WEATHER CLIMATE WATER
TEMPS CLIMAT EAU

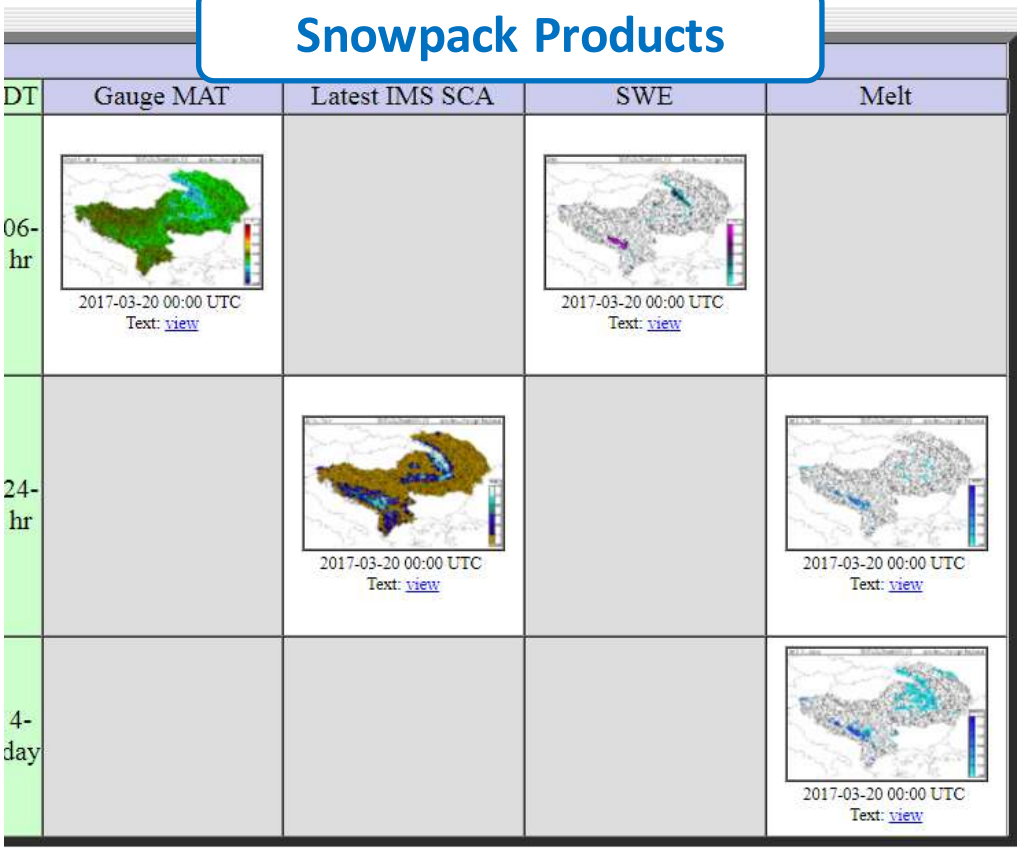
Overview of the SEEFFGS Products: Snow Products

