

1. Retrieval of 3D cloud geometry (Kölling et al., 2019)

2. Computation of L1C data and cloudbow retrieval (Pörtge et al., 2023)

3. Cloudbow detection

no

yes, not possible

4. Retrieval of phase partitioning

Polarization signal saturated

no

yes

ice fraction and optical
thickness from I and Q

ice fraction from Q

ice cloud

5. Shadow mask