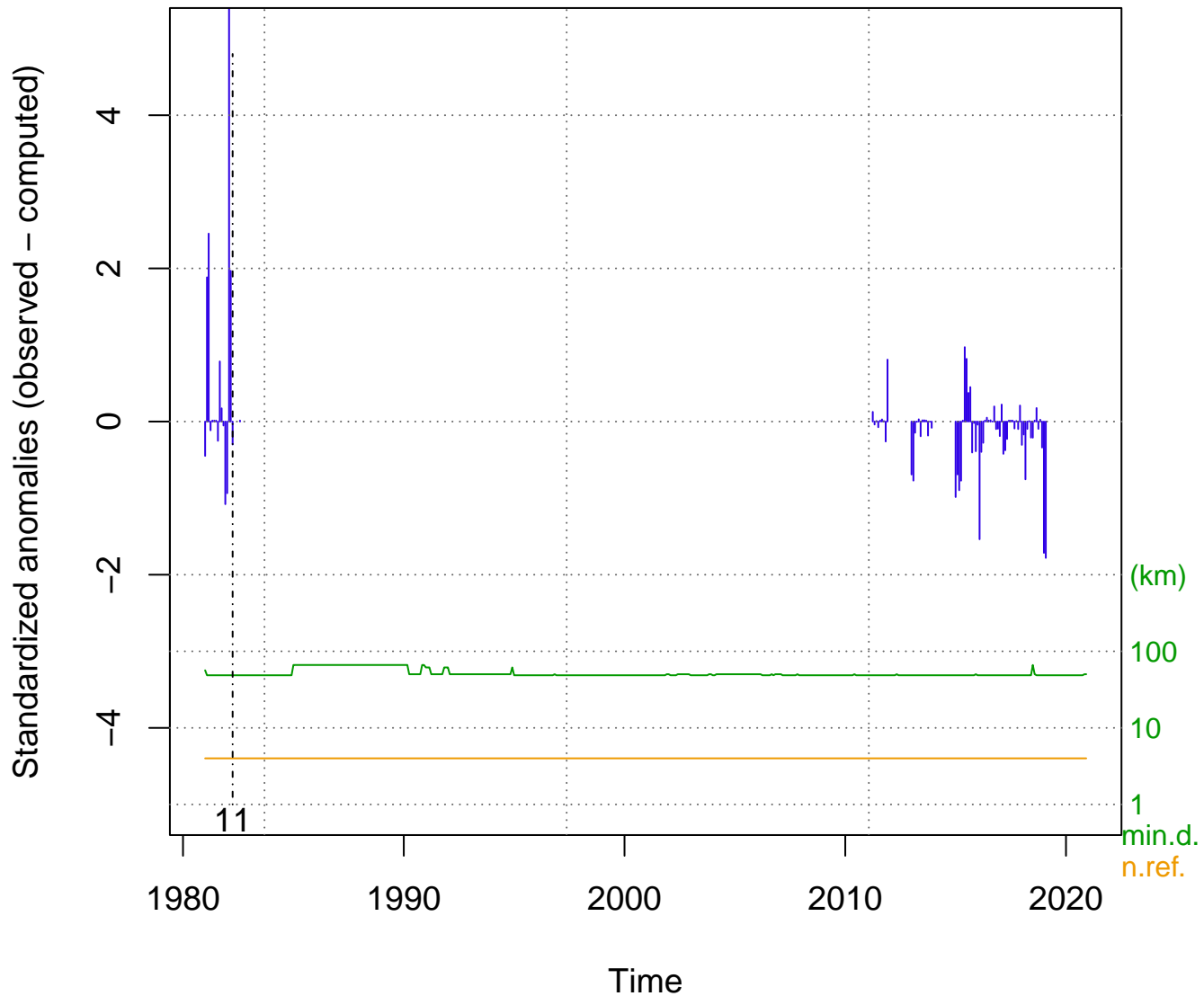
pre-m 16 (119)  
ucumasi



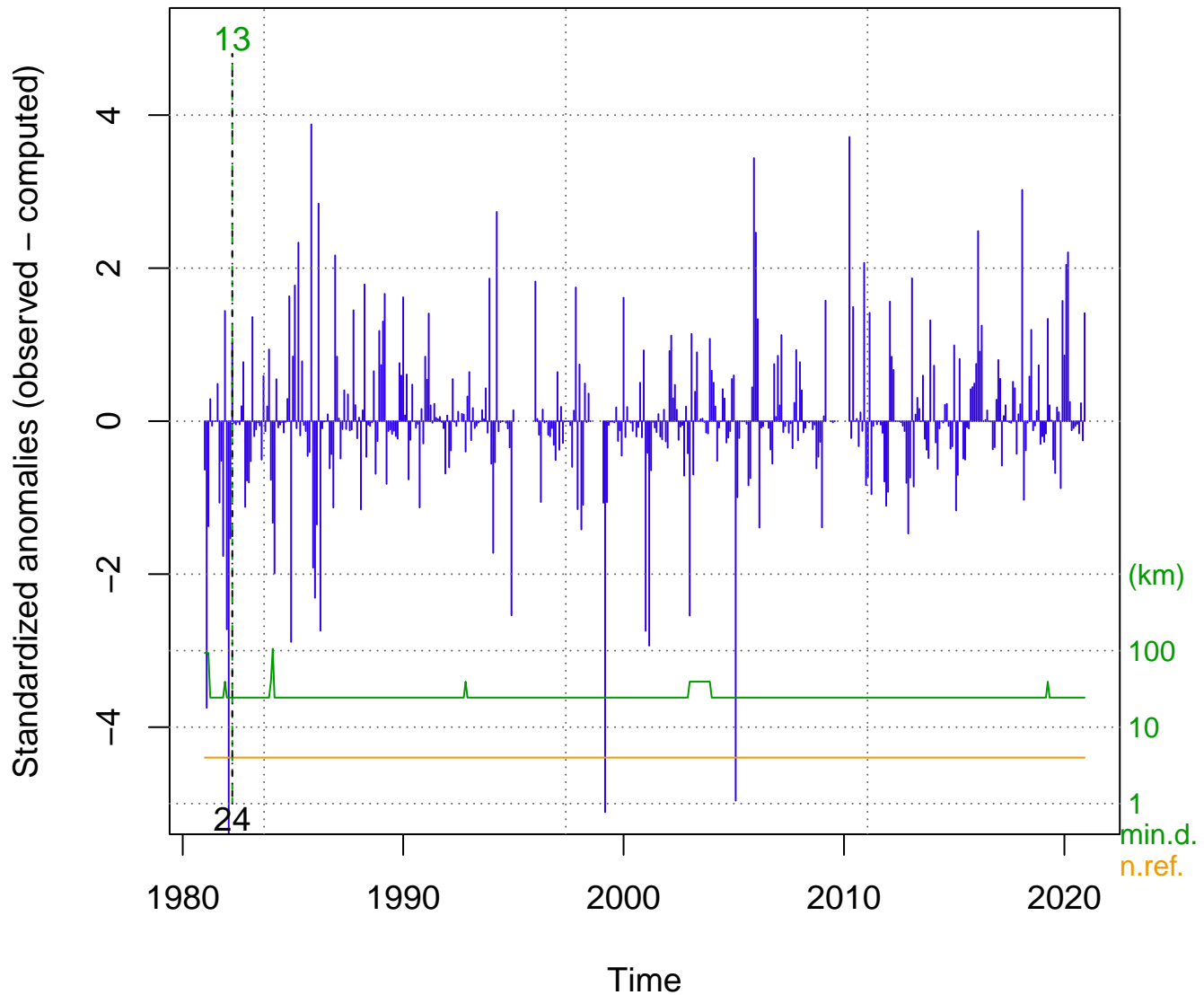
# pre-m 17 (120) challapata



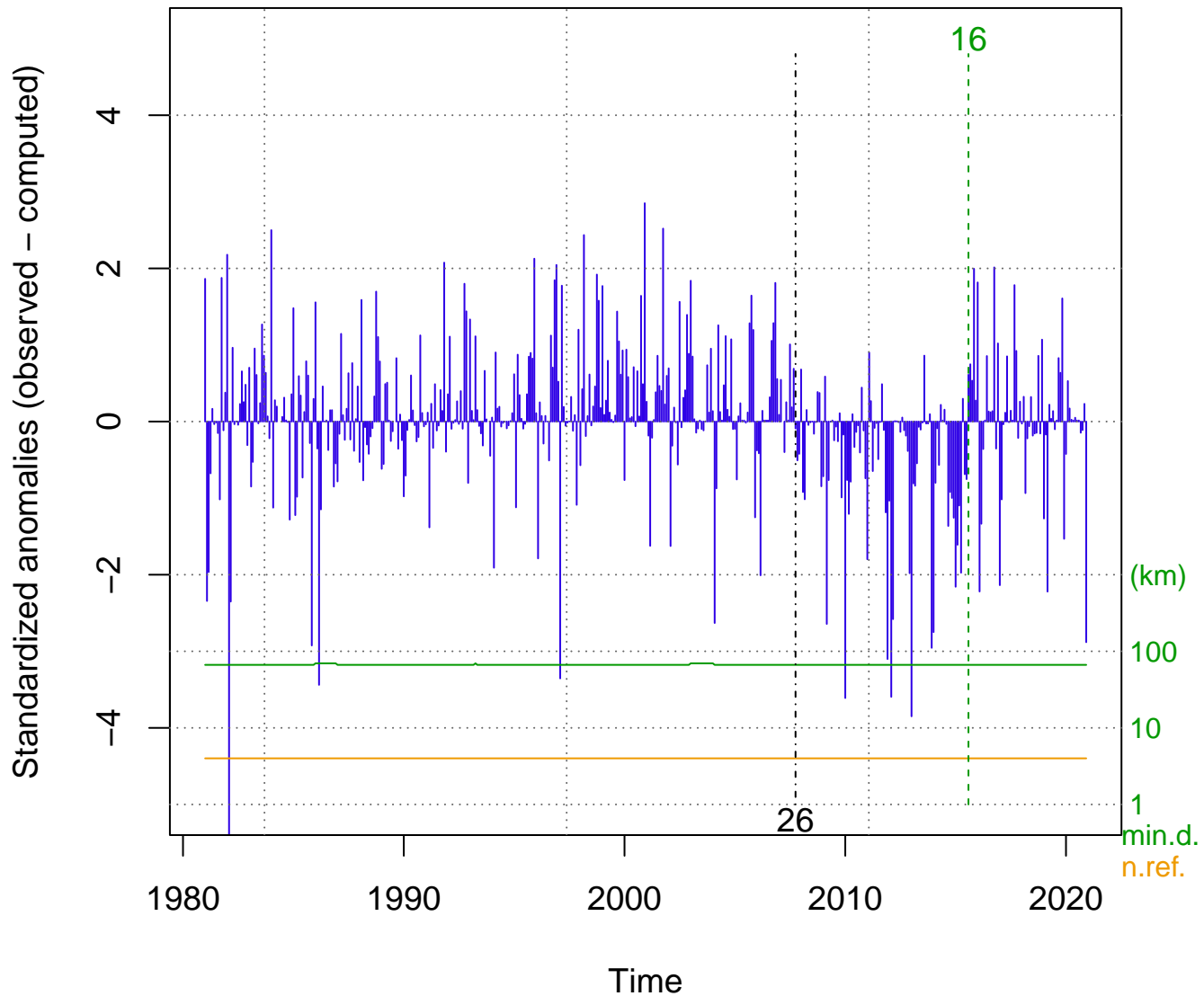
# pre-m 18 (121) curahuara



# pre-m 19 (200) achiri

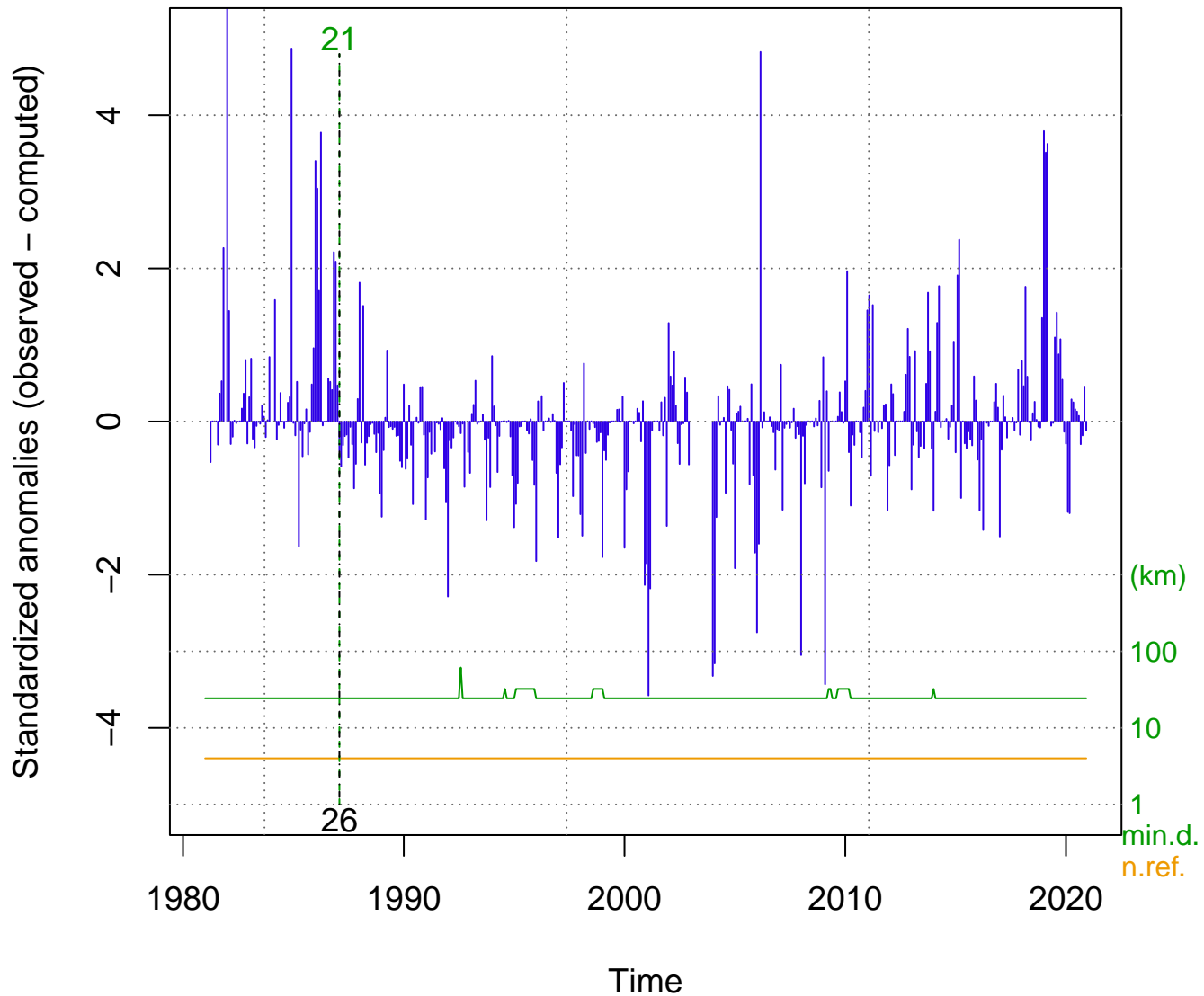


pre-m 20 (201)  
ayoayo

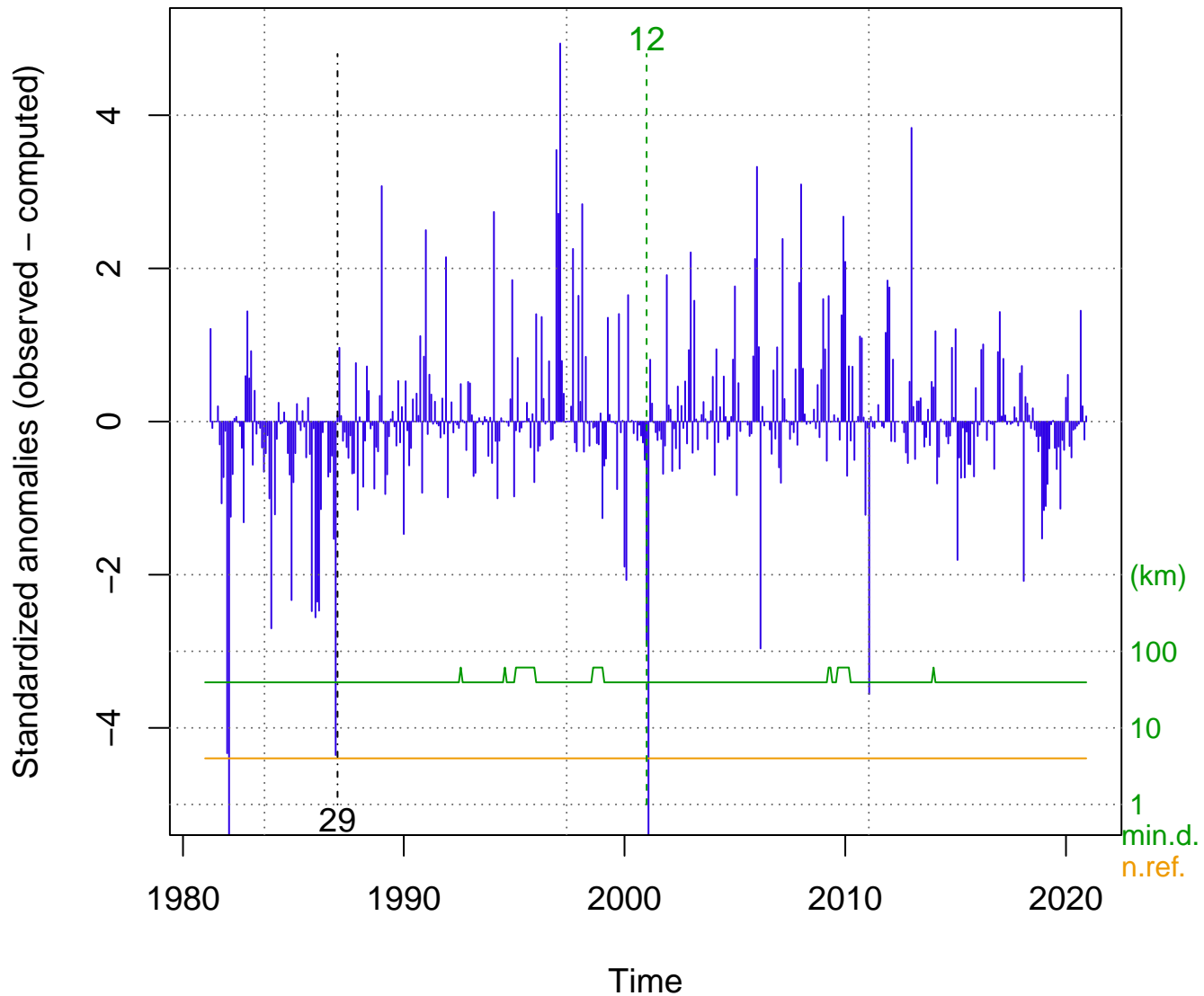