WMO OMM
World Meteorological Organization
Organisation météorologique mondiale

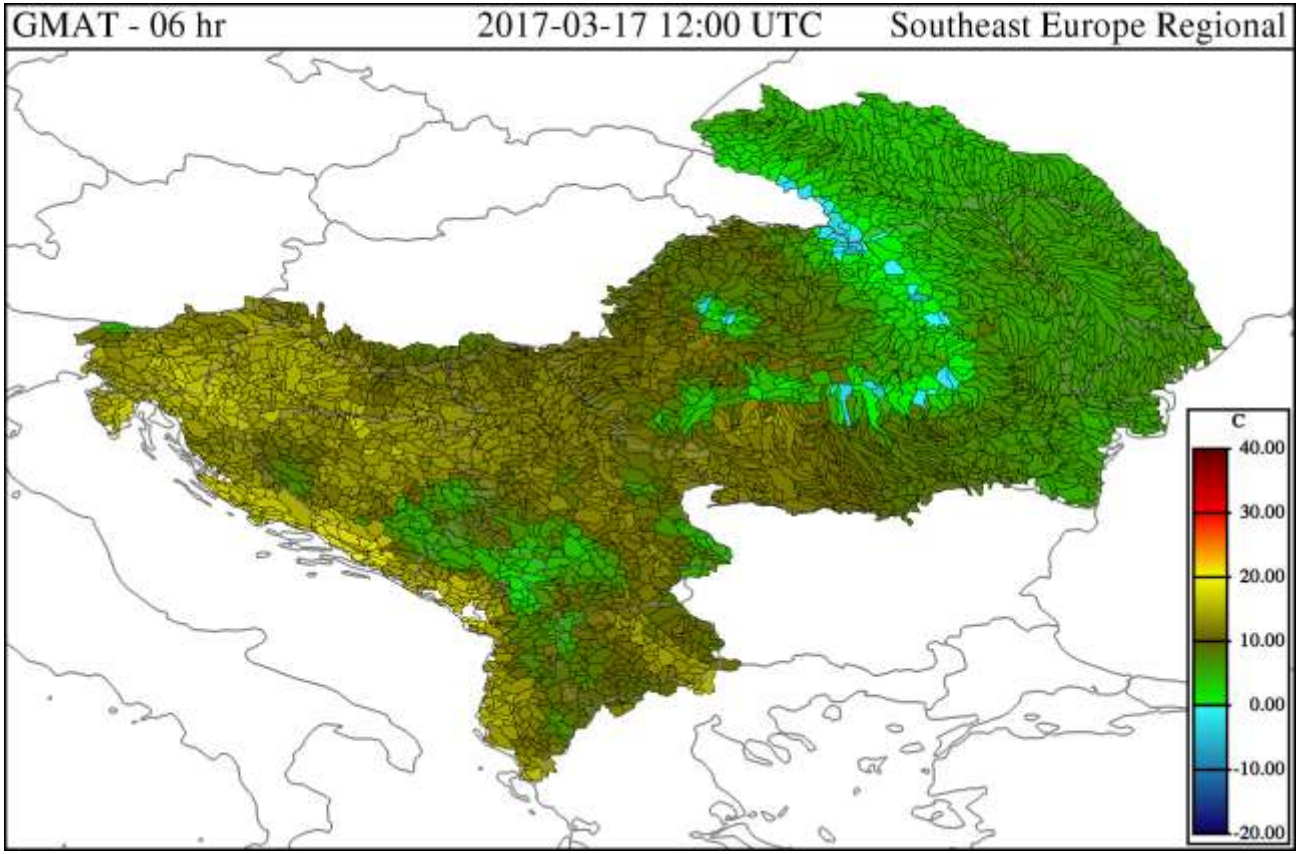
SEEFFGS Snow Products

Snow accumulation and melting have significant importance for the SEE region because of flash flood occurrence due to rapid melting during the spring.

