







Sixth Session of SOUTHEASTERN EUROPE CLIMATE OUTLOOK FORUM (SEECOF-6) November 28-30, 2011, Belgrade, Serbia

SEASONAL OUTLOOK FOR WINTER SEASON 2011/2012 FOR THE SOUTH EASTERN EUROPE AND CAUCASUS REGION (SEE&C)

Under the overall coordination of WMO and the South East European Virtual Climate Centre (SEEVCCC), hosted by Republic Hydrometeorological Service of Serbia, SEECOF-6 was held in Belgrade, Serbia, from 28 to 30 November 2011. Representatives from fourteen National Meteorological and Hydrological Services of Southeast Europe and Caucasus region, namely Armenia, Azerbaijan, Bosnia and Herzegovina, Bulgaria, Croatia, Cyprus, Georgia, Greece, Hungary, Former Yugoslav Republic of Macedonia, Israel, Moldova, Montenegro, Romania, Serbia, Slovenia and Turkey participated in the implementation of SEECOF-6.

Climate experts from WMO RA VI Pilot RCC Network Nodes on Long-range Forecasting (Meteo France, France and Roshydromet, Russia) and on Climate Monitoring (Deutscher Wetterdienst, Germany), UK Met-Office, Global Producing Center ECMWF, International Research Institute for Climate and Society (IRI, USA), National Centers for Environmental Prediction (NCEP,USA), South Eastern Europe Virtual Climate Change Centre (SEEVCCC, Serbia) and National Hydrometeorological Services of SEECOF region provided their valuable contribution to the successful implementation of SEECOF-6 by developing the relevant documents and providing scientific guidance and recommendations.

The SEECOF-6 comprised of the following Steps:

- > Step 1: qualitative verification of the SEECOF-5 climate outlook for Summer 2011;
- ➤ Step 2: assessment of the current state of the climate including large-scale climate patterns worldwide and assessments of its likely evolution in the course of the next months:
- ➤ Step 3: building the consensus forecast for Winter season 2011/2012.

All relevant documentation is posted and updated in SEEVCCC web site: http://www.seevccc.rs

SEECOF- 6 CONSENSUS OUTLOOK FOR WINTER SEASON 2011/2012

This prediction is based on output from dynamical models, statistical models and known teleconnections of large-scale climate features.

Amongst the large scale modes of variability expected to influence the southeastern European climate this winter are snow cover extent and sea-surface temperature in the North Atlantic. For both, the values observed recently are most commonly associated with zonal flow over Europe during winter. Also, moderate La Niña conditions currently re-established in the tropical Pacific and predicted to continue throughout winter are likely to influence the large-scale circulation over the area of interest. In addition, several general circulation models predict a similar, zonal, seasonal pressure pattern.

The consequences for temperature and precipitation vary across the region due to local factors. The maps show the probabilistic consensus forecast for tercile categories of anomalies of seasonal-mean temperature and precipitation, relative to the period 1971-2000.

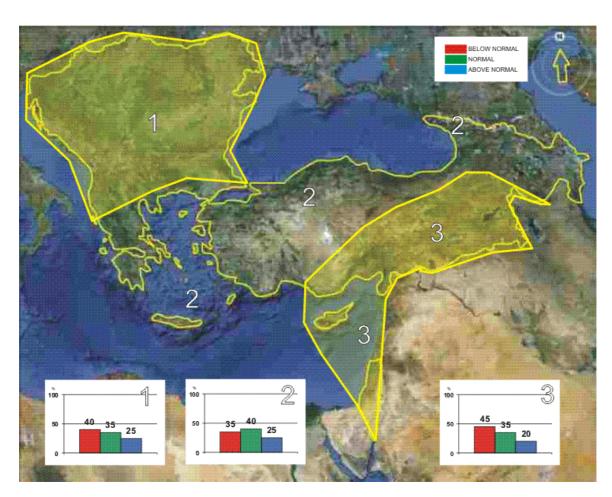


Figure 1. Graphical presentation 2011/2012 winter precipitation outlook

In summary, current indications are for increased likelihood (relative to climatology) of drier-than-average conditions over most of the Balkan Peninsula (except southernmost parts – zone 1 in figure 1) and for southeastern parts of the region (zone 3 in figure 1). For the rest of the region (zone 2 in figure 1), local influences make the near-normal category most likely. It must be emphasised that even in the event of seasonal totals below the long-term average, shorter spells of heavy precipitation are still possible.