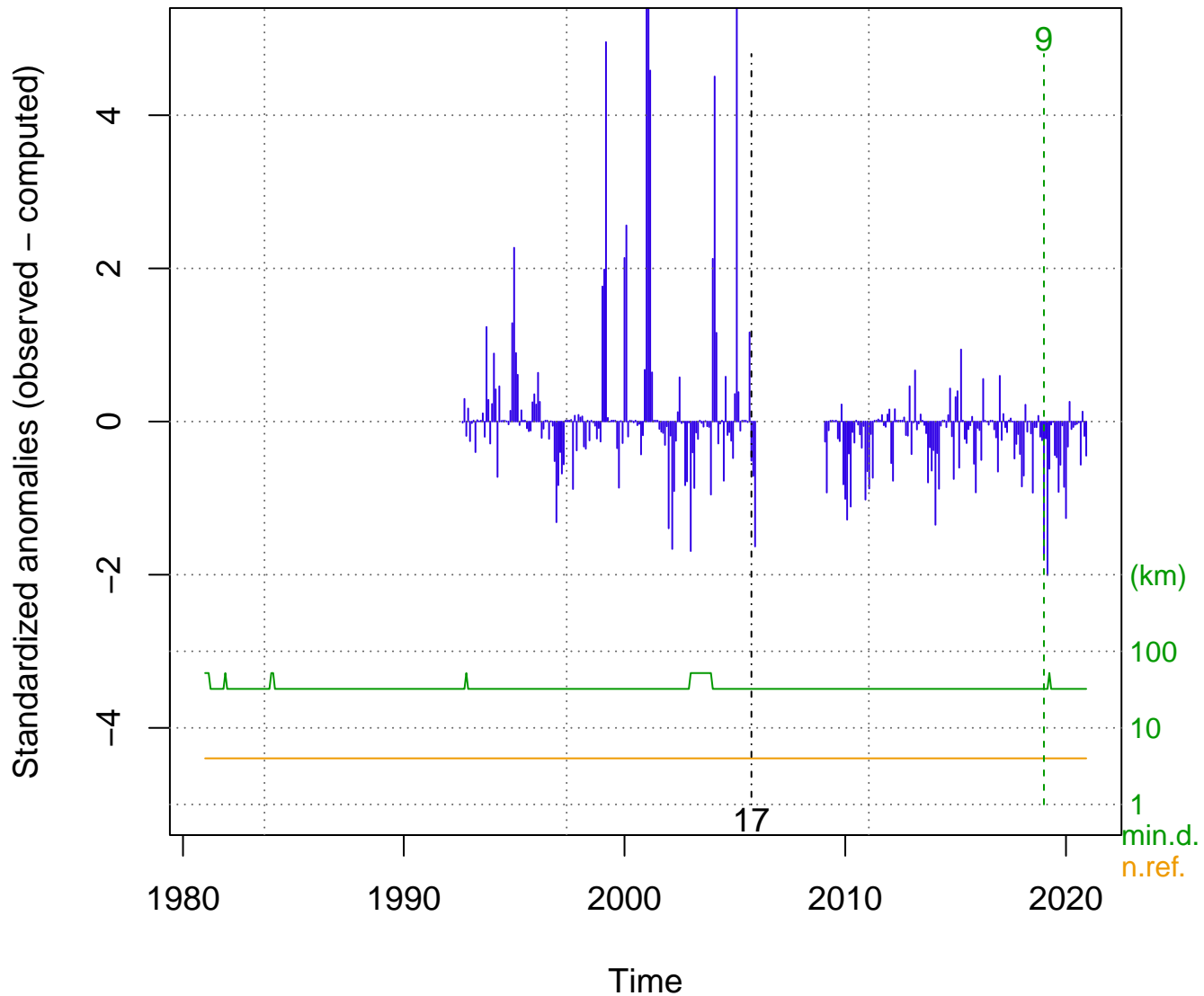
pre-m 21 (202)  
berenguela



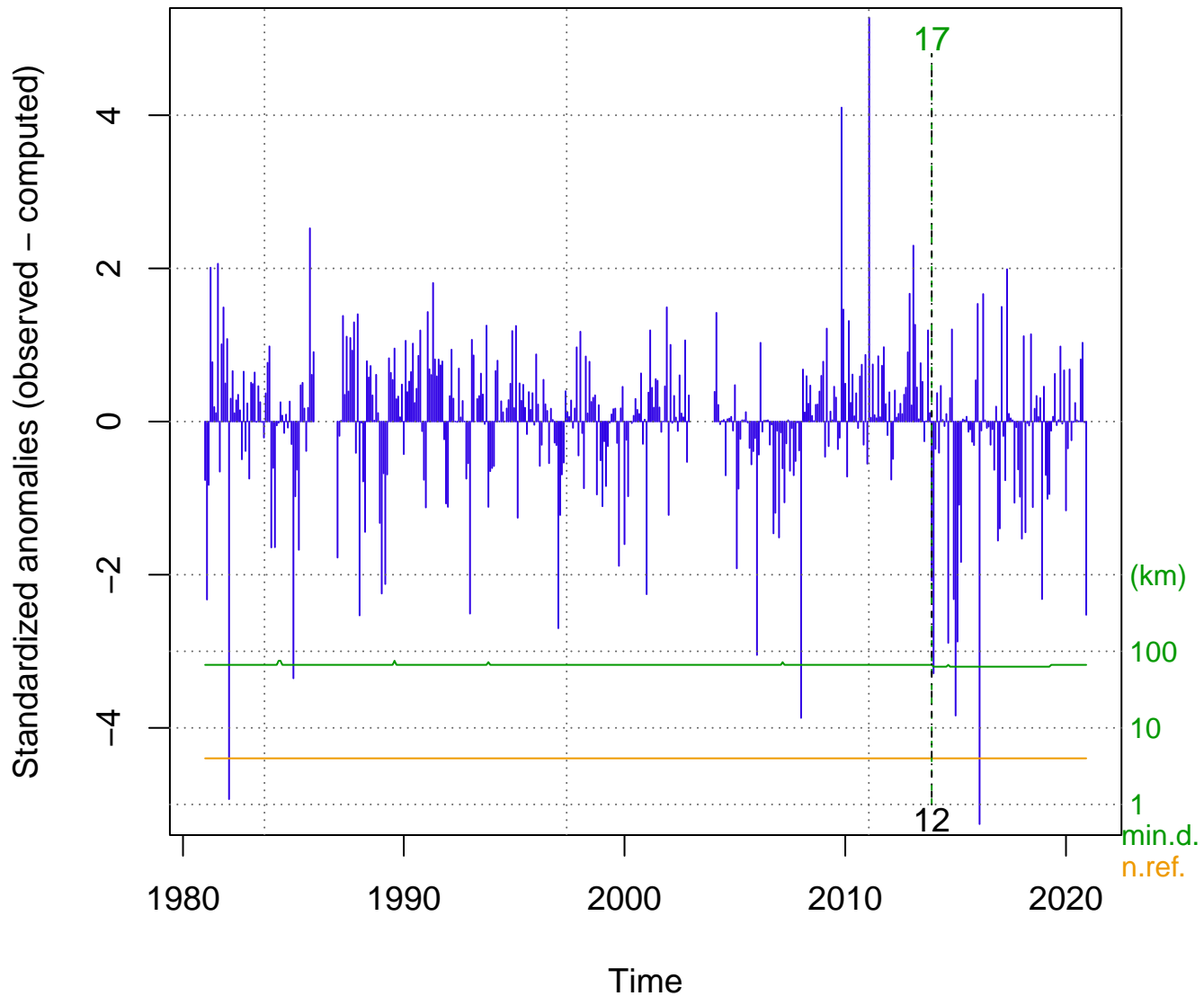
pre-m 22 (203)  
calacoto



pre-m 23 (204)  
catacora



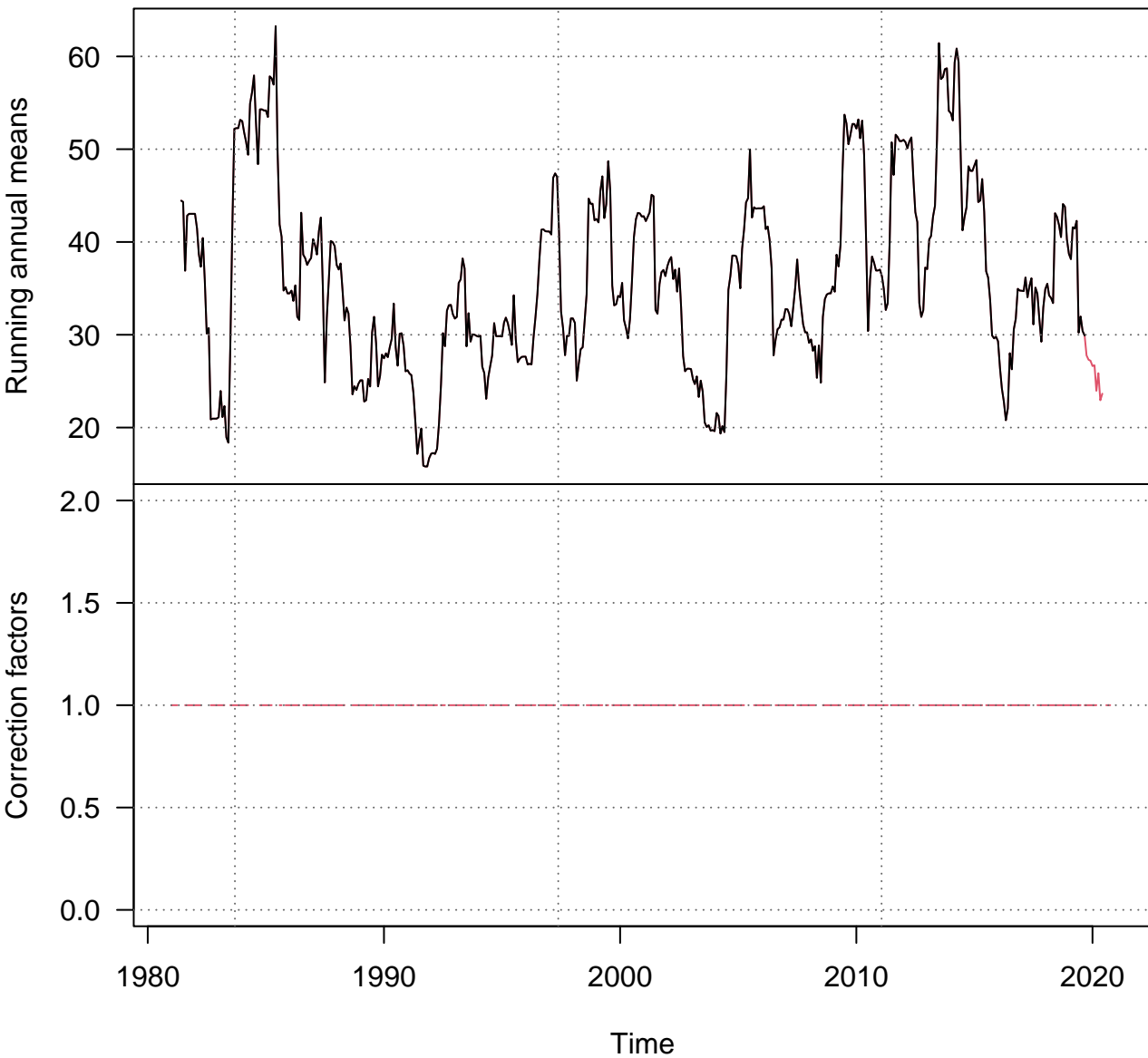
pre-m 24 (205)  
conchamarca



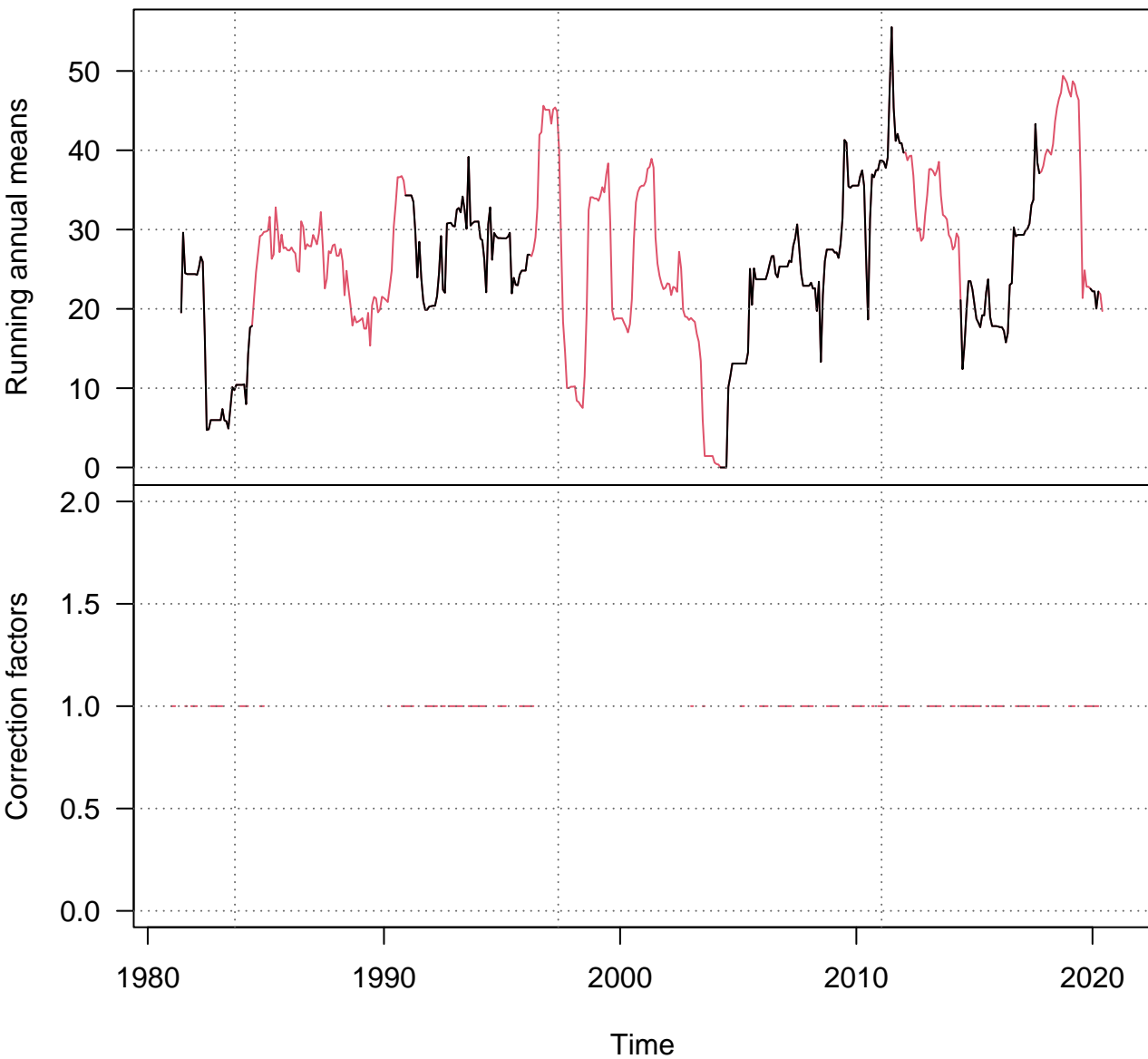
# Final graphics

Adjusted series and  
applied corrections