Snowpack Products

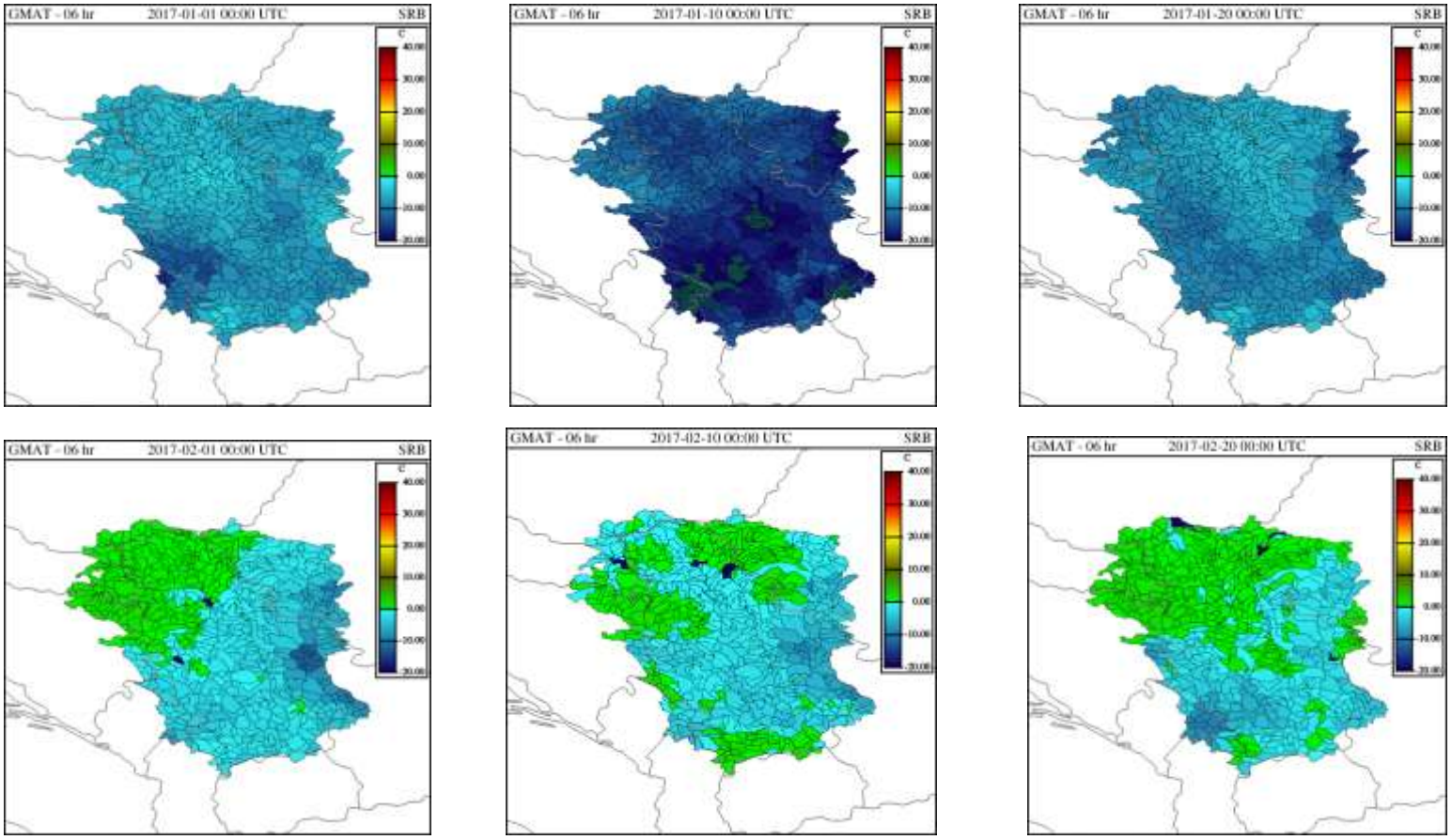


Gauge MAT
(Mean Areal Temperature)



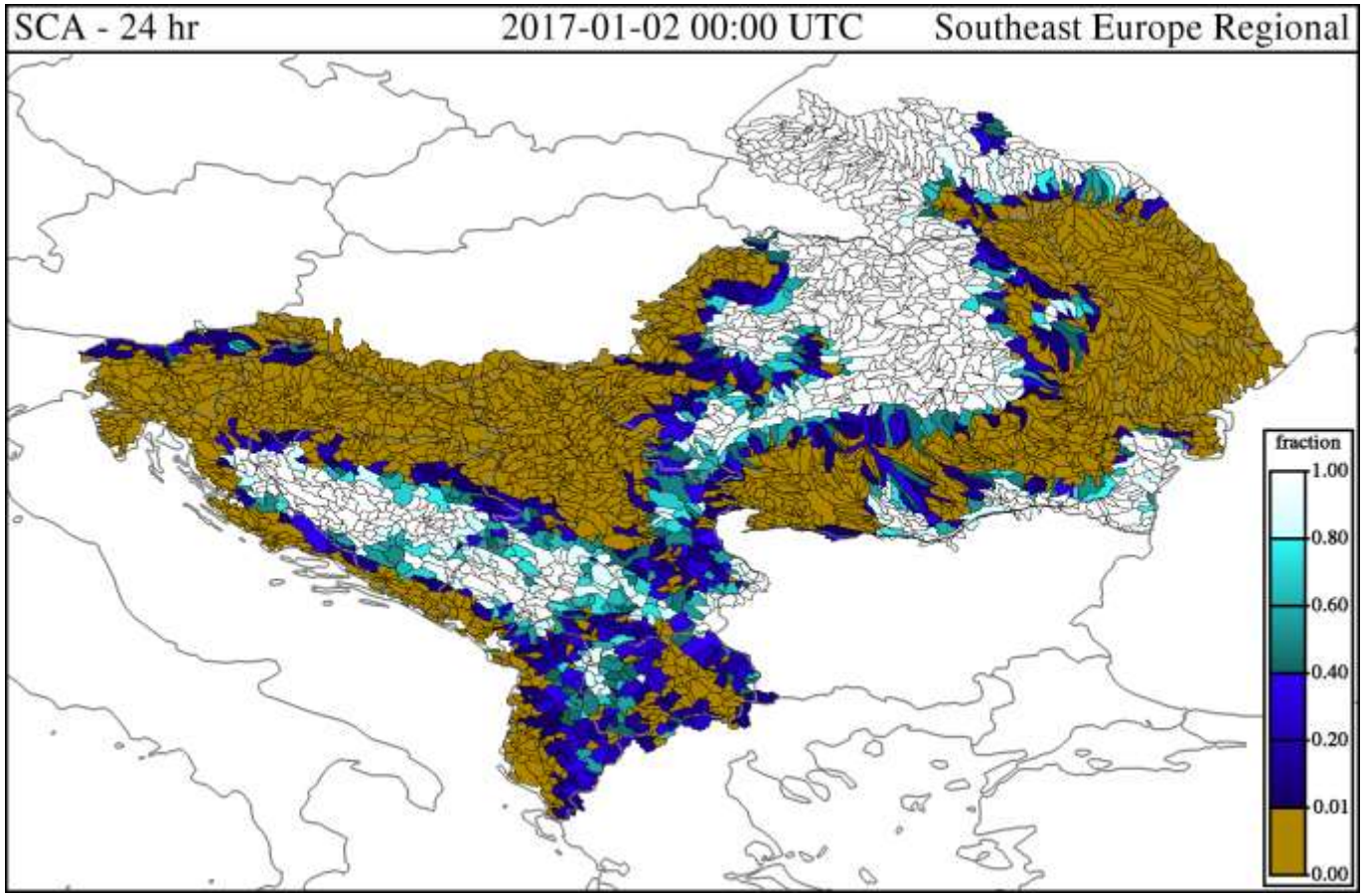
- GMAT is generated by using synoptic observations that are disseminated through WMO Global Telecommunication System (GTS) and Global Forecasts System (GFS).
- GMAT is estimated four times a day over the last 6 hours ending at 00 UTC, 06 UTC, 12 UTC, and 18 UTC.

