

January begins with unusually high temperatures

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The climatic anomalies at the beginning of winter, with unusually high temperatures exceeding 20–21°C in many places, led to a resumption of vegetation processes in autumn-sown crops in parts of the arable regions of the country. The unseasonably warm weather caused, in some of the extreme southwestern regions, premature and undesirable bud swelling in certain early-flowering shrub and fruit species such as cornelian cherry, apricot, peach and cherry.

At the beginning of January the agrometeorological conditions will continue to be determined by above-normal temperatures and average daily values in the arable regions above the biological minimum required for the occurrence of delayed vegetation in winter cereal crops.

During the second half of the first ten-day period a decrease in temperatures and a change in the agrometeorological conditions are forecast. The expected cooling during this period will terminate the late vegetation of the winter cereal crops and will hinder the untimely development of some tree species, which would otherwise lead to a reduction in their winter hardiness. During the second and third ten-day periods the agrometeorological conditions will be determined by temperatures close to the climatic norms, which will maintain the winter cereals in a state of dormancy.

In January, wheat and barley stands will overwinter in different phenological stages. Late-sown winter cereals at the end of autumn, in the agrometeorological stations Băzovec, Nikolaevo, Kazanlăk, Sliven and Chirpan, are in the emergence phase and the initial stage of leaf formation. In the November-sown stands in Kneža, Tărgoviște, Pazardžik, Haskovo and Ljubimec, the third leaf stage predominates. A small part of the wheat and barley stands in some places in the Danube Plain – the Novachene agrometeorological station – and in the Upper Thracian Lowland in the Plovdiv region are in the tillering phase, which is the appropriate phase for overwintering. In January the forecast minimum temperatures, down to minus 13°C, will not pose a risk to the permanent crops and to the winter cereals that have entered the tillering phase. In conditions without snow cover, values in the range of minus 10–13°C, if they persist for a longer period, will be critical for the late-sown, poorly established stands. The forecast precipitation in January, around and above the norm, will increase soil moisture reserves in the one-metre and two-metre soil layers. At the end of December, soil moisture reserves for wheat in the one-metre layer in most of the arable regions were above 85–90% of field capacity (FC).

During the month, more suitable conditions for carrying out winter pruning of pome fruit species will occur at the beginning of the first and during most days of the third ten-day period.

Source: NIMH