

M. TERLETSKA, L. BUGRYN, S. SMETANA

Institute of Agriculture of Carpathian Region of NAAS

**YIELD AND BOTANIC-FARMING COMPOSITION
OF PASTURE GRASS STAND DEPENDING ON GRASS
MIXTURES AND FERTILIZING**

The aim of our study was to assess the botanic-farming composition of pasture grass stands and its yield depending on the composition of grass mixtures and fertilizer.

The studies were conducted in the laboratory field and meadow fodder production on experimental base Institute of Agriculture of Carpathian Region of NAAS by the method of Institute of Feeds of UAAS. Accounting of yield was carried out by plots. Yielding data were processed by method of dispersive analysis.

For data of our research the yield of legume-cereal grass stand was increased with rising number of components grasses and varied on average by four cycles of use with mineral fertilizer from 7,9 t/ha to 10,8 t/ha. Additional processing of vegetative plant by growth stimulator Ekostym helped raise of productivity all grass mixtures and ranged from 8,4 (cocksfoot, lotus, red clover, white clover) to 11,5 t/ha (cocksfoot, tall fescue, ryegrass, lotus, red clover, white clover) of dry weight.

Analyzing the results of research it is deduced that density of pasture grass stand grows in all grass mixtures and at the different variants of fertilizer in the second and third of use cycles, and in fourth it some goes down again. At the increase of species amount of cereal component also there was an increase of density of grass stand and it was appeared the most in six components grass mixture, where three types of cereal and leguminous grasses were united. The use of growth stimulator of Ekostym positively was influenced on density of grass stand in all variants.

For analysis of botanic-farming composition of grass mixtures we observed an increase of the percentage of cereal grasses with increase their species in grass mixture. Also increase the number of grasses was marked by use cycles. In the first cycle of use in 2014 there was high weediness grasses on all variants. Application of growth stimulator Ekostym have positive impact on reducing the weed infestation next of 2015, the third and fourth cycles of use.