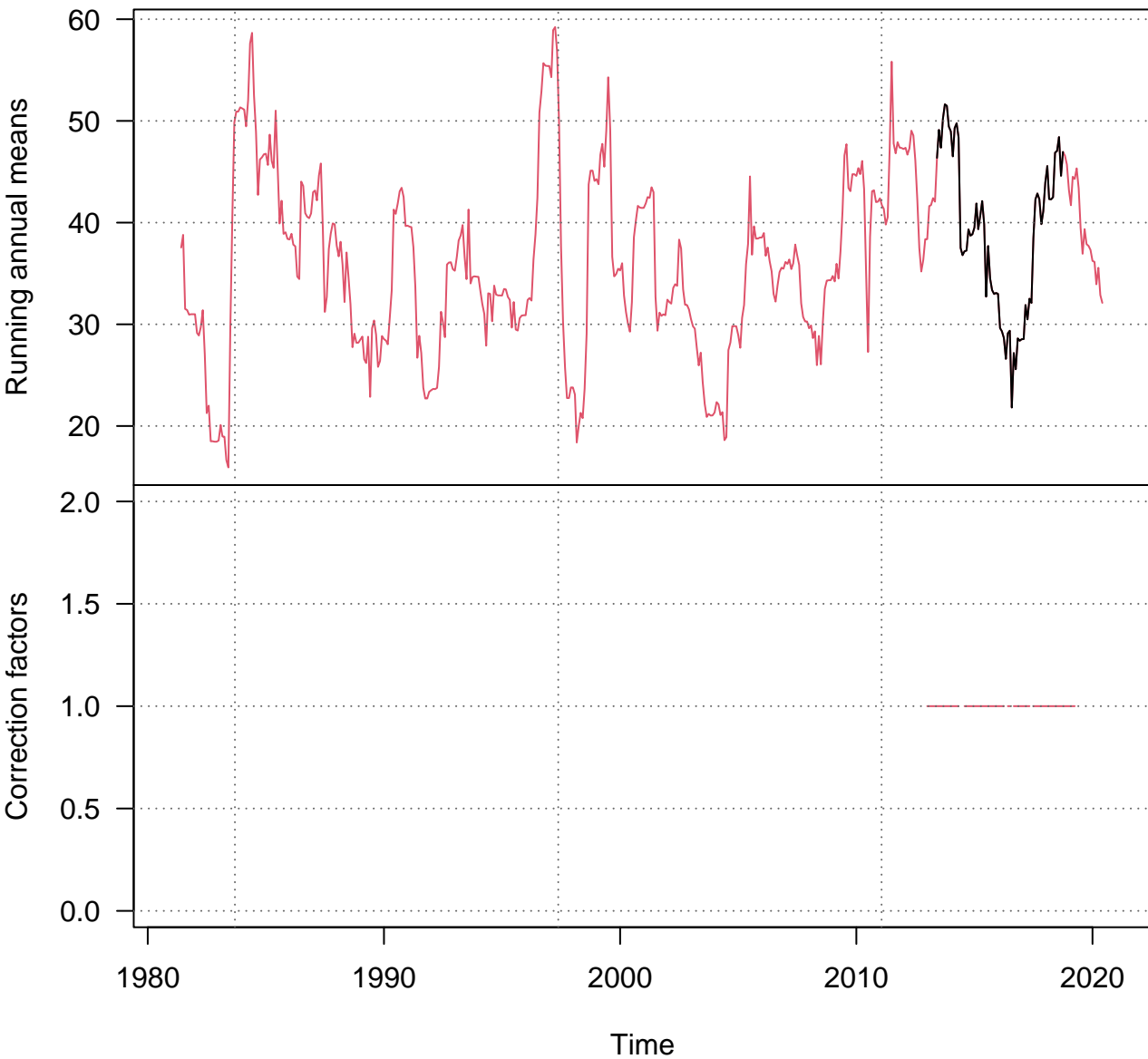
**pre-m 1 (100)**  
**aeropuerto**



**pre-m 2 (101)**  
**andamarca**

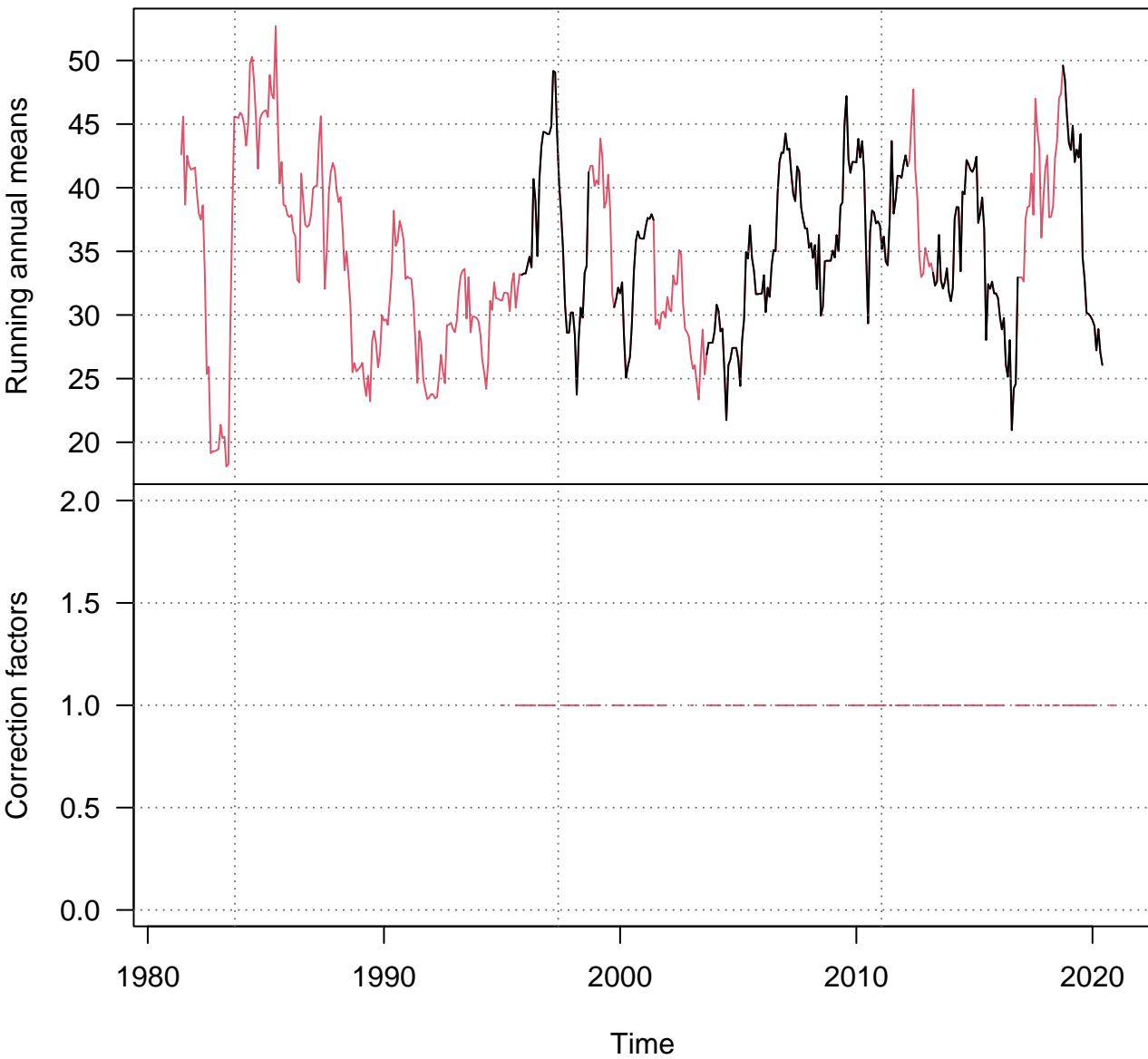


**pre-m 3 (102)**  
**antequera**

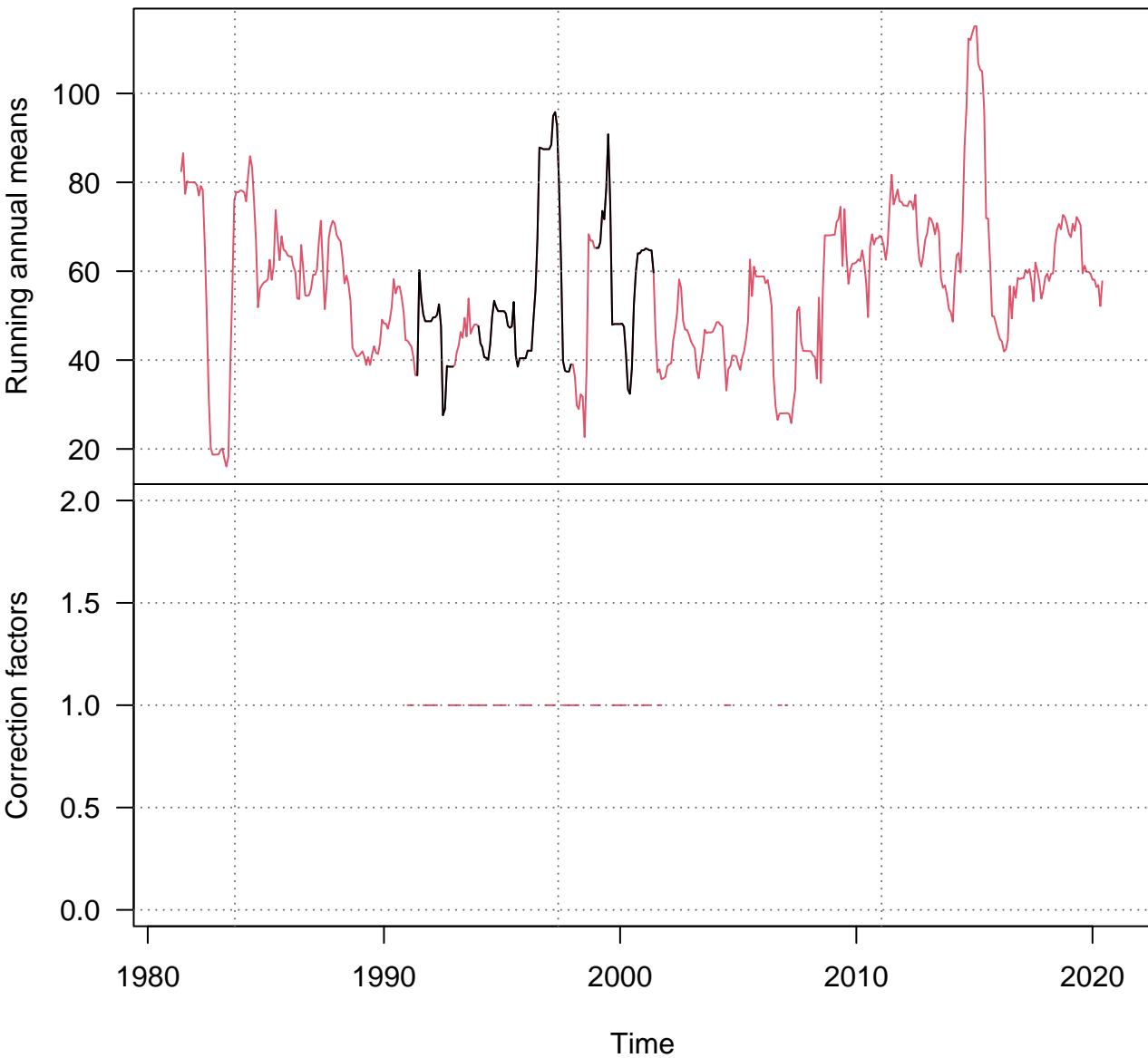




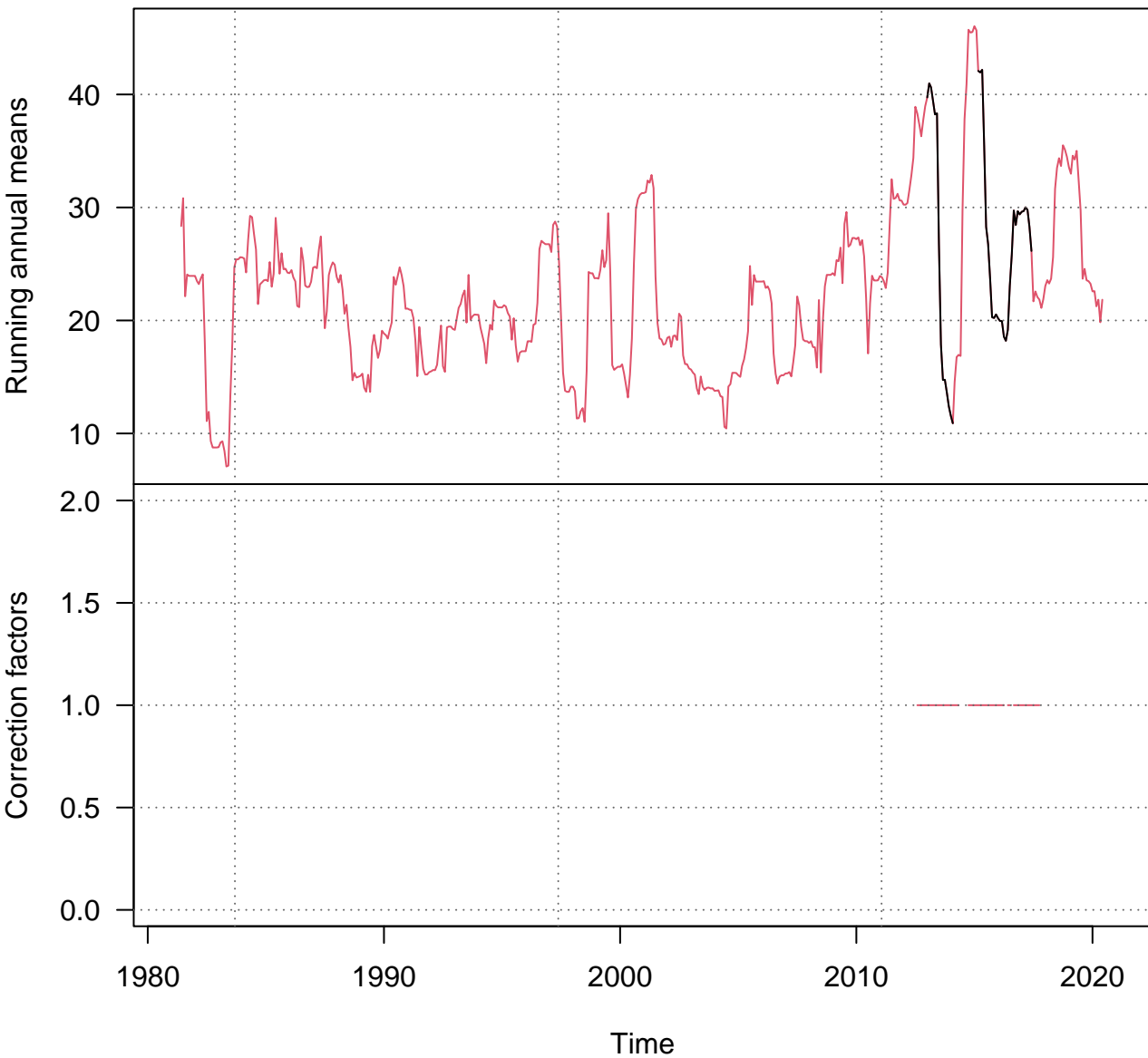
**pre-m 4 (105)**  
**chillca**



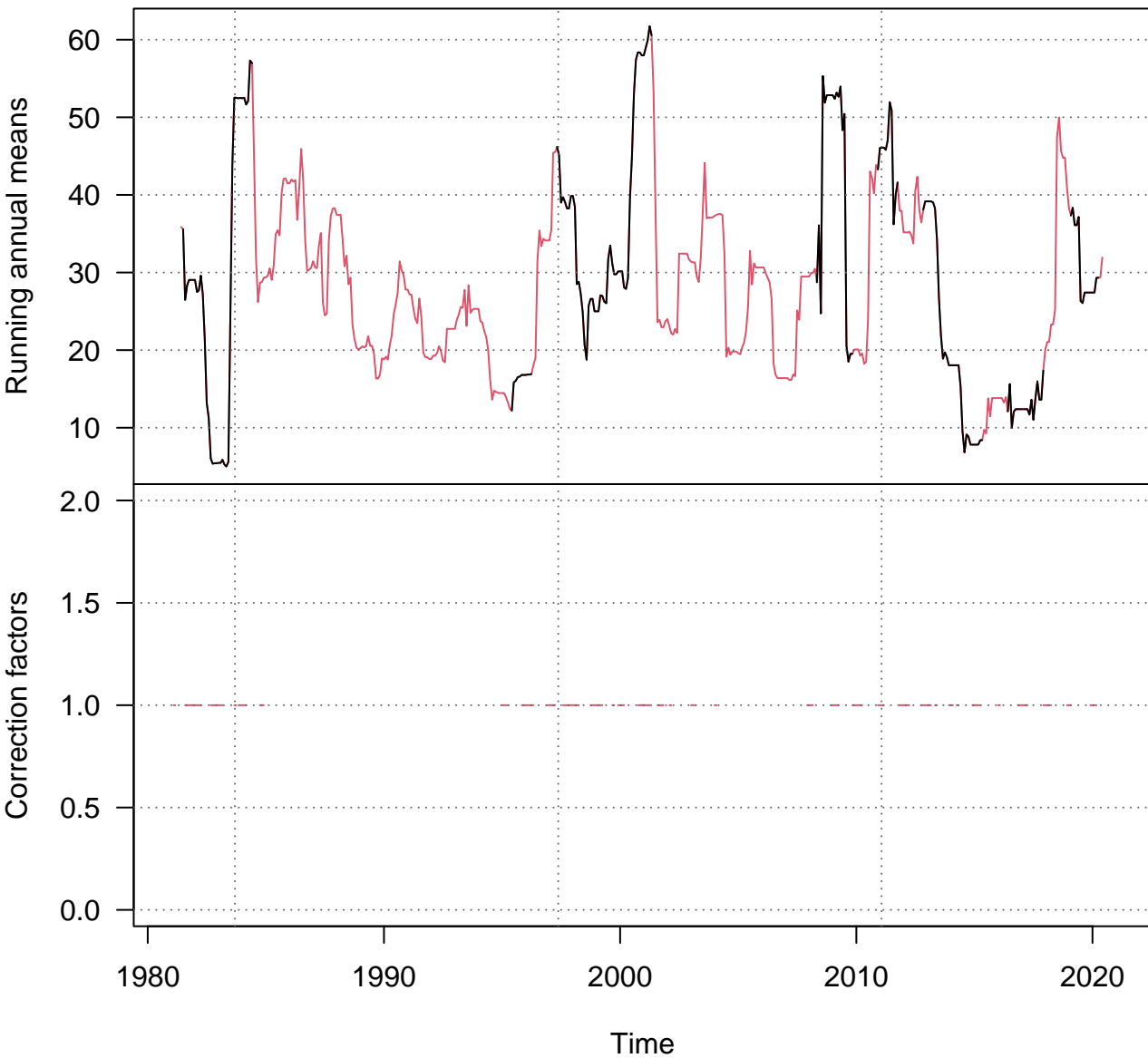
