Main file names

X indicates the season (1 or 2).

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Filename** |  |  | **Optimization success** | **Season failure** | **No overall seasonality, too few obs in that season, optimization failure** |
| sosX | Start Of Season (decade of modelled fAPAR > fract\_thresh (0.2) amplitude, ascending phase) | FLOAT | number | -999 | NaN |
| eosX | End Of Season (decade of modelled fAPAR < fract\_thresh (0.2) amplitude, descending phase) | FLOAT | number | -999 | NaN |
| eoseX | End Of Season (decade of modelled fAPAR < fract\_thresh2 (0.8) amplitude, descending phase), so erlier than above | FLOAT | number | -999 | NaN |
| lenX | Length of season as eosX-sosX | FLOAT | number | -999 | NaN |
| leneX | Length of season as eosX-sosXe (shorter) | FLOAT | number | -999 | NaN |
| maxtX | Dek of fitted max | FLOAT | number | -999 | NaN |
| maxvX | Value of fitted max | FLOAT | number | 0 | NaN |
| accX | integral of fAPAR over sosX-eosX | FLOAT | number | 0 | NaN |
| acceX | integral of fAPAR over sosX-eosXe | FLOAT | number | 0 | NaN |
| accbX | integral of fAPAR over sosX-eosX (WITH BASELINE SUBSTRACTION (fitted(SOS))) | FLOAT | number | 0 | NaN |
| accebX | integral of fAPAR over sosX-eosXe (WITH BASELINE SUBSTRACTION (fitted(SOS))) | FLOAT | number | 0 | NaN |
| PDHT parameters | | FLOAT | number | 0 | NaN |

Directories

Root

Outputs of the pheno algorithm. Never use this files for further analysis. Use re-aligned files.

All files have one band per analysed year except globstat.

The file globstat is two band. Band 1 contains info on the inversion, band 2 the number of seasons per year (1 = mono-modal, 2 = bi-modal). Band 1 values:

-1 the pixel was not processed because out of mask

0 success

10 more than 40% of the values in the input record are invalid

20 [95th - 5th] percentile range is too low, less than faprangeminthresh

30 unrecognized data periodicity

40 anomalous number of gs was found (lt 1 or gt 2)

Realign on SOS

Here the same outputs present in the root are re-aligned to a specific one-year cycle (starting at any DOY). The file name A*p1p2*-*p3*\_*p4* provides the following info:

*p1*: the DOY used to define the start of the yearly cycle

*p2*: the pheno event used to re-align

*p3*: the first year in the time series

*p4*: the pheno variable in the file

Anomalies

In the root of this directory the overall mean and sd are stored. No need to use this files. A nicely arranged dataset is in the specific folders (e.g. A*p1p2*-*p3*\_*p4*, with p4 representing the variable of interest).

Within these directories, the relevant files have this naming:

Xgspy\_Ys\_AZvvv-1997sssQ\_DOC\_TZPjjj

X = 1-2, areas with 1 or 2 growing season per year

Y = 1-2, season described in the file

Z = DOY dekad used for the alignment (different from 1 when the cycle is not the calendar year)

Vvv = event used to realign

Sss = phenol variable in the file (sos, eos, etc)

Q = 1-2, season describe in the file (same as Y)

Jjj = statistic computed in the file (can be avg, sd)

So for instance, the file 2gspy\_1s\_A1sos-1980\_sos1\_DOC\_TZPavg is about: bimodal areas, first of the two season, was aligned to the calendar year using the sos event, the first year is 1980, and contains the average of sos.