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AMINO ACIDS' IDENTIFICATION IN OPOPHYTUM FORSSKALII FLOWERS

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Introduction. *Opophytum* (syn. *Mesembryanthemum*) is a genus of *Aizoaceae* family the representatives of which are widely distributed in the Middle East. These are drought-tolerant plants which have traditionally been used both as ornamental and medicinal plants. The activities typical for the species of *Opophytum* genus include antibacterial, antifungal, antioxidant, anti-inflammatory, and they are extensively included into various cosmetic formulations as moisturizing agents. One of the plants of interest from this family is *Opophytum forsskalii* (syn. *Mesembryanthemum forsskalii*) which has shown moderate hypoglycaemic effect in rats. Thus, a profound phytochemical study of this plant is up-to-date.

Aim: identification of amino acids in *Opophytum forsskalii* flowers.

Materials and methods. The plant material was collected in Saudi Arabia, Al-Jouf region in 2016. The preliminary identification of amino acids was carried out using paper chromatography method (solvent system butanol-acetic acid-water (4:1:2), derivatization reagent - 0,1 % ninhydrin alcohol solution).

Results and discussion. The experiment allowed identifying 9 amino acids in *Opophytum forsskalii* flowers – proline, alanine, methionine, arginine, valine, aspartic acid, glutamic acid, histidine and leucine, four of which are essential - valine, leucine, methionine and arginine. The spots corresponding to amino acids were coloured into purple or pink-purple, except for proline which appeared as a yellow coloured spot.

Conclusions. The results obtained will be used in further analysis of *Opophytum forsskalii* flowers and might be used for the standardization of the plant material studied.