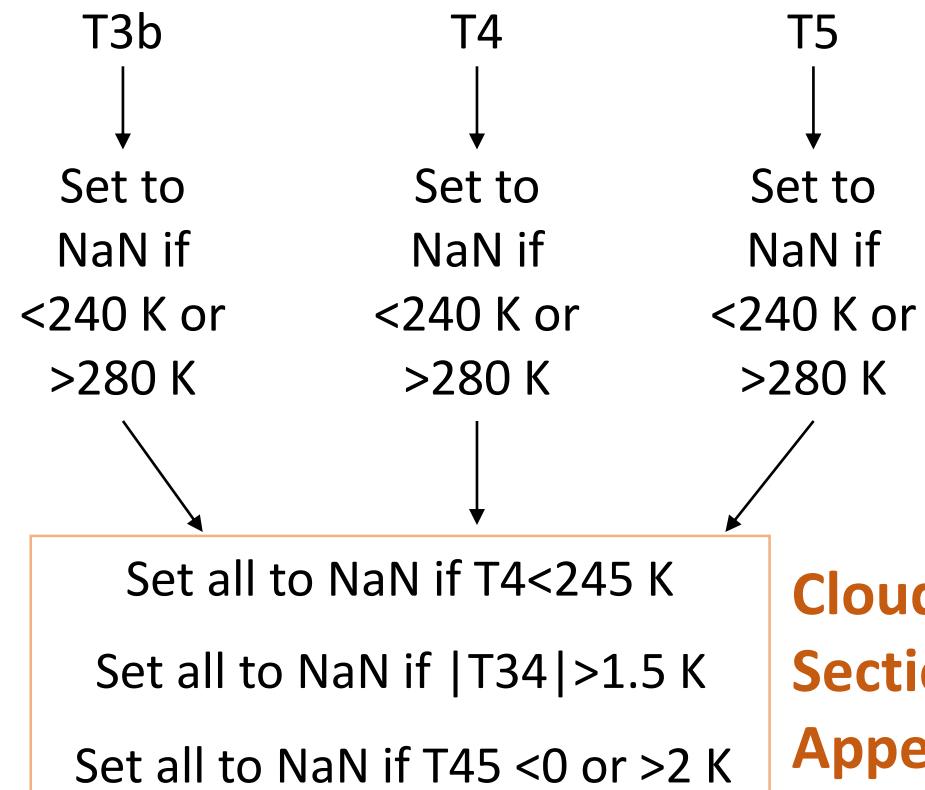
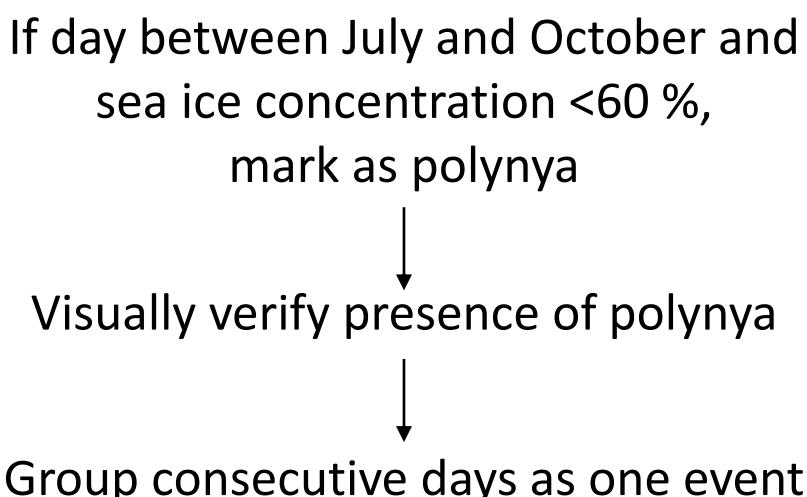


APP daily brightness temperature



**Cloud masking,
Section 2.2 and
Appendix A**

NSIDC daily sea ice concentration



Section 3.1

For each band, compute climatology

For each day and each band, compute the "geographical statistics"

- Geographical median;
- Geographical minimum;
- Geographical maximum;
- Geographical standard deviation.

Extract the geographical statistics of the 15 days leading to each polynya event

For each band, each geographical statistics and each polynya event, compute:

- 15-day minimum **(Fig 4)**
- 15-day maximum
- 15-day sum **(Fig 5)**
- 15-day standard deviation

For each band, compare to climatology

Section 3.2

Criterion found:

If 15-day sum or standard deviation lower than climatological value over same days, polynya is coming (valid for T3b, T4 and T5; no outlier if using the geographical median or geographical maximum)