Gauge MAT
(Mean Areal Temperature)



Temporal and spatial distribution of Gauge MAT, Serbia

Latest IMS SCA (Snow Coverage Area)



- This product provides the latest estimate of the fraction of snow cover for each basin.
- Latest IMS SCA represents the best available snow cover product and is updated every 24 hours.

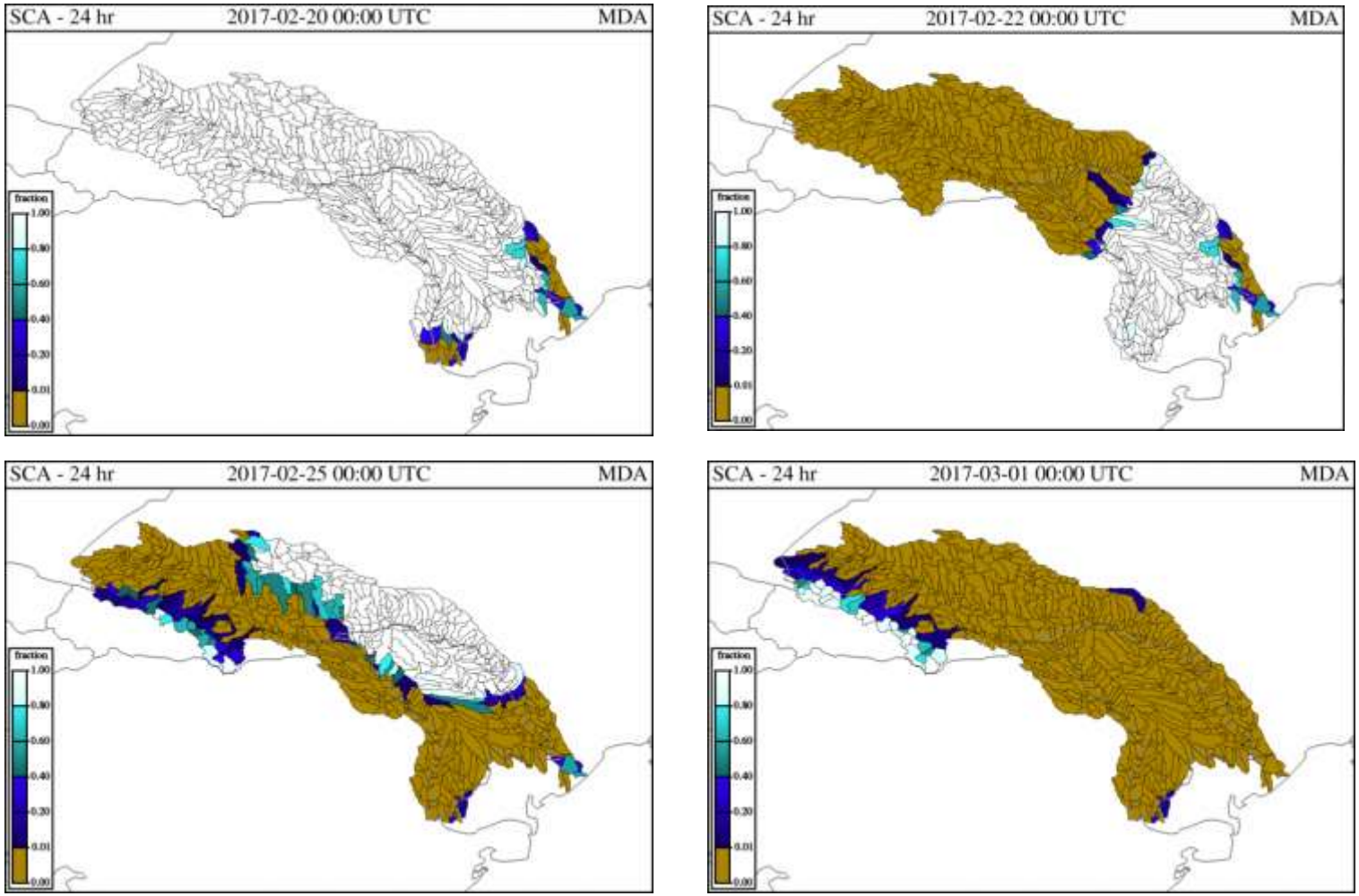
Latest IMS SCA (Snow Coverage Area)

- For SEEFFG system, snow cover is retrieved daily from the Interactive Multi-sensor Snow and Ice Mapping System (IMS), made available as a global product through the National Snow and Ice Data Center, NOAA.

