High Resolution Snow and Ice

High-Resolution Vegetation Phenology and Productivity parameters at pan-European level provide data about snow properties on land and ice occurrences in the hydrographic network.

Available High Resolution Snow parameters:

Fractional Snow Cover. The Fractional Snow Cover product provides the snow fraction at the Top Of Canopy (FSCTOC) and On Ground (FSCOG).

Gap-filled Fractional Snow Cover. The daily cumulative Gap-filled Fractional Snow Cover (0- 100%) product provides a more complete fractional snow cover information by spatially and temporally aggregating the Fractional Snow Cover data.

Persistent Snow Area. Generated from the Fractional Snow Cover for each hydrological year, the Persistent Snow Area provides information about the yearly extent of persistent snow cover.

Wet/Dry Snow. The Wet/Dry Snow product is differentiating snow state conditions within the snow mask defined by the fractional snow cover at top of canopy.

SAR Wet Snow. This product provides information about the wet snow extent in high-mountain areas.

Available High Resolution Ice parameters:

River and Lake Ice Extent. Provides pixel-based NRT information about ice presence in European rivers and lakes as defined by the EU-Hydro database and is based on data from Sentinel-1 and Sentinel-2.

Aggregated River and Lake Ice Extent. Provides information about the presence of ice or snow, open water and other soil features like vegetation and bare soil on 10 km river segments and lakes. This spatially aggregated product is derived from the different River and Lake Ice Extent products.

The product suite is operational since September 2016 onwards.

The High-Resolution Snow and Ice product suite is part of the European Union's Copernicus Land Monitoring Service.

Simple

Date (Publication)	2021-09-01
Citation identifier	copernicus_hrsi_s
Citation identifier	DAT-244-en

Point of contact

No information provided.

Continents, countries, sea regions of the world.	• EEA38 (from 2020) • United Kingdom
EEA Management Plan	• 2020 3.6.7
Keywords	
Keywords	

EEA topics	• Land use
GEMET	• river • lake • monitoring • snow • climate change impact • land cover • landscape alteration • land use • ice
GEMET - INSPIRE themes, version 1.0	• Land cover
[Spatial scope](#)	• [European](#)
Temporal resolution	• Irregular • Six days • Daily • Annually • Five days
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Spatial representation type	Vector

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Denominator	50000
Language of dataset	English
Character set	UTF8
Topic category	- Climatology, meteorology, atmosphere - Environment - Imagery base maps earth cover

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Begin date	2016-09-01
Begin date	2017-05-14

Metadata

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Metadata standard name	ISO 19115:2003/19139
Metadata standard version	1.0