**pre-m 5 (106)**  
**choquecota**



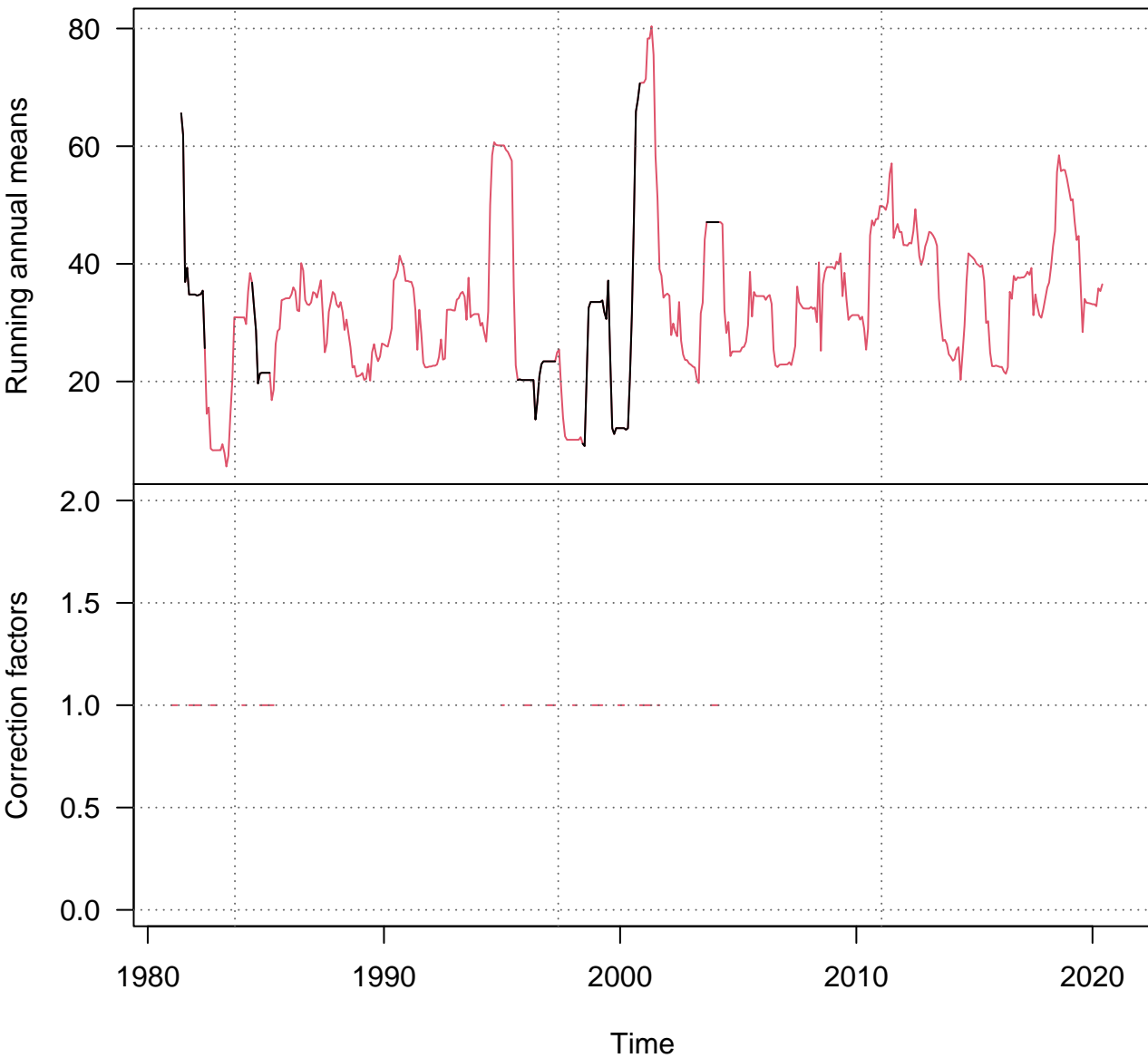
**pre-m 6 (107)**  
**corque**



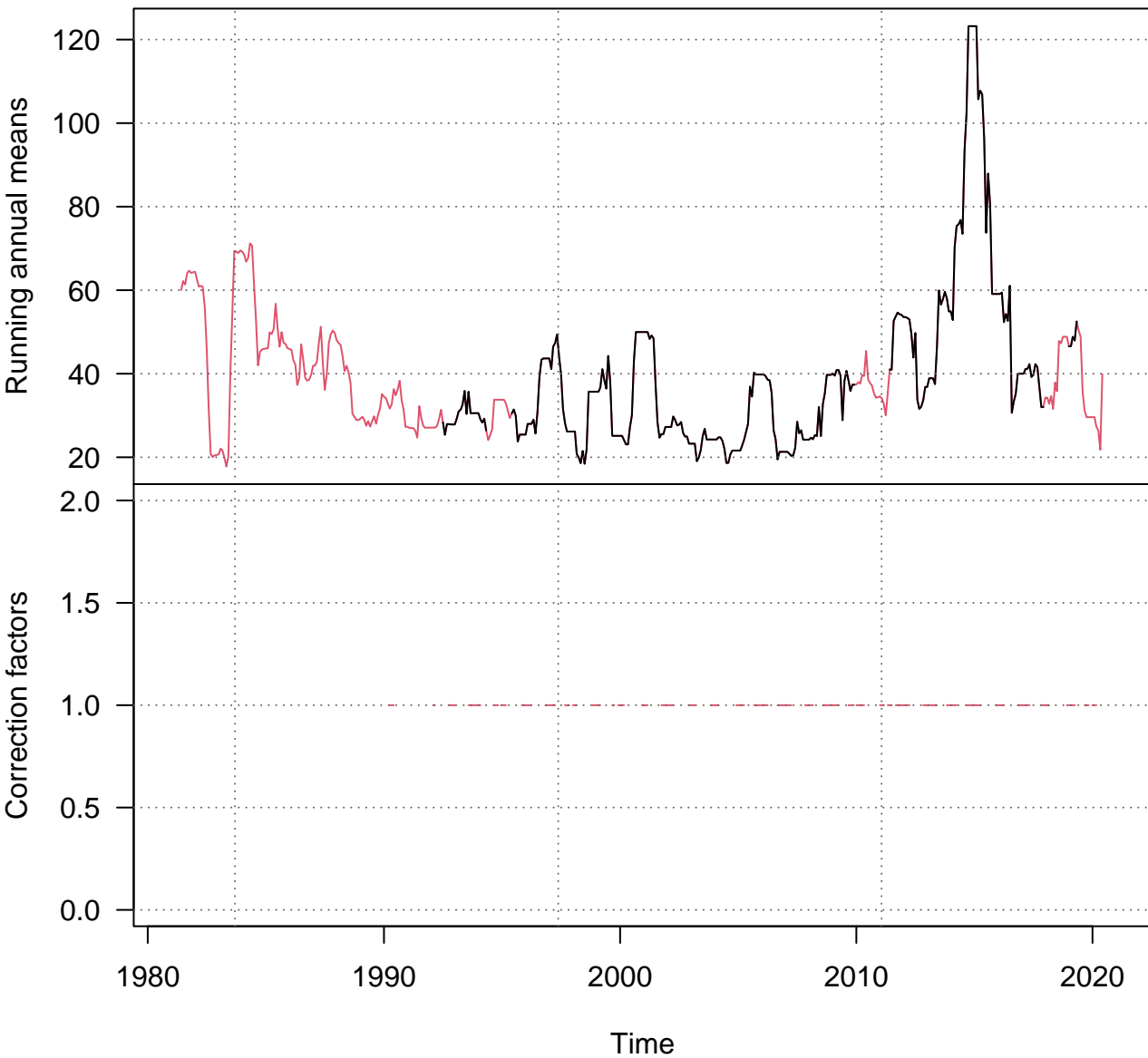
**pre-m 7 (108)**  
**cosapa**



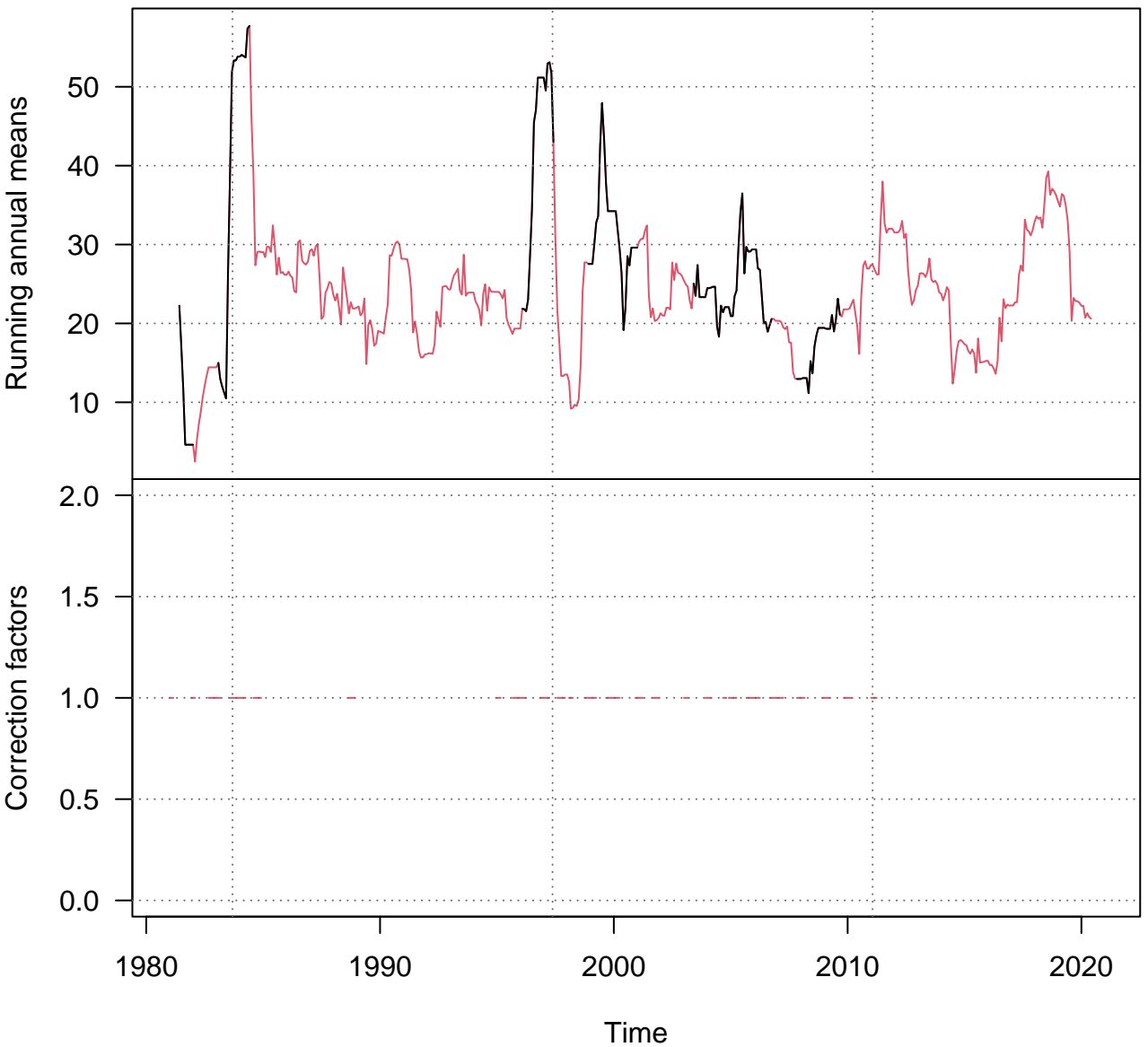
**pre-m 8 (111)**  
**huachacalla**



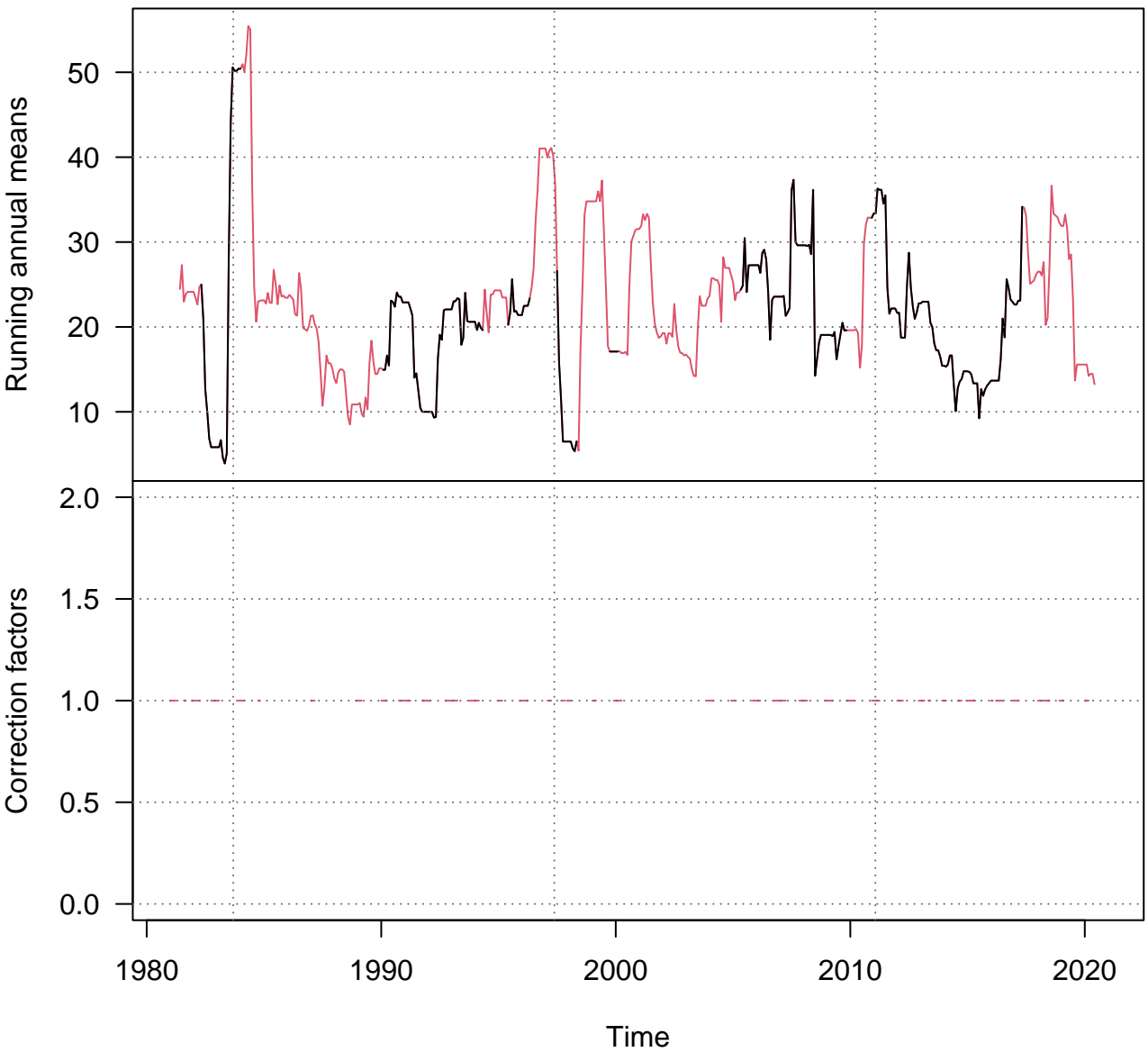