- It provides snow cover information at 4km x 4km resolution that is based on summary of multiple sensors on-board of various satellites. These include geostationary and polar orbiters with sensors such as MODIS, AVHRR, and passive microwave sensors.

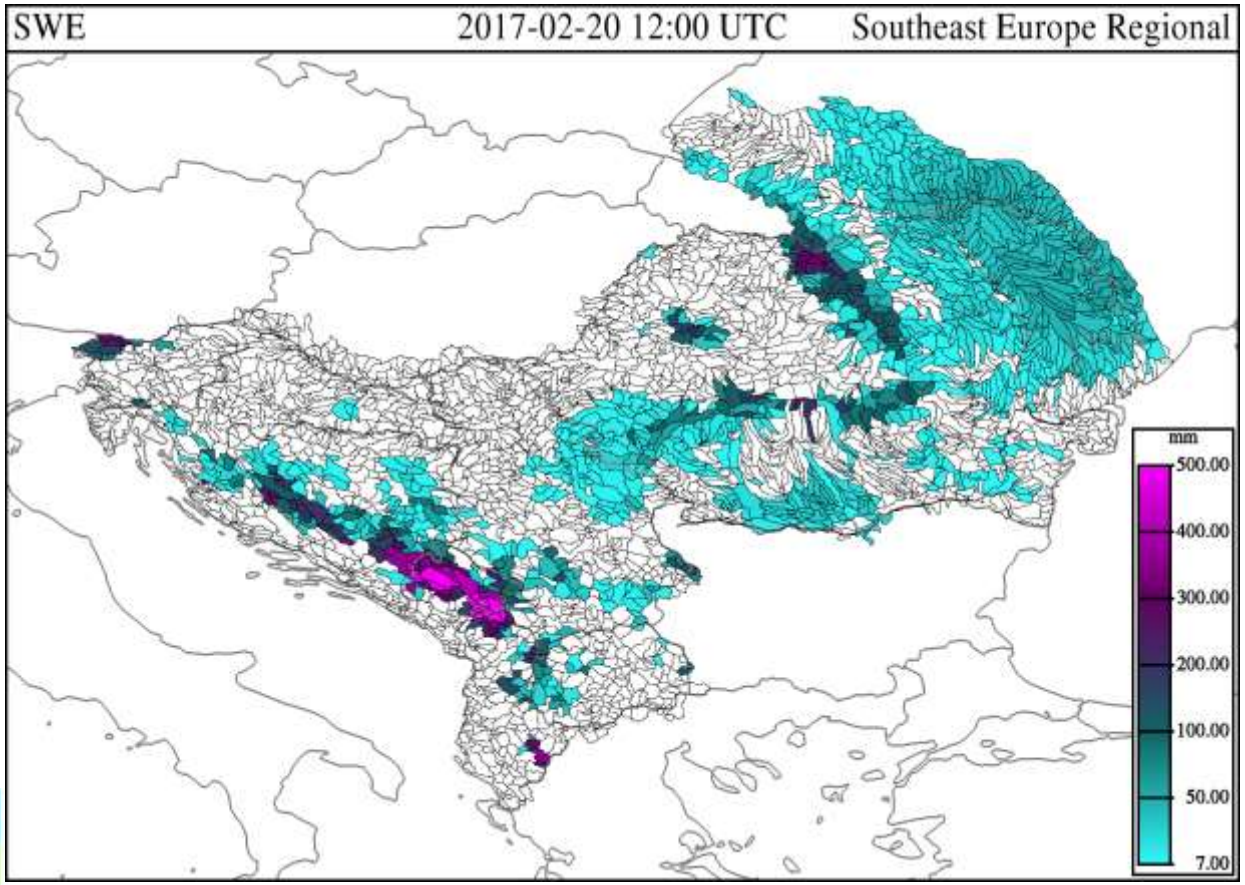
- The product is made available daily around 23:00 GMT using GIS technology

Latest IMS SCA (Snow Coverage Area)