Metadata author	Organisation name	Individual name	Electronic mail address	Website	Role
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Overviews
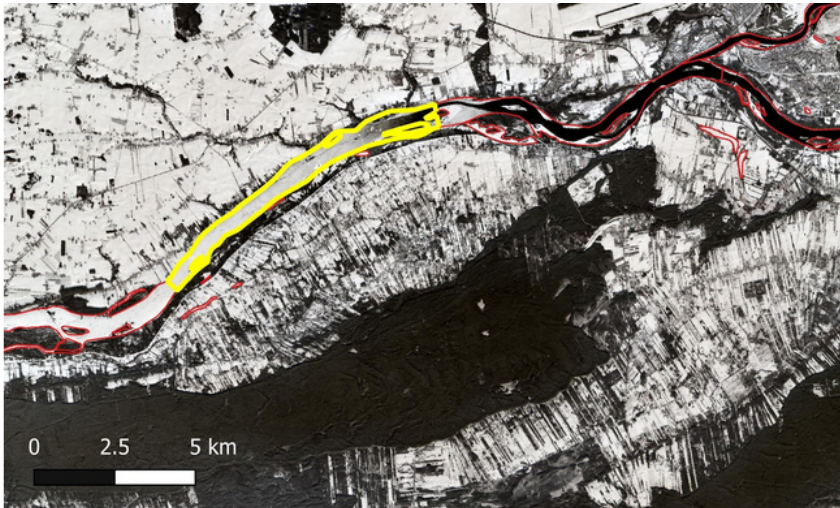
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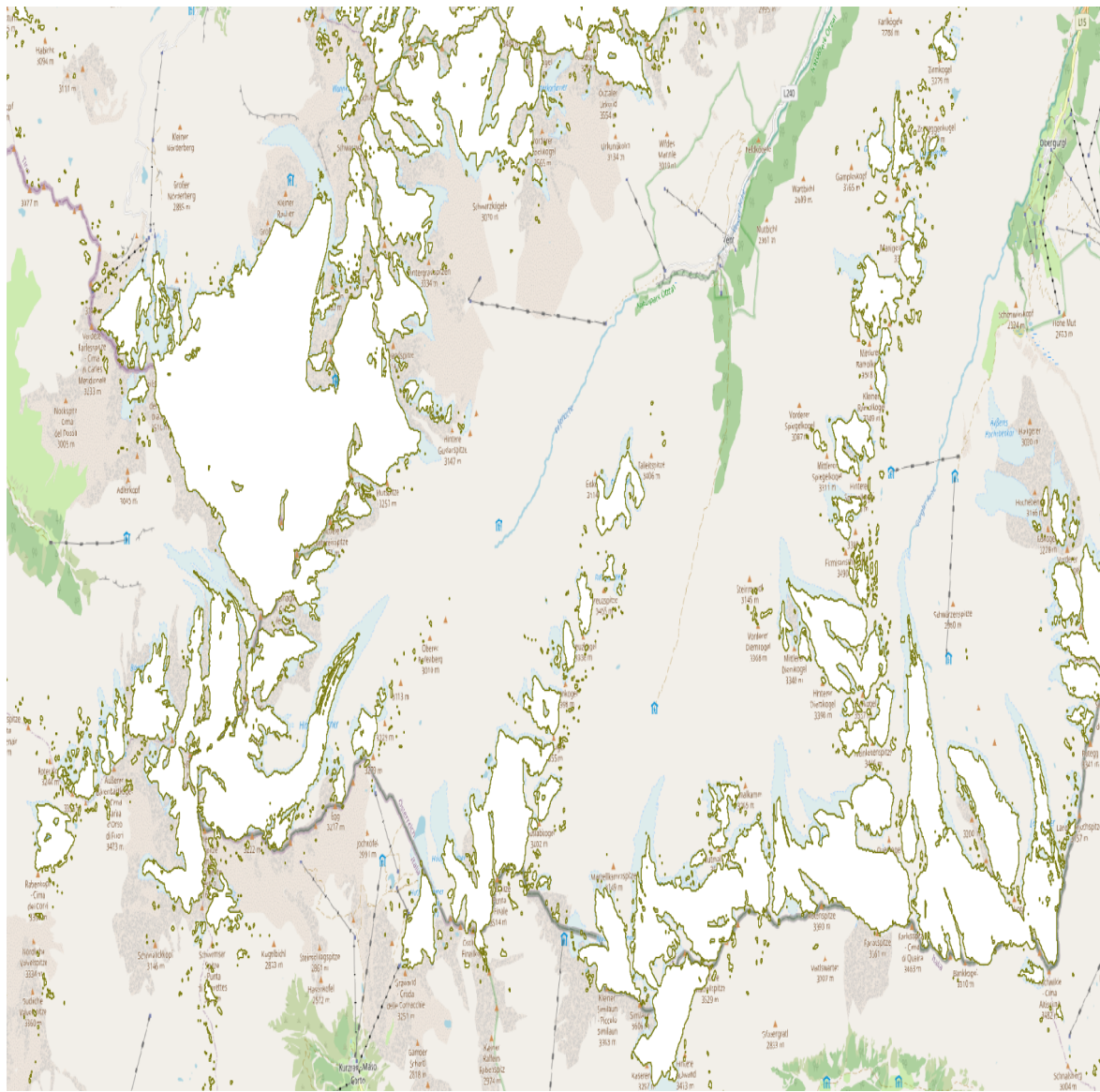