

## **DEVELOPMENT OF THE TECHNOLOGICAL PROPERTIES OF MOTHERWORT DRY EXTRACT FOR SOLID DOSAGE FORM**

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**Introduction.** The need to create a medicine based on medicinal plant raw materials for non-hormonal therapy of pre- and post-menopausal syndrome is a small amount of medicines on the Ukrainian pharmaceutical market that have non-hormonal activity and simultaneously have a wide spectrum of action on menopausal syndrome. The modern therapy of menopause includes such elements as: medicines of hormone replacement therapy (HRT); antidepressants; soft sedatives. Motherwort includes flavonol glycosides, mainly rutin, essential oil (traces), saponins, alkaloid stachydrin, tannins, carotene. Medicines based on motherwort are used when nervousness, cardiosclerosis, insomnia, neurasthenia, depression, and venous vascular dystonia, which can result from hormonal imbalance. The present indications for use give the basis to apply dry extract of the motherwort in the development of the dosage form for the complex therapy of climacteric syndrome.

**Aim.** The aim of the work is to study the powder of the motherwort dry extract, namely, to determine its technological properties, as a promising raw material in the development of solid dosage forms.

**Materials and methods.** Motherwort dry extract was investigated according to the following technological properties: crystallographic properties, fractional composition, bulk density, flowability, angle of natural slope, moisture content.

For this purpose, the following devices and accessories were used: the “Konus Academy” microscope equipped with the Scope Photo camera programme, the PHARMA TEST (Germany) device for vibration compaction of powders TD, the vibration analyzer for readout of the characteristics of bulk materials VP 12A (MZTO, Ukraine), the sighting ruler and the scale, the device for determining moisture MA 150 by “Sartorius”, State Pharmacopoeia of Ukraine 2<sup>nd</sup> ed.

**Results and discussion.** The obtained results showed that the motherwort dry extract complies with SPU requirements for all the claimed technological parameters.

**Conclusions** On the basis of the findings it can be concluded that the motherwort dry extract is a promising medicinal plant raw material for the development of solid dosage forms that would be used in menopausal syndrome treatment.