Temporal and spatial distribution of SCA, Moldova

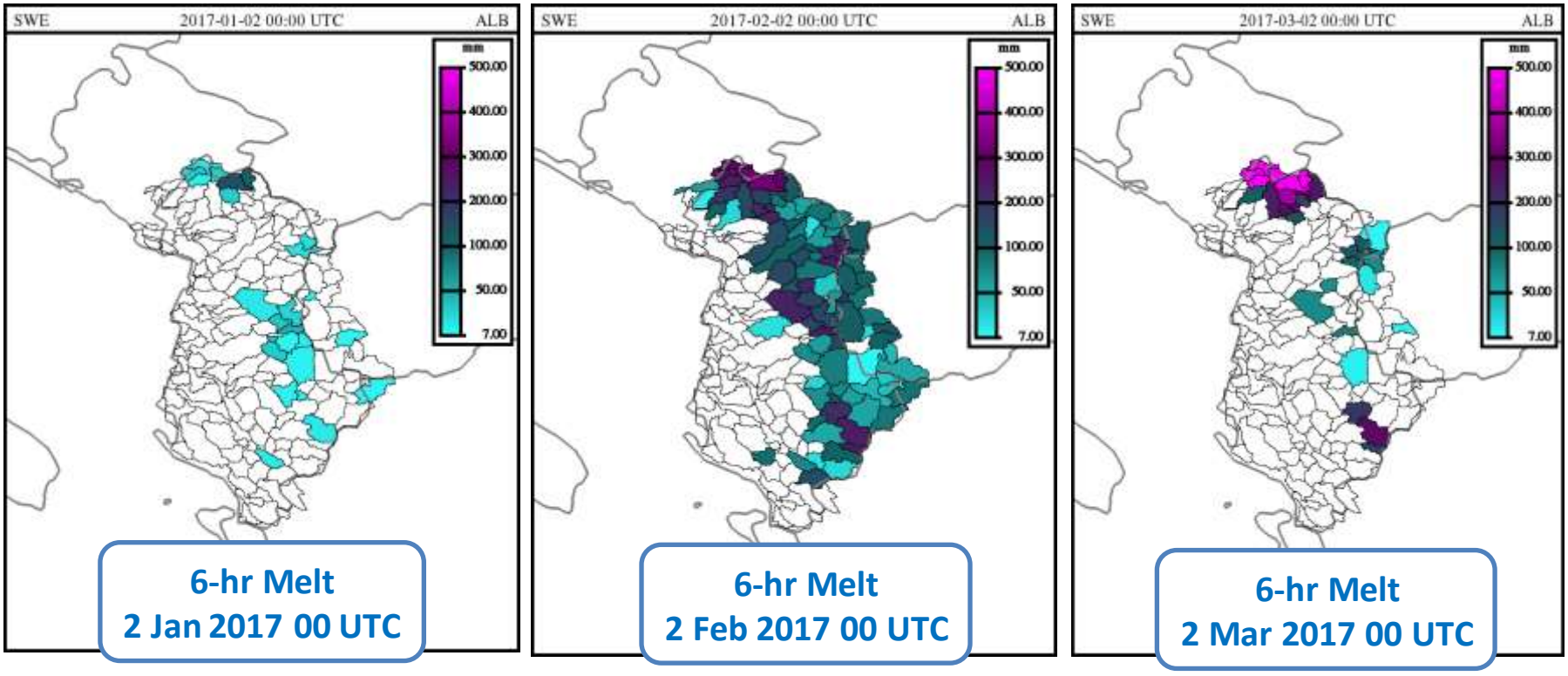
Snow Water Equivalent (SWE)



- The Snow Water Equivalent (SWE) product is a direct output of SNOW-17 accumulation and ablation model in the SEEFFGS and is estimated at 00 UTC, 06 UTC, 12 UTC and 18 UTC
- SWE is a very important product to show available water content in each sub-basin for flash flooding.

