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DYNAMICS OF ABSORPTION OF SOME BIOGENIC SALTS IN MODIFIED SALINE MEDIUM

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ABSTRACT

The measuring of Ca^{2+} , Mg^{2+} , K^+ has been carried out. This quantity determination had two purposes. It allows us, on the one hand, to show that the assimilation rate of the studied mineral elements and the synthesis of the dry matter are in relation with the composition of the plant organs. On the other hand, to analyse the Na⁺/ NH⁴⁺ antagonism in constantly keeping the concentration of each anion and cation. Within the adjusted saline water T1C, T2C, T3C changing the proportion of NH⁴⁺ from 15% to 25% in the total mineral nitrogen of the modified saline solution T1 mod, T2mod, T3, mod. At the level of the two studied species, tomato and bean, the K⁺ is very abundant with regard to the cations Ca^{2+} , Mg^{2+} , and Na⁺ probably due to the weak capacity of the cationic root exchange of these plants. The roots of the tomato plants are less loaded with Na⁺ than the aerial parts. However, the bean stores much more Na⁺ at the level of the roots, which migrate with difficulty to the aerial parts [2].

KEY WORDS: Salinity, arid areas, hydromineral need, measuring, sodium, potassium, magnesium, calcium, tomato

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