**pre-m 9 (112)**  
**huayllamarca**



**pre-m 10 (113)**  
**quillacas**

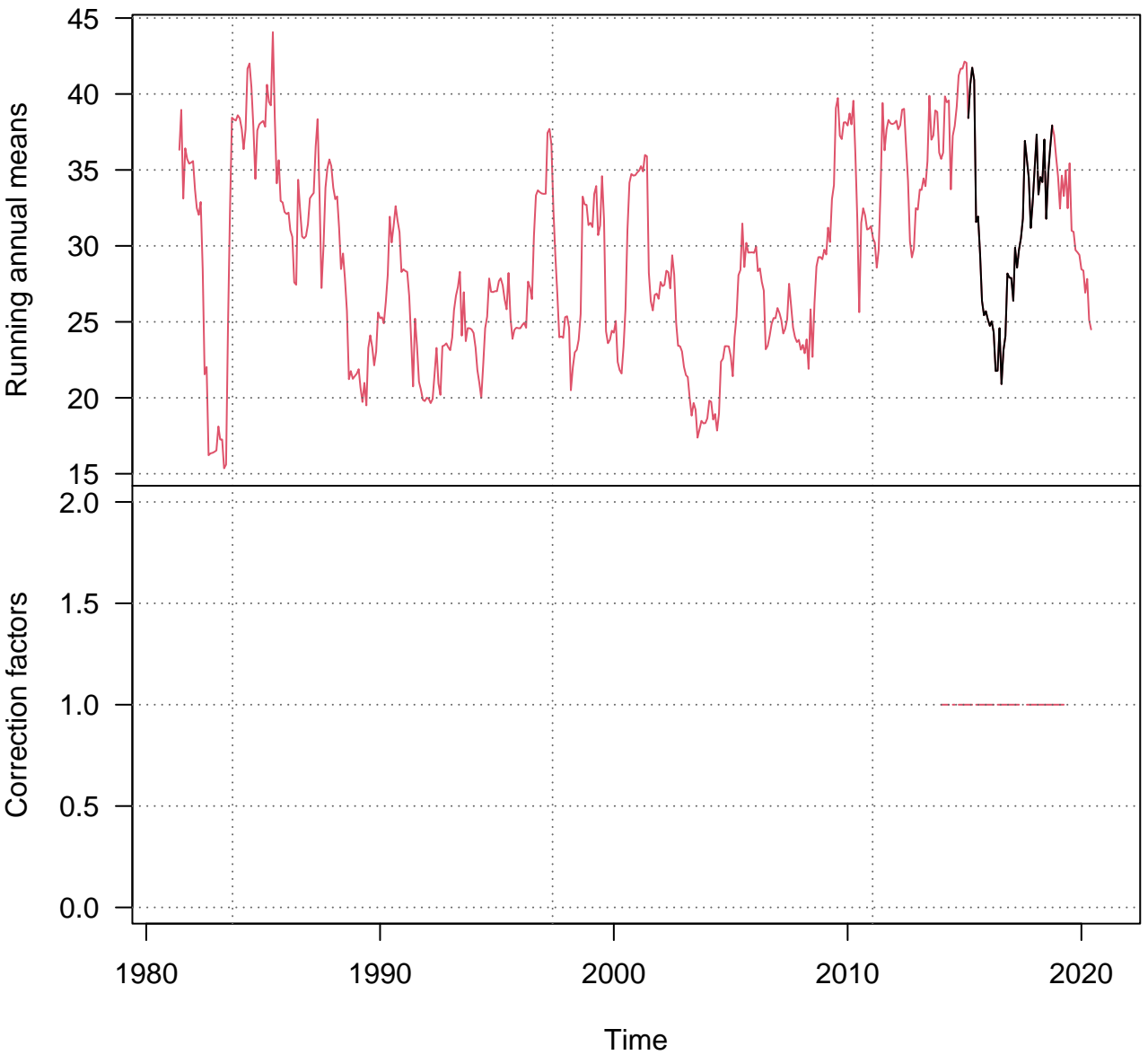


**pre-m 11 (114)**  
**san\_martin**

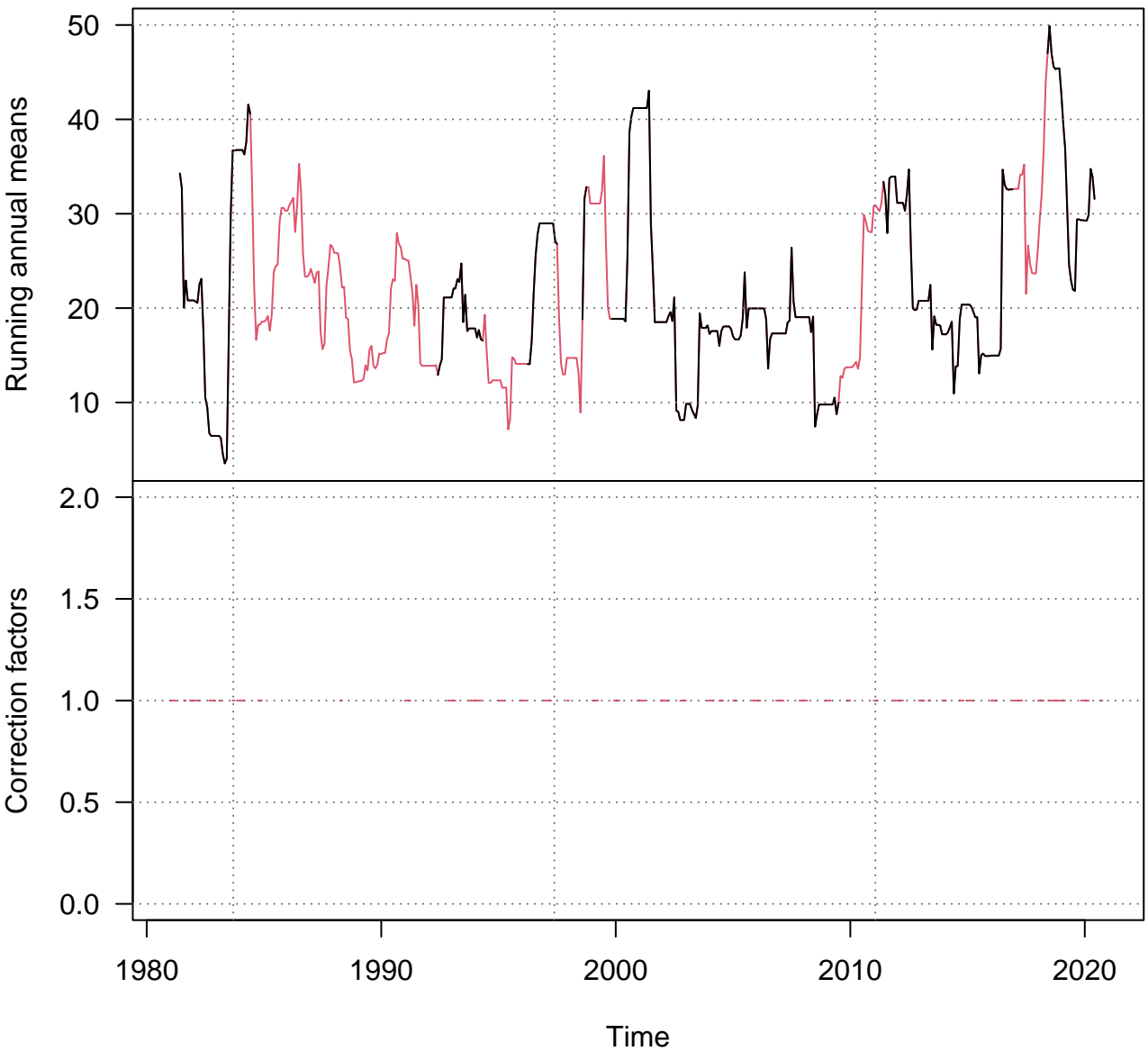




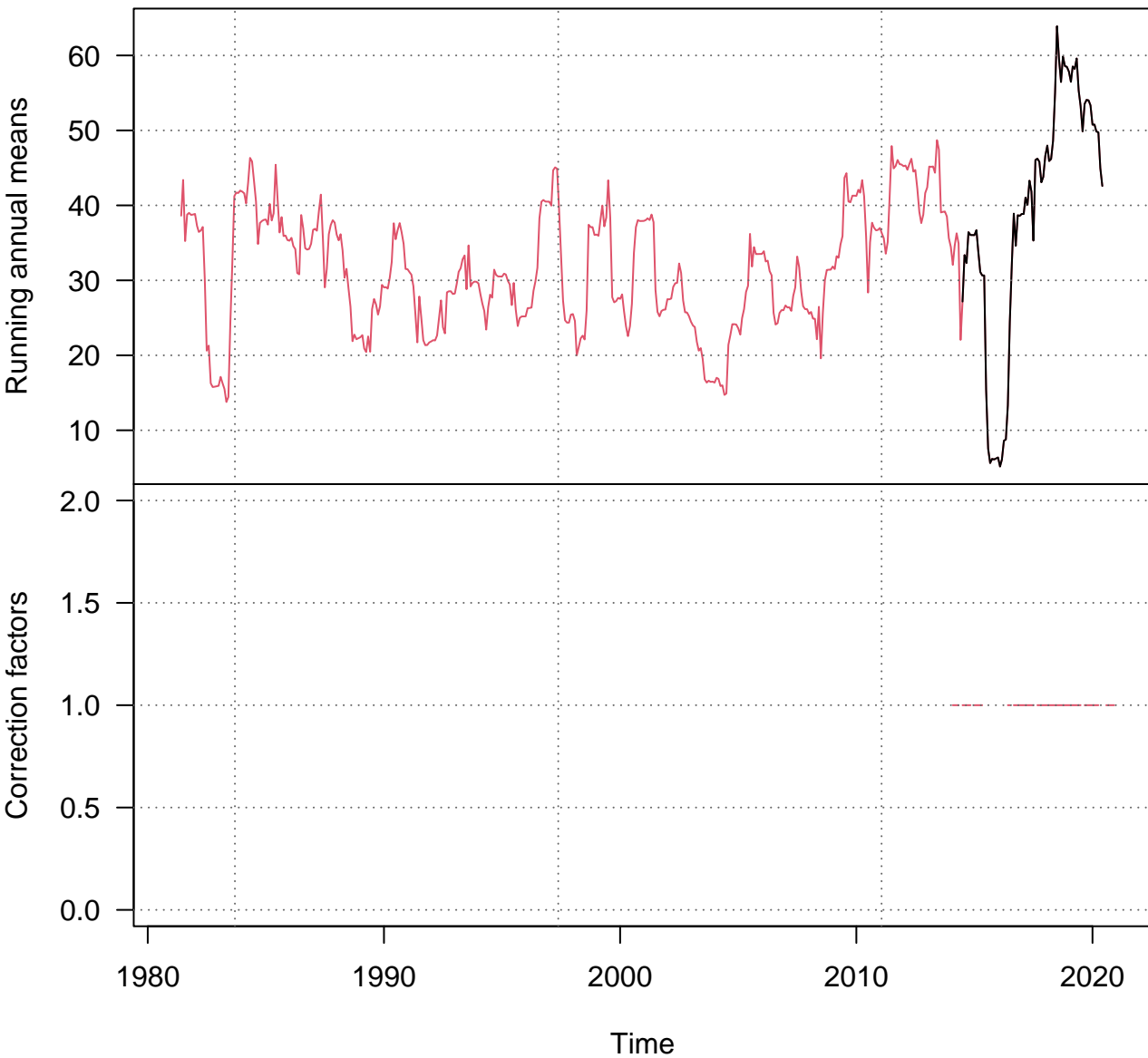
**pre-m 12 (115)**  
**soracachi**



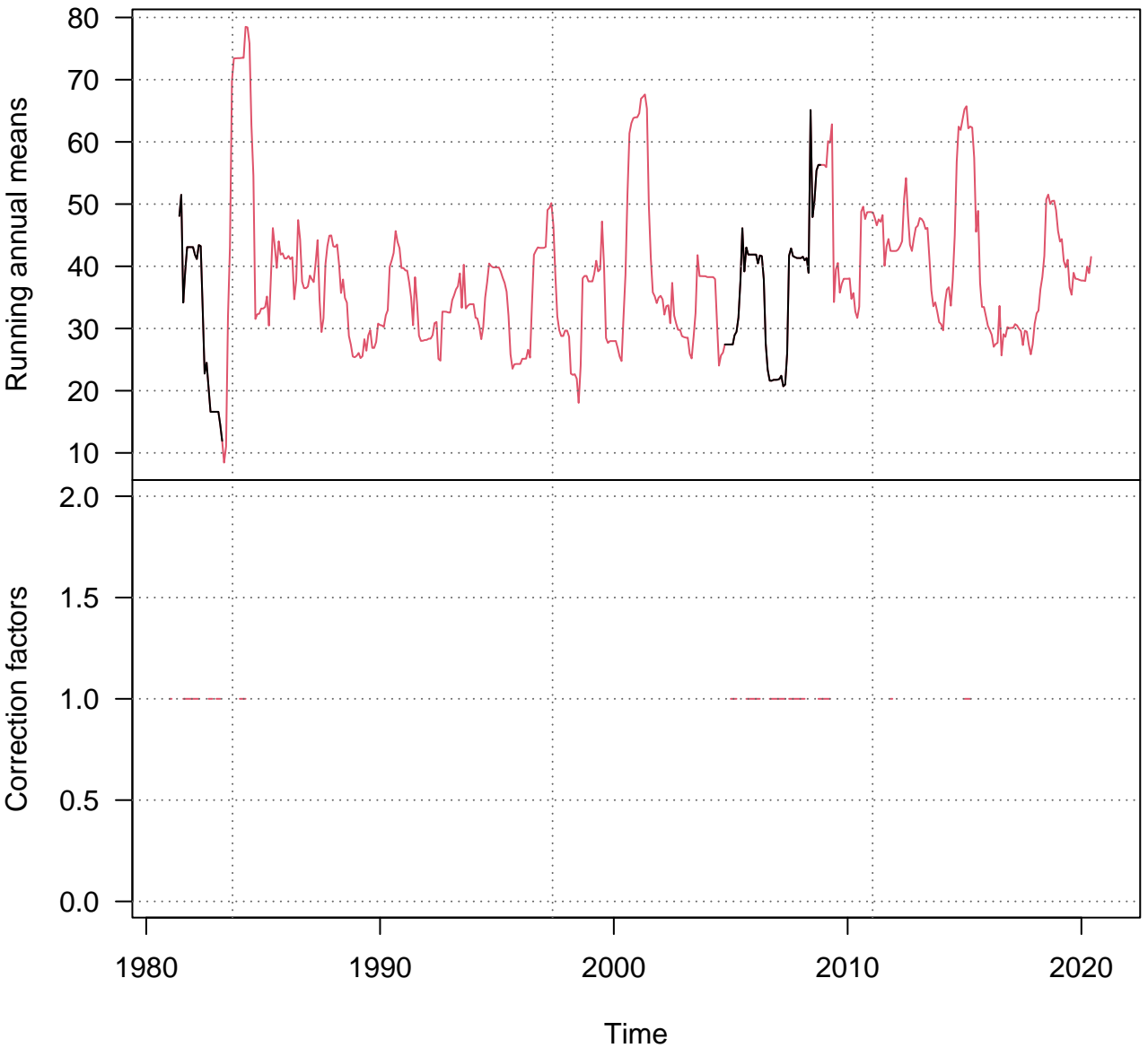
**pre-m 13 (116)**  
**todo\_santos**



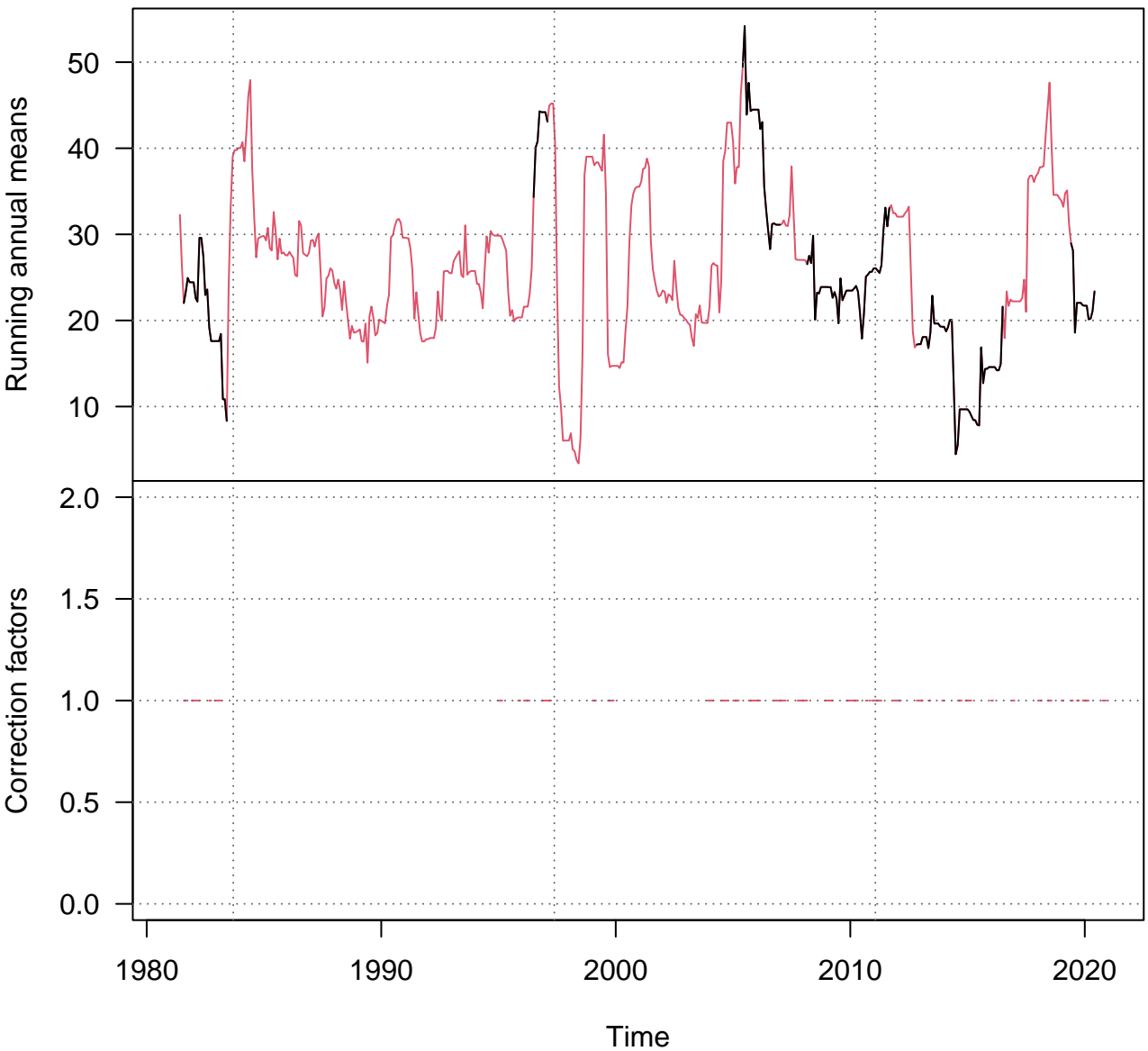