Although clear, the precipitation signals for this season are not strong (see predicted probabilities).

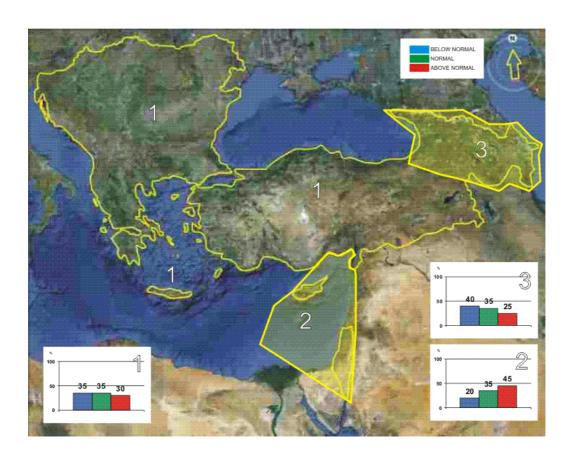


Figure 2. Graphical presentation 2011/2012 winter temperature outlook

This winter, uncertainties in regional predictions for temperature are larger than for precipitation.

In summary, there are higher probabilities for below-average than for near— or above—average temperatures in the northeastern part of the region (zone 3 in figure 2). By contrast, in southeastern parts (zone 2 in figure 2), warmer-than-average conditions are predicted as most likely.

For the western and central parts of the SEECOF region (zone 1 in figure 2) the uncertainty is large: probabilities for below-, near- or above-average conditions are approximately equal.

Though colder-than-average temperatures are possible at times, it is unlikely that values will be as low as last winter.

Any further advice on the forecast signals, shorter-range updates and warnings will be available throughout the winter from the National Meteorological Services, along with details on the methodology and skill of long-range predictions.

* The graphical representation of climate outlook in this statement is only for guidance purposes, and does not imply any opinion whatsoever concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries.

APPENDIX A: Contributors to SEECOF-6

- World Meteorological Organization
- Met Office, United Kingdom
- International Research Institute for Climate and Society, United States of America
- European Center for Medium Range Weather Forecast
- Meteo France, Republic of France
- Federal Service for Hydrometeorology and Environmental Monitoring, Russian Federation
- Deutscher Wetterdienst, Federal Republic of Germany
- National Centers for Environmental Prediction, United States of America
- > South East European Virtual Climate Change Center hosted by Republic Hydrometeorological Service of Serbia, Republic of Serbia
- > Armenian State Hydrometeorological and Monitoring Service, Republic of Armenia
- > National Hydrometeorological Department, Republic of Azerbaijan
- National Institute of Meteorology and Hydrology, Republic of Bulgaria
- Meteorological and Hydrological Service, Republic of Croatia
- Meteorological Service, Republic of Cyprus
- Hellenic National Meteorological Service, Greece
- > The National Environmental Agency of Georgia, Georgia
- Meteorological Service of the Republic of Hungary, Republic of Hungary
- Israel Meteorological Service, State of Israel
- Republic Hydrometeorological Institute, Former Yugoslav Republic of Macedonia
- > State Hydrometeorological Service, Republic of Moldova
- > Hydrometeorological Institute of Montenegro, Montenegro
- National Meteorological Administration, Romania
- Federal Hydrometeorological Service of the Federation of Bosnia and Herzegovina, Federation of Bosnia and Herzegovina, Bosnia and Herzegovina
- Republic Hydrometeorological Service of the Republic of Srpska, Republic of Srpska, Bosnia and Herzegovina
- Republic Hydrometeorological Service of Serbia, Republic of Serbia
- Meteorological Office, Republic of Slovenia
- Turkish State Meteorological Service, Republic of Turkey