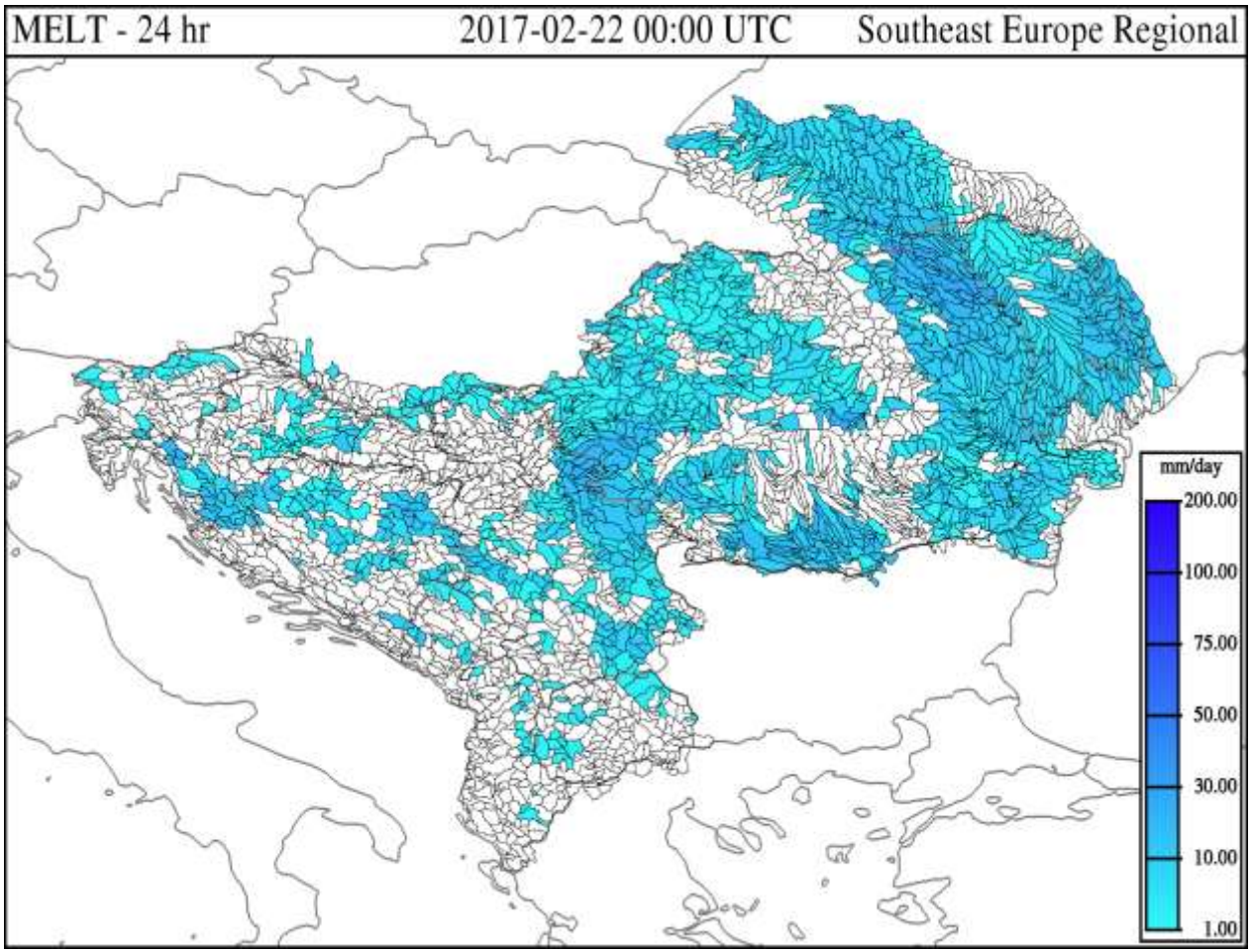
Snow Water Equivalent (SWE)

The SNOW-17 model has two input variables namely gauged MAT and merged MAP and simulates several products including SWE and MELT by using equations that solve for energy and mass balance.



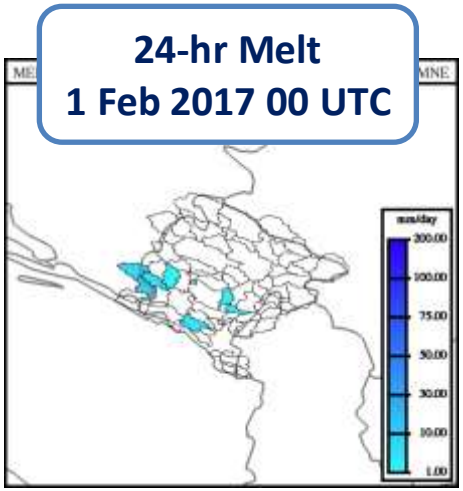
Temporal and spatial distribution of SWE, Albania