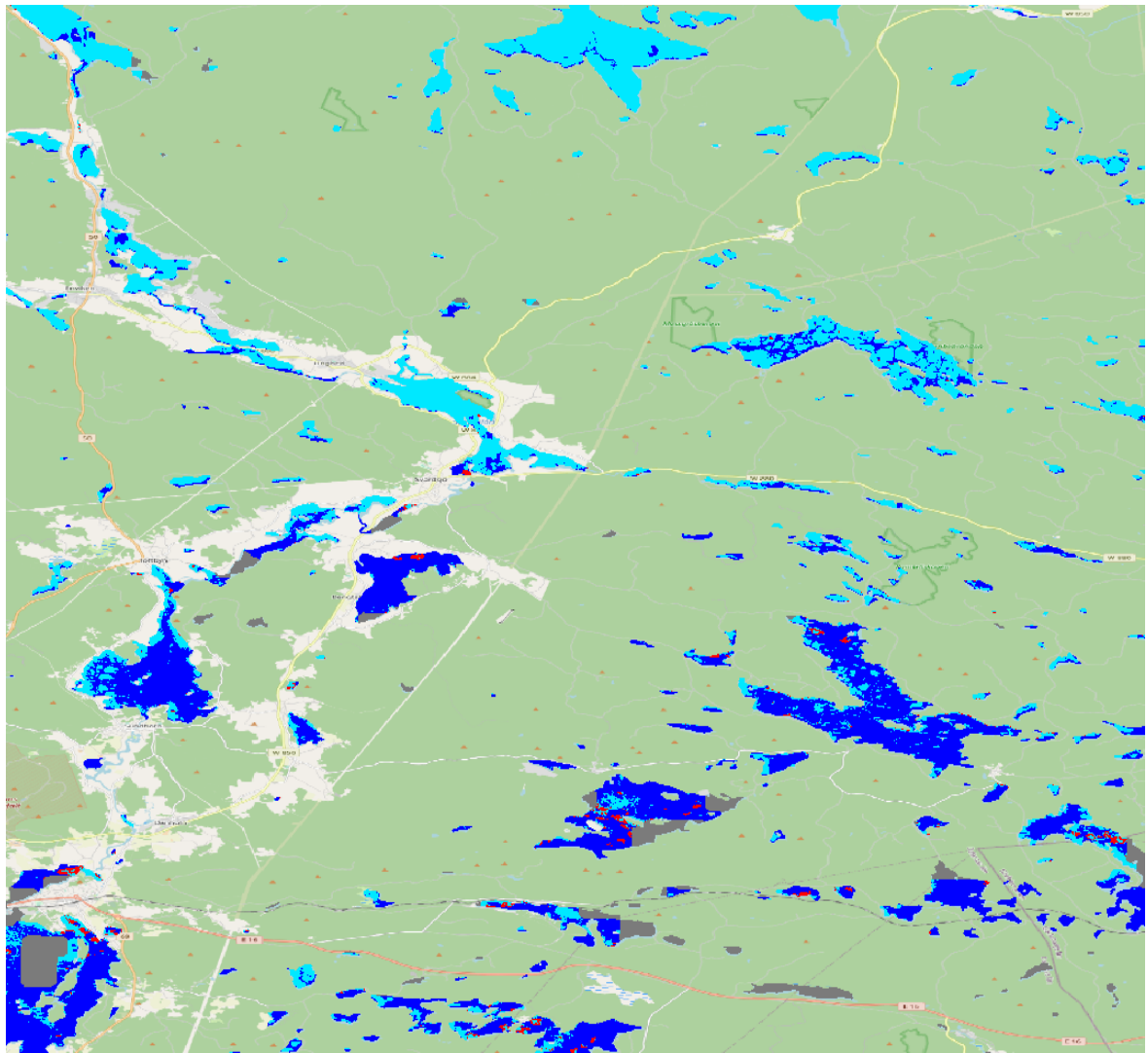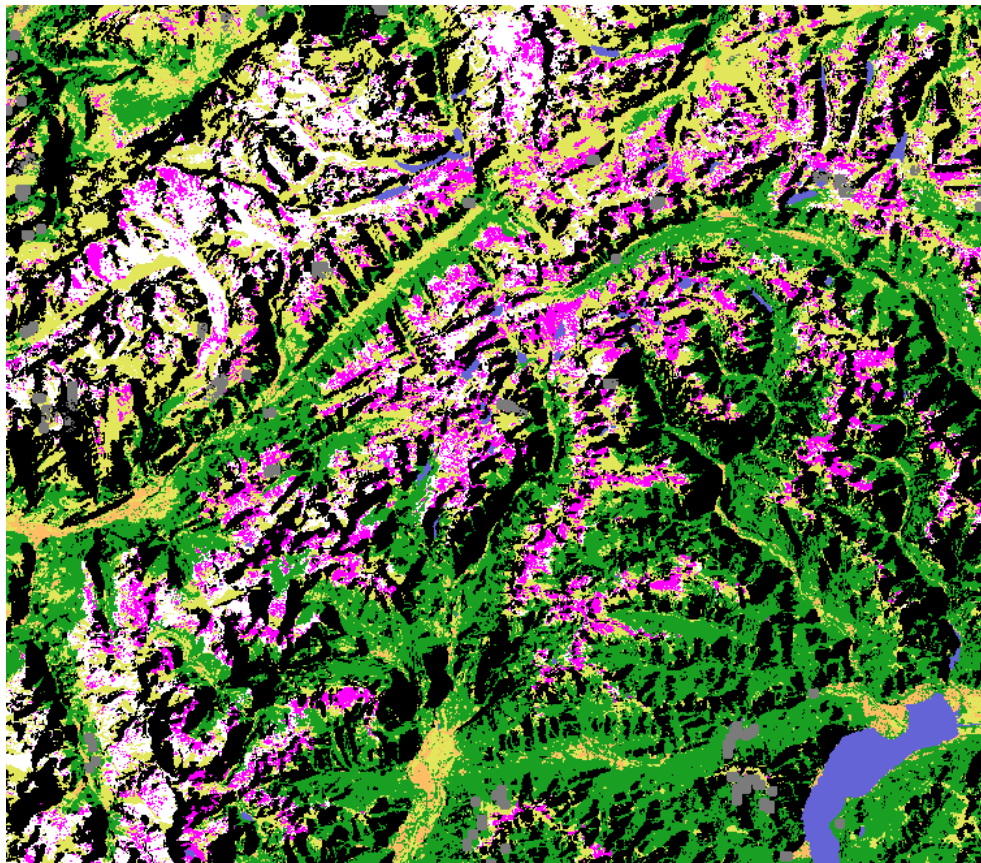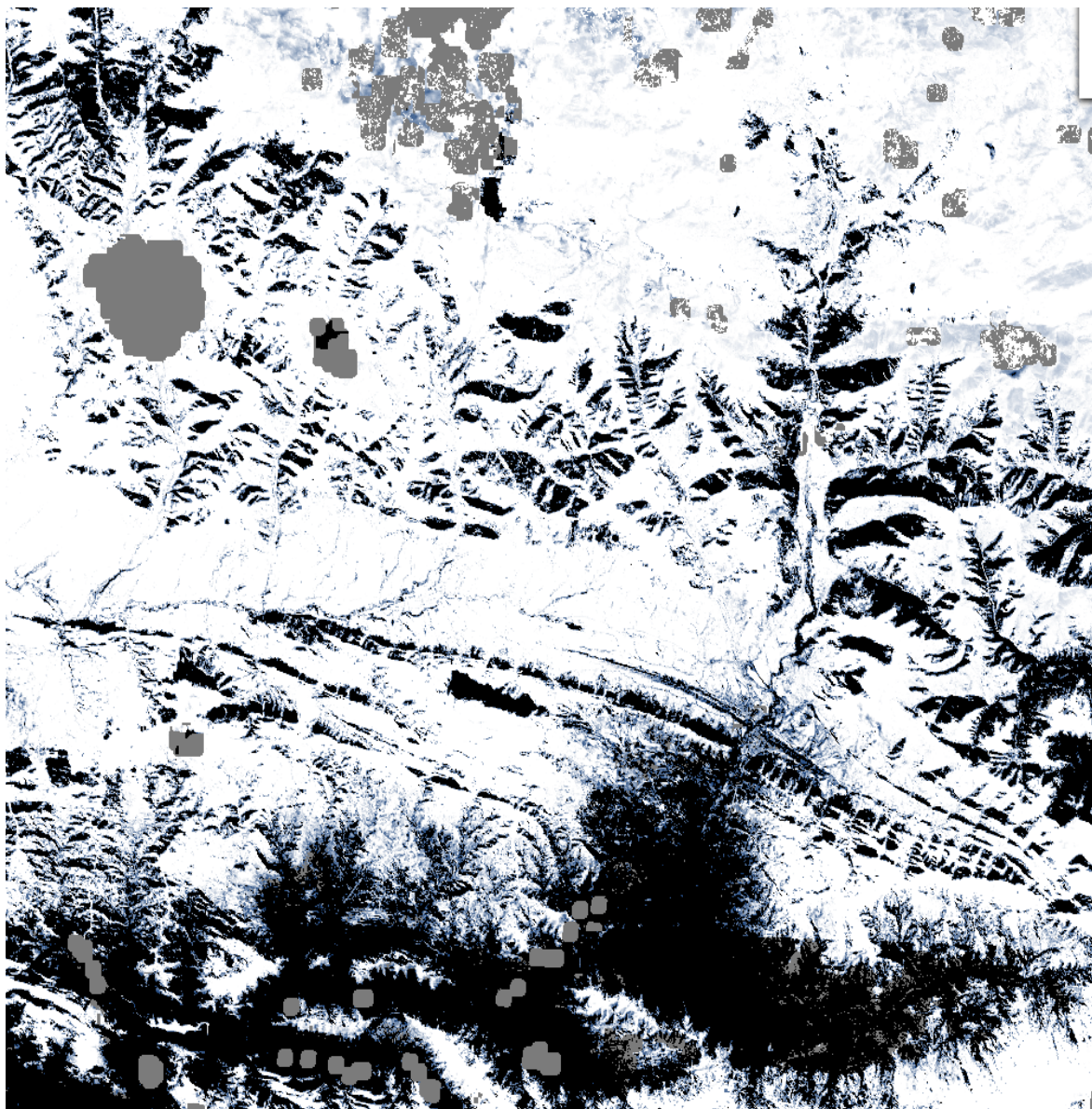| id	river_km_id	datetime	water_perc	ice_perc	other_perc	