NITROGEN MANURE USE IN AGRICULTURE OF UKRAINE AND THE EUROPEAN UNION

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ABSTRACT

It is established that currently the main component of organic fertilizers applied to the soil in Ukraine and the EU is manure of farm animals, which is more than 90%. It is substantiated that during 2011-2019 in Ukraine with manure introduced into the soil an average of 37.7% N / year of the total annual amount of N manure emitted by farm animals - an average of 359.2 thousand tons N / year. In the EU, 60.6% N / year is applied to the soil with manure on average.
Among the EU countries, the largest amount of N manure in the soil relative to the annual amount of N released from manure of farm animals in Hungary - 72%, Poland - 71 and Greece - 70%, the least - in Cyprus - 50%, in Luxembourg - 52 and Ireland - 54 %. There is no shortage of N manure for agricultural purposes in the EU. Among the EU countries in 2017 the most N was applied with organic fertilizers per 1 ha of sown area in the Netherlands - 286.1 kg N / ha, Ireland - 117.5 and Switzerland - 86.0 kg N / ha, the least in Latvia - 14 , 8 kg N / ha, Bulgaria - 15.1 and Slovakia - 20.0 kg N / ha. It should be noted that in Latvia, Bulgaria and Slovakia the annual level of N manure application in the soil relative to the annual amount of N released from manure of farm animals is only 56, 65 and 68%, respectively, ie preference is given to mineral fertilizers.Thus, in Ukraine since 2000 compared to EU countries there is a negative trend in the level of use of organic fertilizers in crop production and the presence of manure shortage in some regions, which is one of the reasons for declining soil humus and environmental by-products livestock farms.

Key words: nitrogen, manure, Ukraine, European Union, organic fertilizers, livestock farms