**pre-m 14 (117)**  
**toledo**



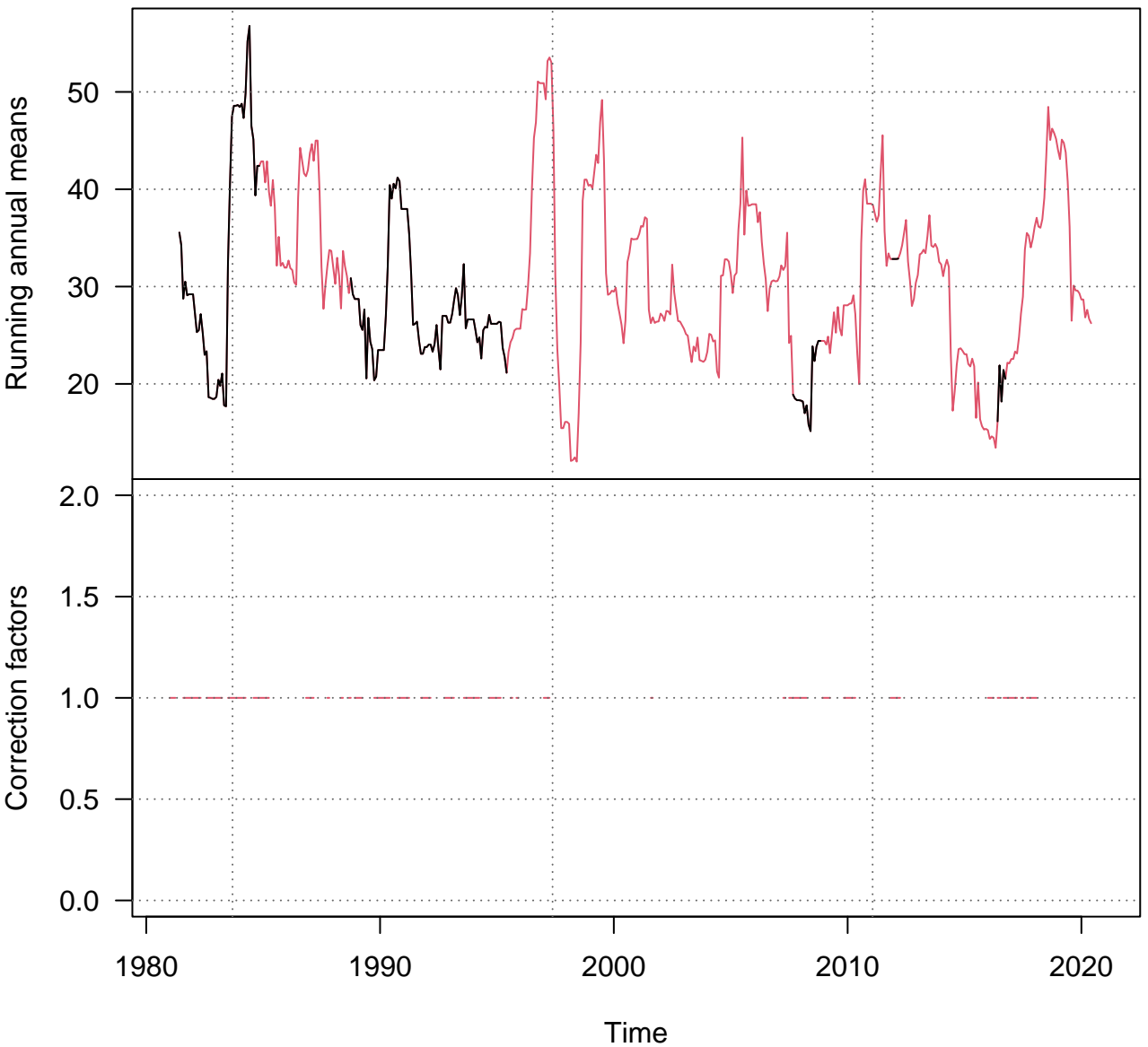
**pre-m 15 (118)**  
**turco**



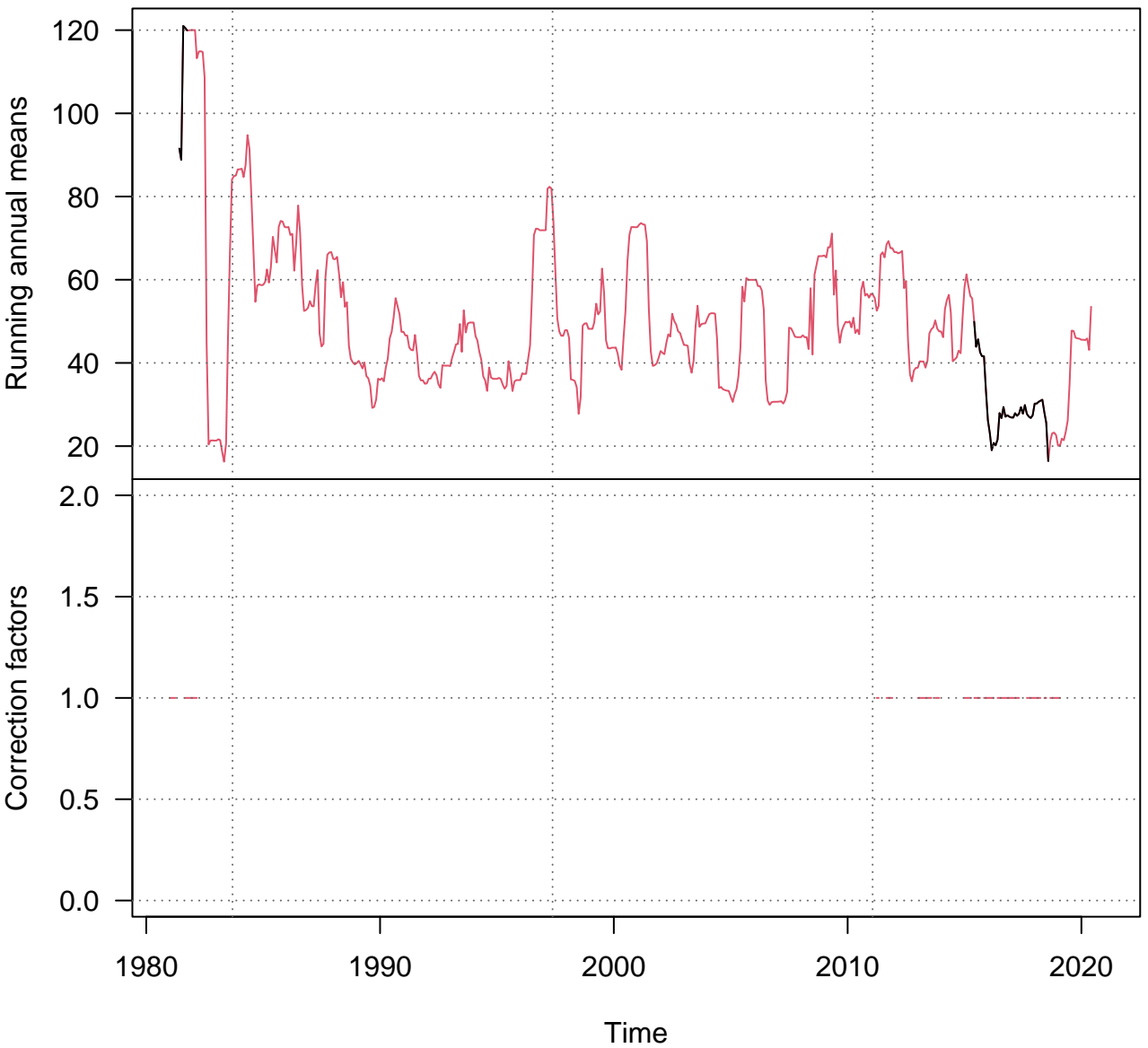
**pre-m 16 (119)**  
**ucumasi**



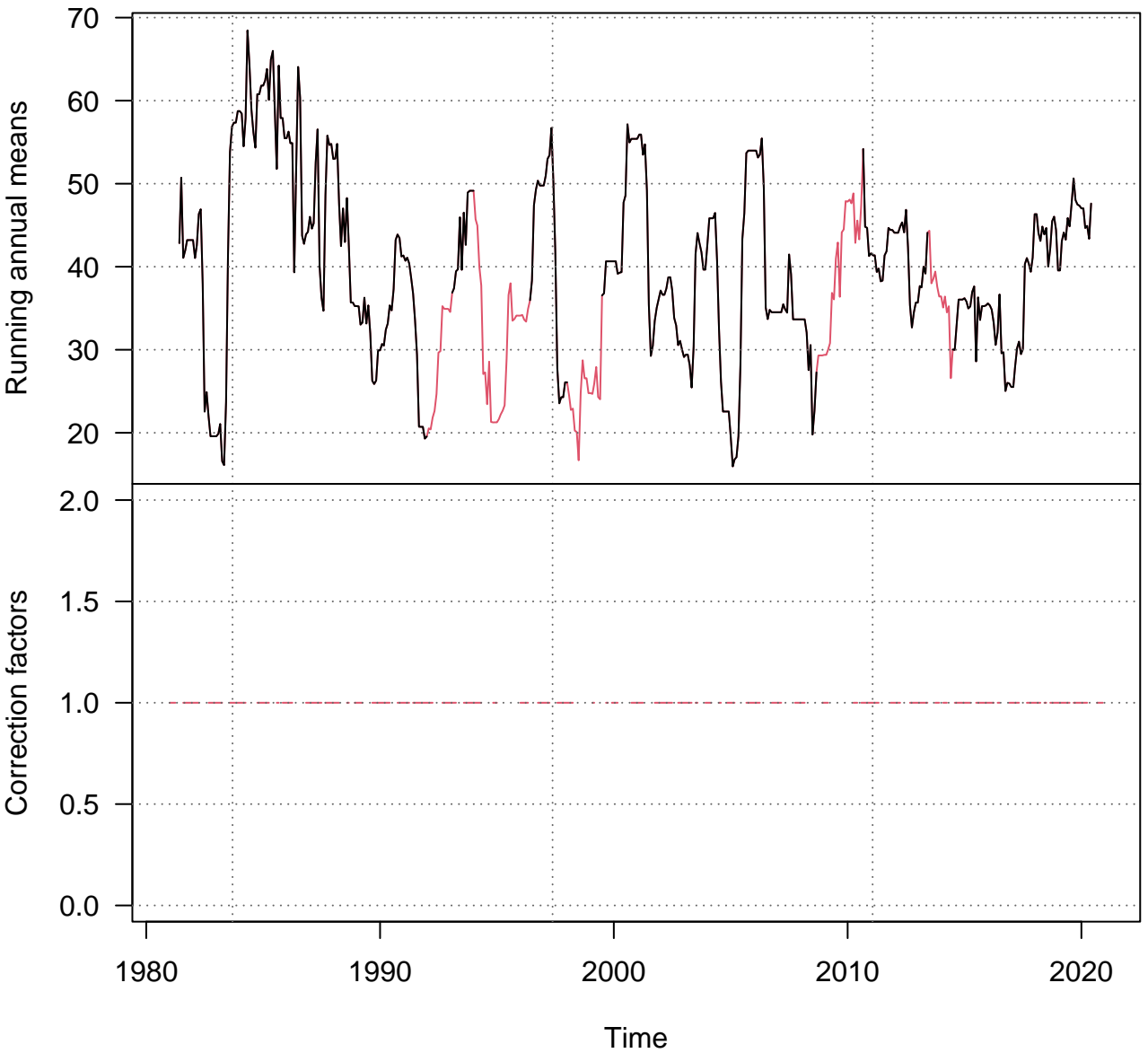
**pre-m 17 (120)**  
**challapata**



**pre-m 18 (121)**  
**curahuara**

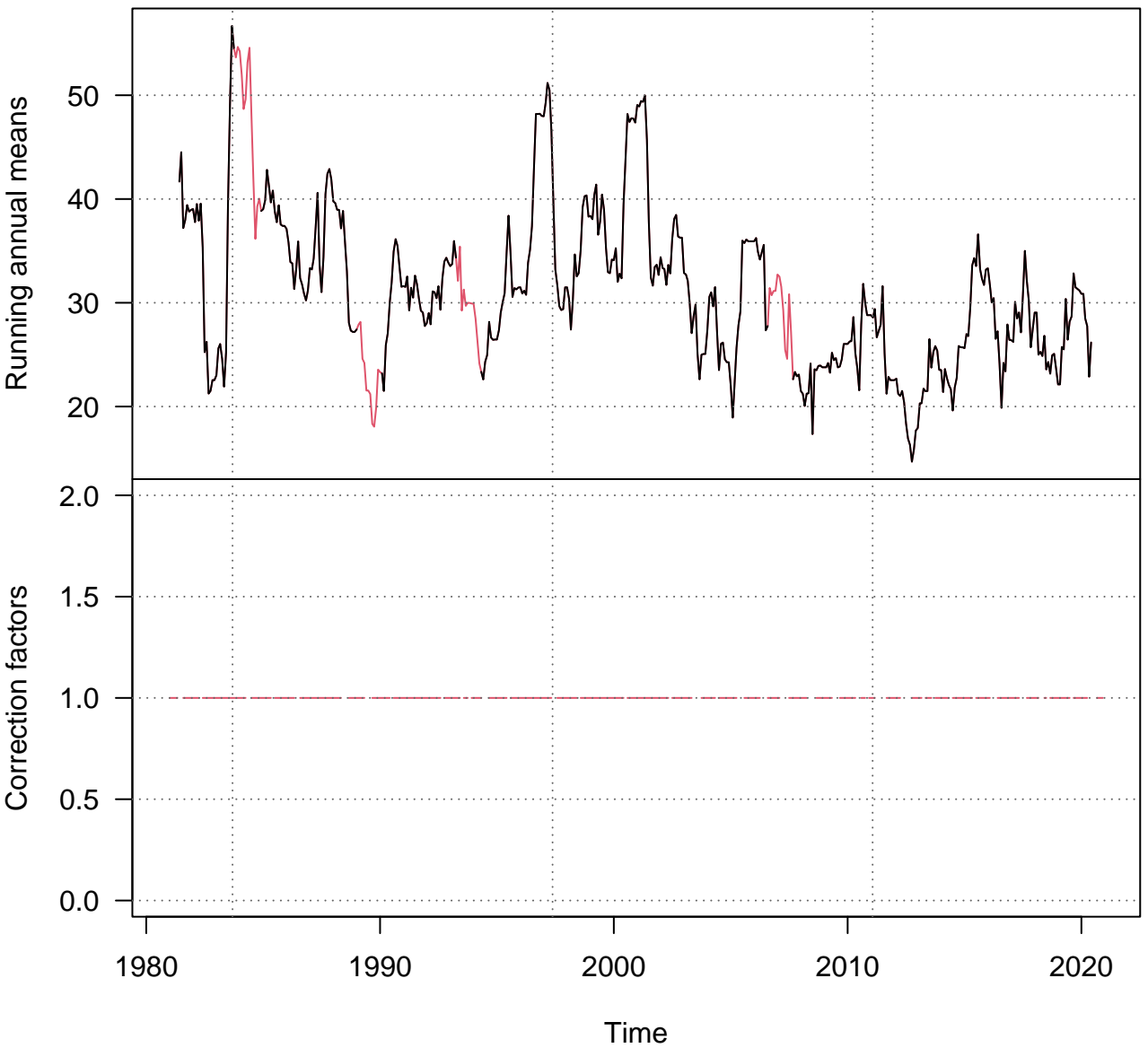


