



Weather forecast efficiency analysis in Nizhny Novgorod based on various informational meteorological service systems

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There is a large number of numerical methods used to forecast weather for a certain period. In fact, weather conditions comprise various characteristics, but it is essential to know the air temperature. This is the main metric of the current research. The purpose is an independent weather accuracy assessment for a day, two days and up to six days ahead using three sites: weather.com, gismeteo.ru, meteoinfo.ru. The basic idea is to collect extremum temperatures during the period (2016 – 2017) and calculate the determination coefficient by using real values and previously predicted ones. Moreover, the whole period is divided into monthly periods to investigate seasonal variability of prediction efficiency. Thus, the most significant deviations of predicted and real extremum temperatures will indicate the dates with some weather accidents. The average results of the whole period shows 96% of accuracy prediction for one day ahead, 93% for 2 days, 90% for 3 days and 70% for 6 days. The descending accuracy of scaling days is described quantitatively for various periods.