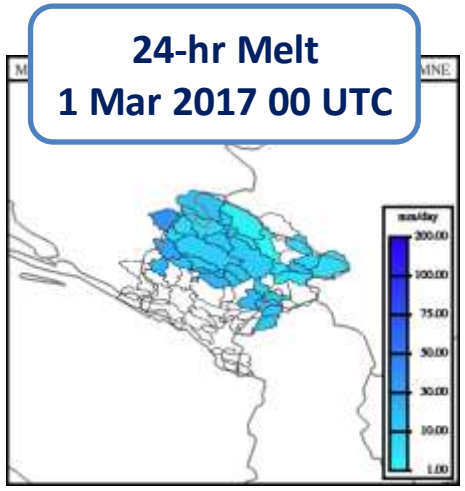
Snow Melt

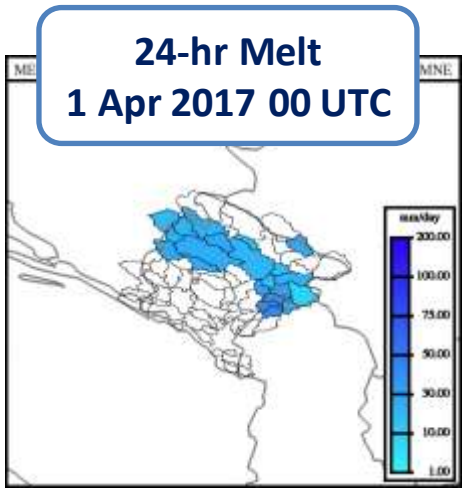


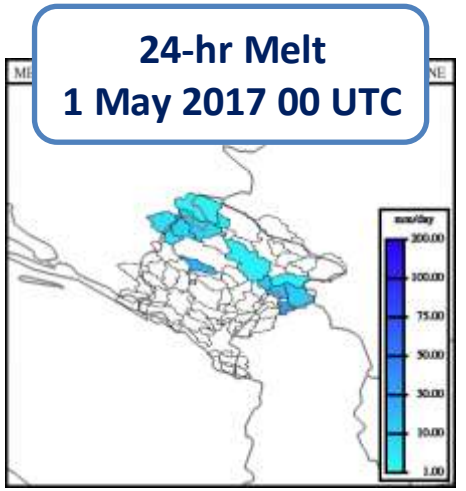
- Melt is estimate of ablation due to melt processes and is direct output of the SNOW-17 model.
- Melt is estimated every six hours at the model runtimes of 00 UTC, 06 UTC, 12 UTC and 18 UTC.
- The product provides six-hour cumulative melt over periods of 24 and 96 hours.

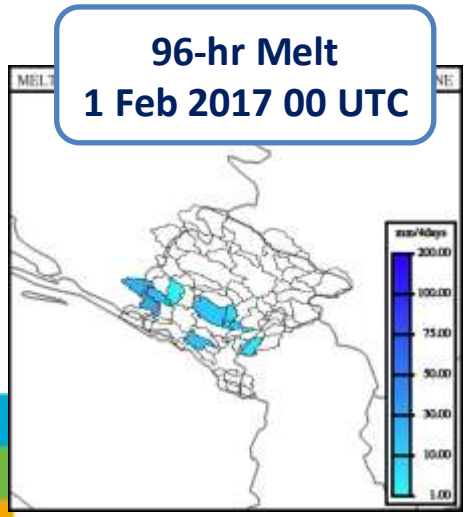
Snow Melt

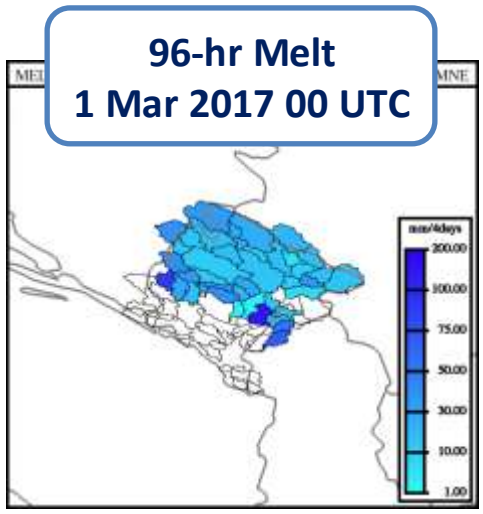


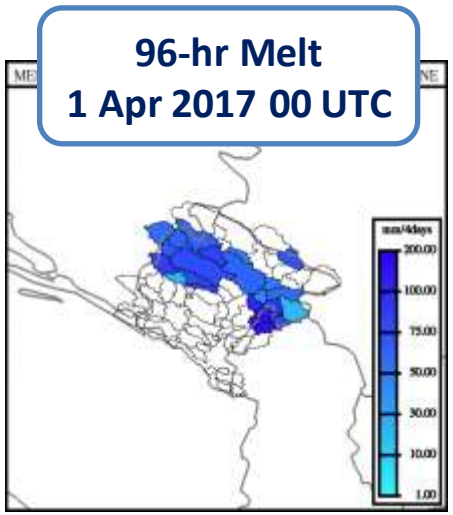


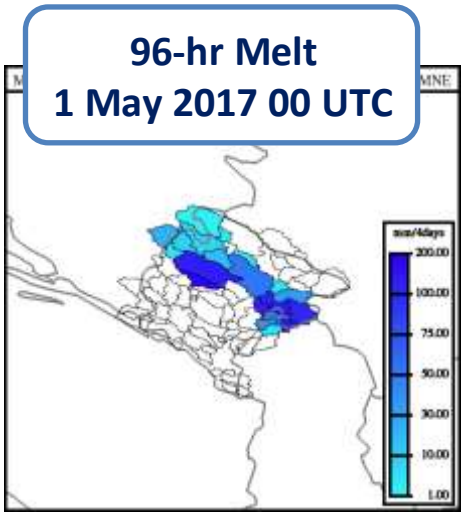












Temporal and spatial distribution of Melt, Montenegro

Thank you

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For more information please visit:	**http://www.wmo.int/ffgs**
	http://www.hrcwater.org

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