**pre-m 19 (200)**  
**achiri**

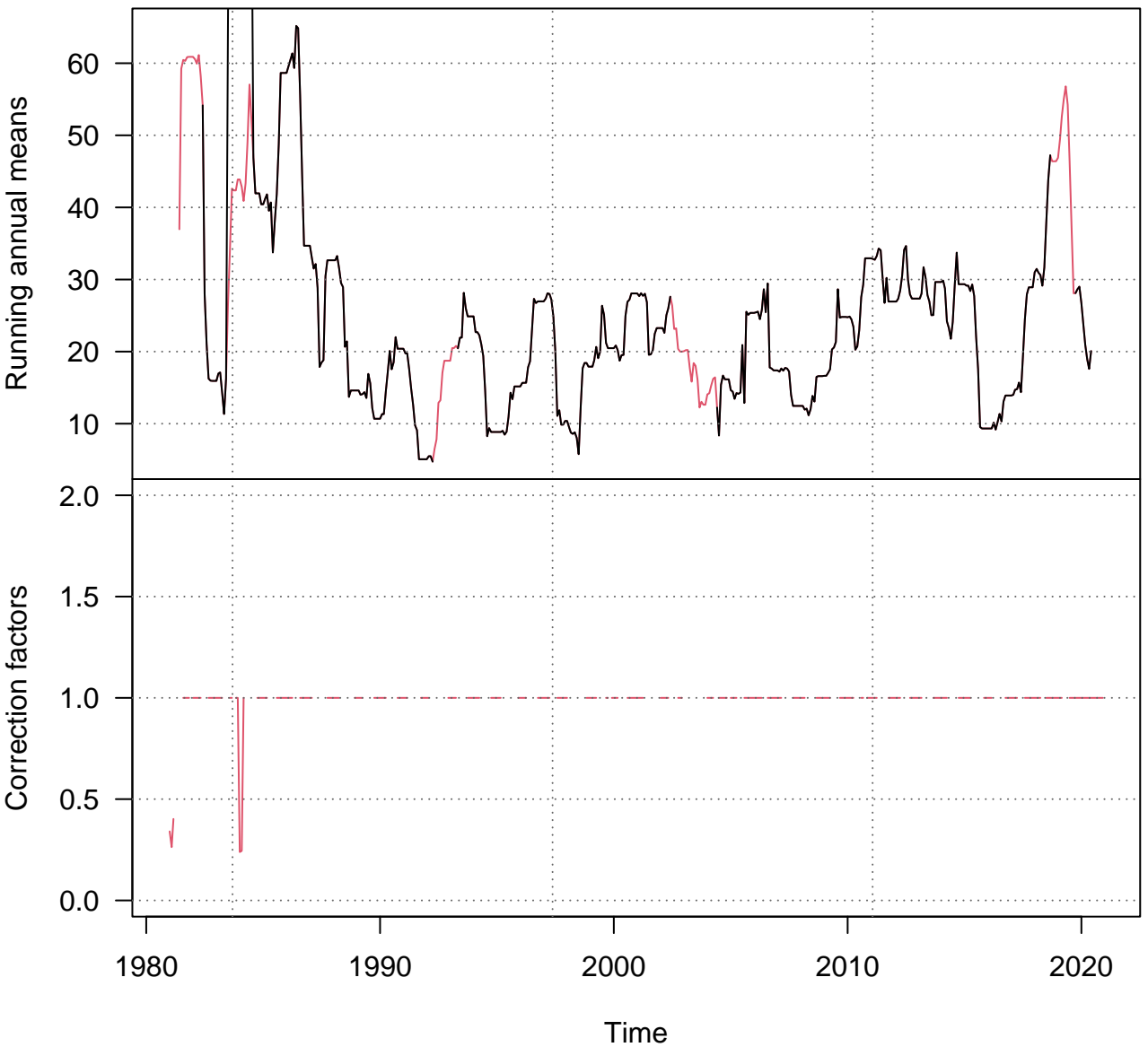




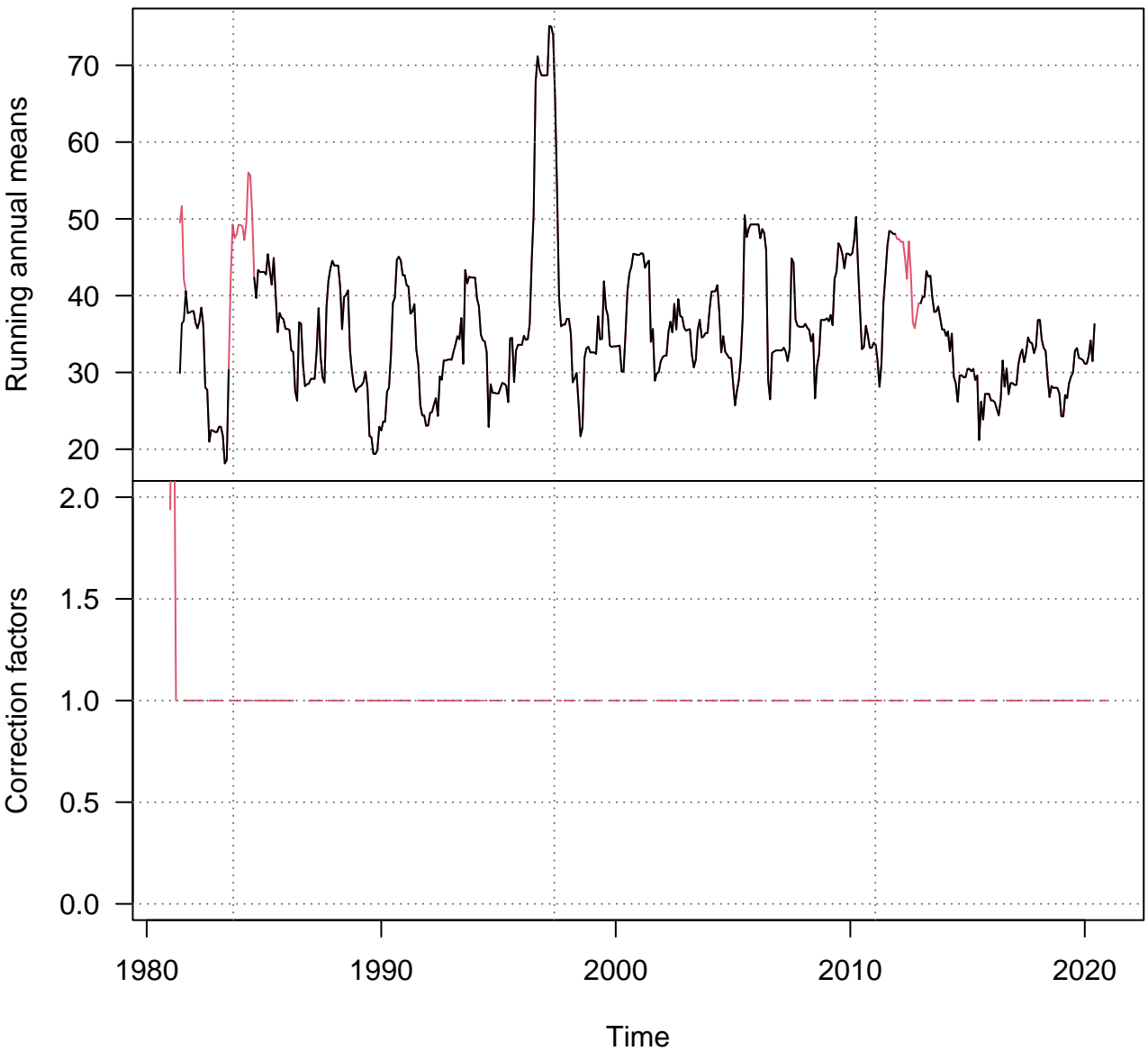
**pre-m 20 (201)**  
**ayoayo**



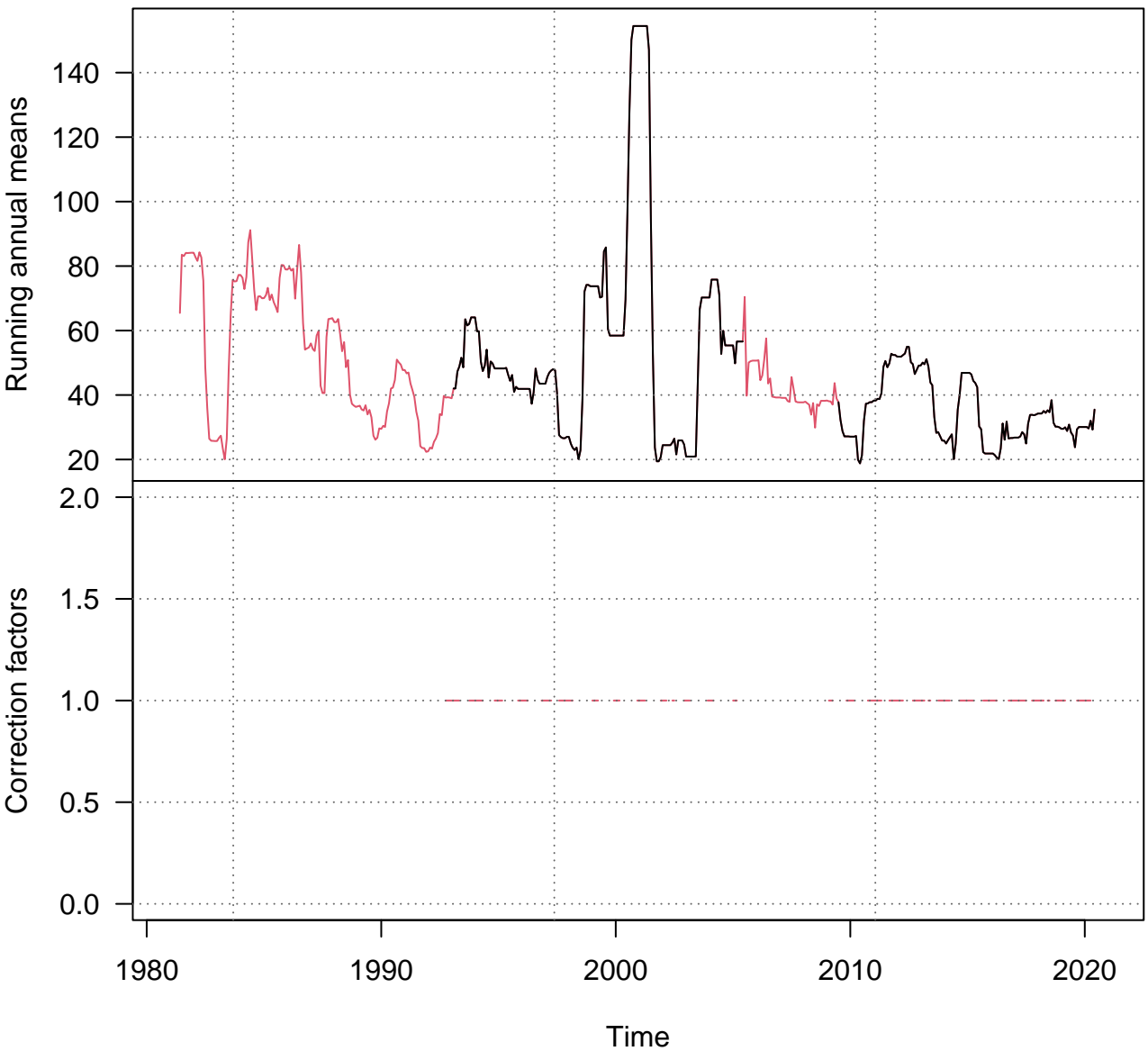
**pre-m 21 (202)**  
**berenguela**



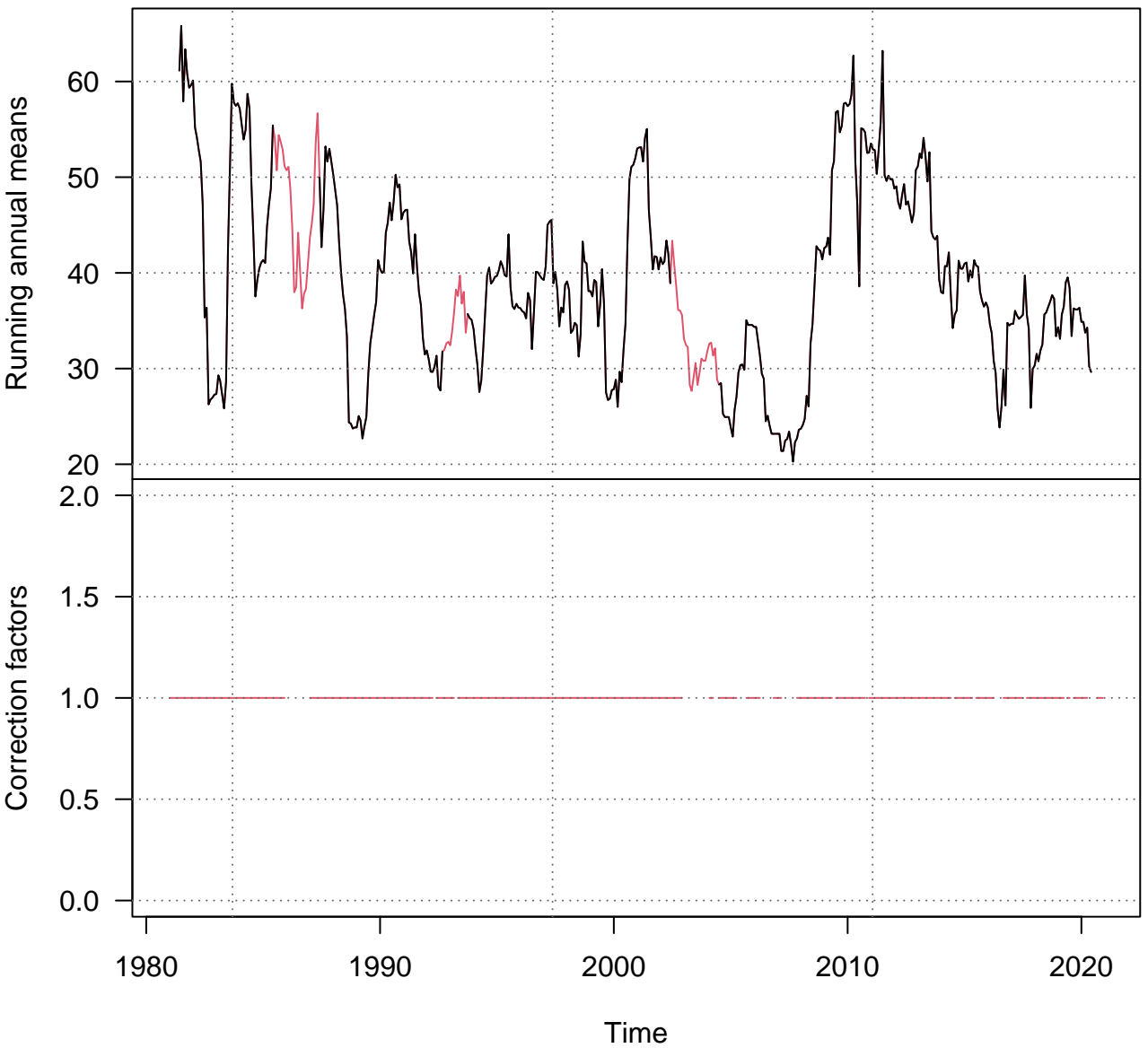
**pre-m 22 (203)**  
**calacoto**



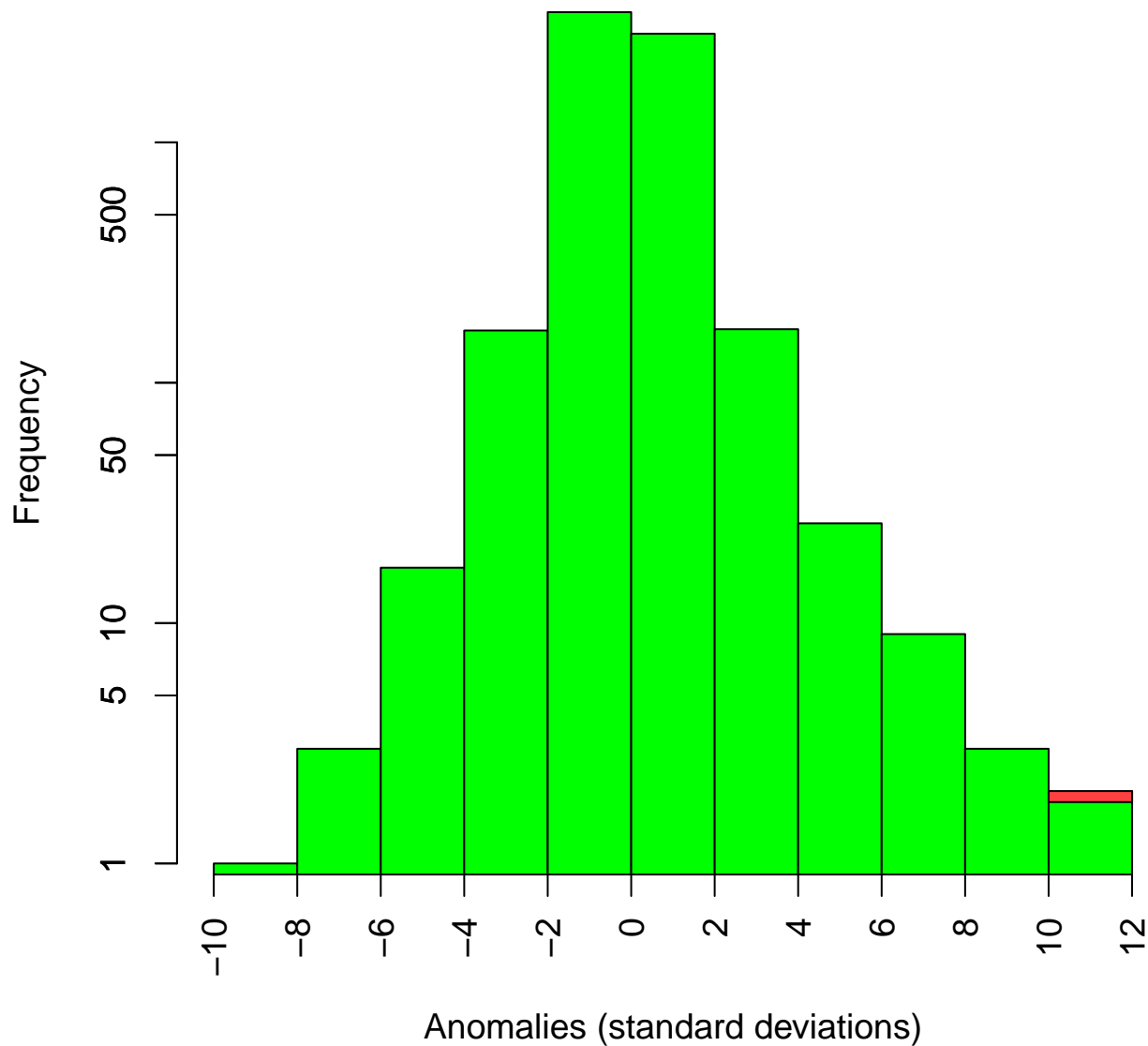