cloud_perc	nd_perc	qc	type
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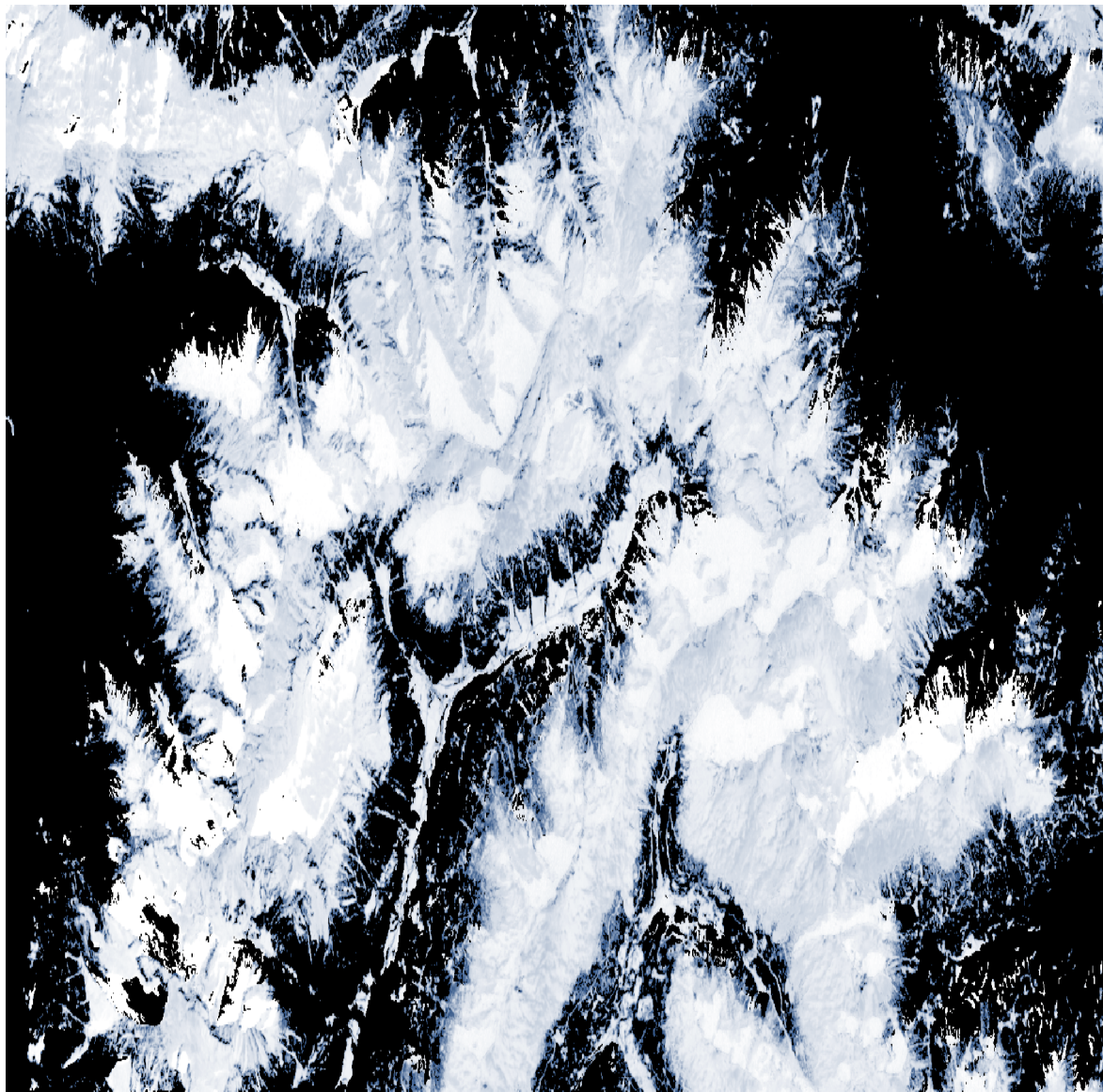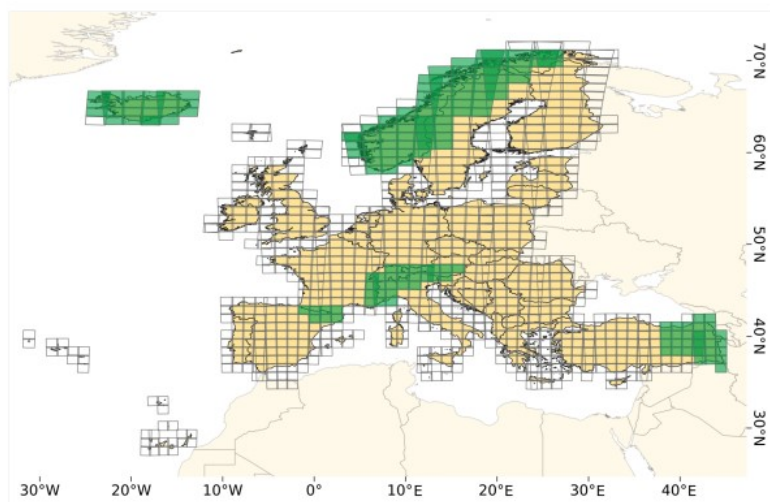
Figure 4. S2 tiles over the EEA39 domain with tiles selected for the SWS product generation highlighted in green colour.

Provided by

EEA