THE DYNAMICS OF SOIL MOISTURE AND THE CAPITALIZATION OF RAINFALL WATER BY MAIN FIELD CROPS ON A CLAYEY SOIL

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Abstract

The intensity of water uptake by plants depends, besides differences caused by species, crop kind, growing phases, the development of root and soil type, by agricultural practice. The present paper presents the dynamics of soil moisture in 2013-2014 agricultural years in relation with the technology that was applied with the following crops: wheat, corn, sunflower and pasture. After analyzing the evolution of soil moisture with the four crops, respectively 7 variants of soil moisture determination during 2014 year there could be observed soil moisture differences between applied technologies and between crops. For the analyzed area, respectively, on a levigated chernozem that was formed on clays, the capitalization of rainfall water is better by preparing the seedbed through plowing.

Key words: moisture, tillage, rainfall