**pre-m 23 (204)**  
**catacora**



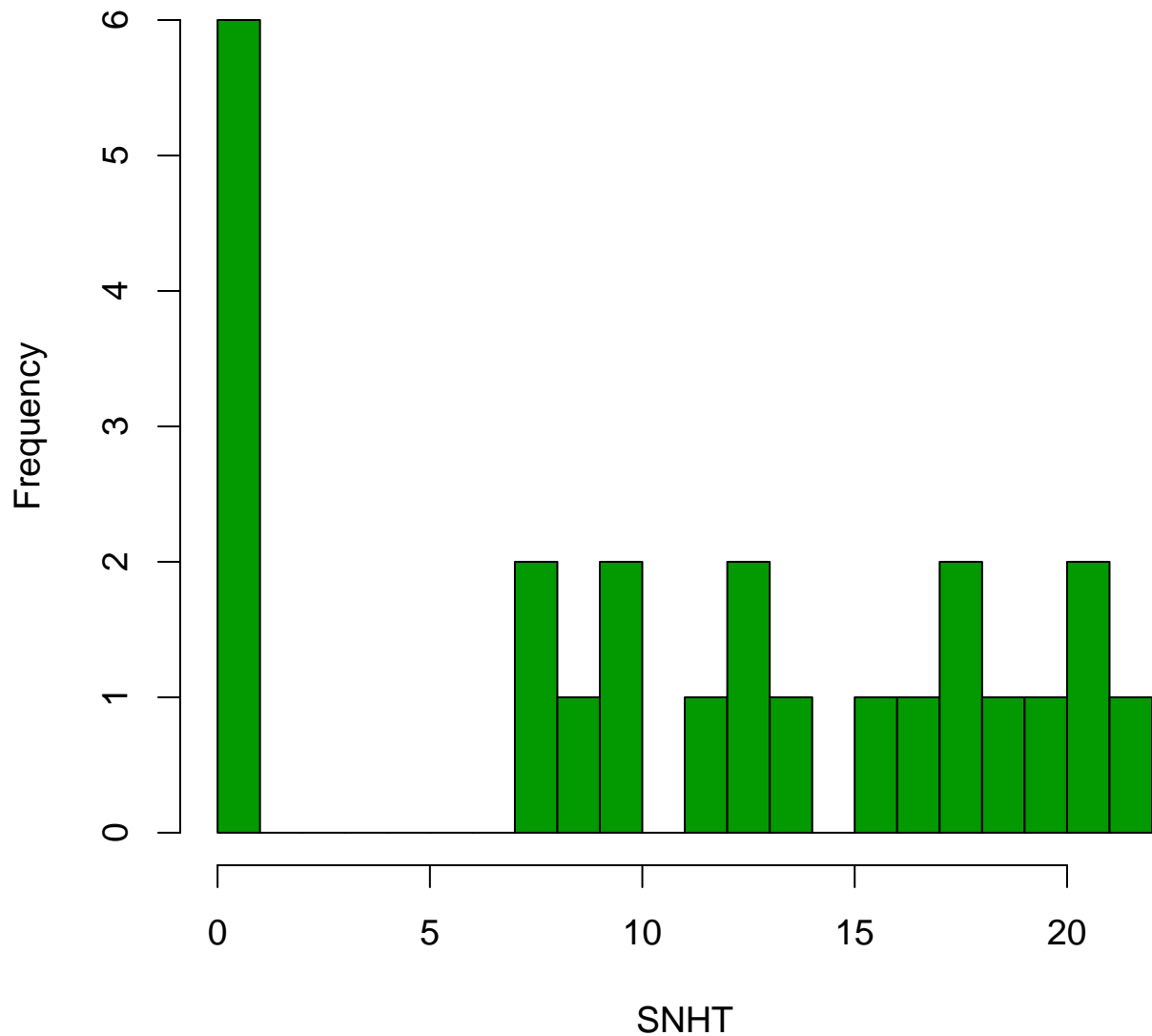
**pre-m 24 (205)**  
**conchamarca**



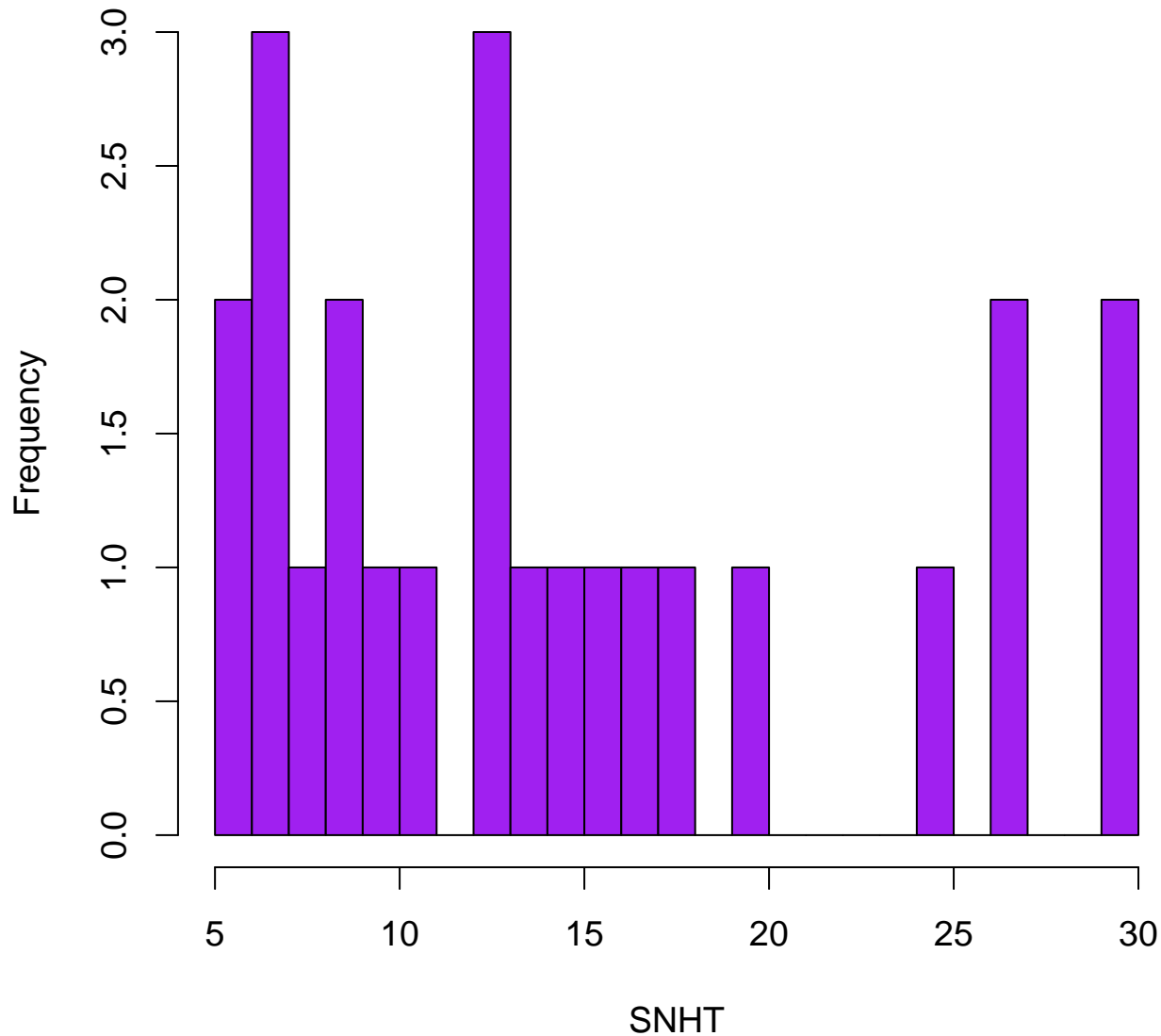
# Histogram of normalized anomalies



# Histogram of maximum windowed SNHT



**Histogram of maximum global SNHT**





## Station's quality/singularity

