



CHEMICAL COMPOSITION AND MEDICINAL PROPERTIES OF THE MEDICINAL DANDELION AND SARSABIL PLANTS.

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Abstract: *Medicinal products made from plant raw materials have several advantages compared to synthetic drugs, they are less likely to cause allergic reactions, they are more effective and safer, they have a wide therapeutic effect, they contain many microelements, for example, in the composition of chamomile: copper, manganese, chromium, cobalt, and in the composition of some chamomile containing phosphorus, it was found that ascorbic acid is stored in a record amount for plants. 300-650 mg of chamomile leaves are useful due to their richness in the following substances: carotenoids, triterpene alcohols, the results of group B methodology showed that local medicinal chamomile contains flavin pigments, aglycone, flavonoid, free aromatic OH-groups, triterpene saponins.*

Key words: *Medicinal chamomile, raw materials, aglycones, flavonoids, Sakolsky reaction, sarsabil plant, anti-inflammatory, diuretic, vitamins, biologically active substances.*

Introduction: The study of biologically active substances in the composition of medicinal chamomile and its use as a raw material, due to the presence of bitterness in its root, it stimulates the secretion of gastric and intestinal glands and increases appetite. Therefore, it belongs to the group of digestive and appetite suppressants. The main phytomass of plants is its above-ground part. It is known from the research of foreign scientists that the above-ground part of medicinal chamomile has anti-inflammatory, diuretic properties.

Sarsabil has been widely used in medicine in the Mediterranean region since ancient times. It grows in Samarkand, Bukhara, Fergana and Tashkent regions of Uzbekistan. As a result of pharmacological and toxicological studies, phytopreparations of plant products have been found to have a wide range of therapeutic properties in the treatment of tachycardia and heart diseases, which boosts the immunity of liverwort. Coumarin and saponin, found in many plants, are present in sarsabil, and asparagine in the roots of the plant was first isolated from medicinal sarsabil. They have a positive effect on the human body. Sarsabil extracts in capsules, tablets and other forms of domestic and foreign manufacturers are freely available along with other herbal supplements with biologically active components.



The instructions for them recommend the use of sarsabil drugs as an adaptogen, immunomodulator, diuretic, tonic and cleansing agent.

The aim and objectives of the research are to study the chemical composition of medicinal chamomile and use its biologically active substances in medical practice, to achieve the set goals, the following tasks must be performed:

1. To study the etymology and botanical structure of medicinal chamomile.
2. To study the chemical composition of the surface part of medicinal chamomile.
3. To study the methodology of quality analysis of medicated cream.
4. To study the quality reaction of medicated strawberry cream.

The name "Taraxacum" of the strawberry is related to the history of its origin, this word first appears in the works of scientists Fuchs and Gesner who lived in the 16th century. "Taraxacum" means "medicine against disease" in Greek. In addition, in some sources the word is also used in the sense of "soothing". Latin taraxacum is a perennial plant with a height of 5 - 50 cm, a thick vertical root, 10 - 30 cm, leaves can be light green to dark green, length 10 - 25, width 1.5 - 5 cm, flowers 5 - 40 in length, the surface is covered with a spider-like cap. the inflorescence forms a basket of 140 - 400 yellow flowers in three parts. Fruits are 3-4 pods, white, 6-8 mm long.

Chemical composition: The leaves and roots of medicinal chamomile contain many trace elements necessary for the body: copper, manganese, chromium, cobalt, phosphorus, boron. Some species contain a record amount of ascorbic acid for plants - from 300 to 650 mg. Dandelion flower is rich in the following substances: carotenes, triterpene alcohols, B group vitamins, inulin oils, lutein.

Experimental part: Medicinal chamomile herb is taken as an object of research. Medicinal chamomile raw samples are collected during the period from May to September, and the processes are:

1. The slanide reaction is carried out to determine the presence of flavonoids released from the herb of medicinal chamomile. 5 drops of concentrated hydrochloric acid and 10 - 15 mg of zinc are added to 1 - 2 ml of the studied substance. Raspberry coloration is observed, which indicates the presence of flavylum pigments.

2. Cyanide reaction according to Brilliant, clean water is added to the solution obtained in the first reaction in a dilution ratio of 1:1, then butanol is added. In the presence of aglycone flavonides, the raspberry color shifts to the upper phase. In the presence of glycosides, the lower inorganic layer is stained.

3. Qualitative reaction for the determination of flavonoids is the reaction of medicinal chamomile with aluminum chloride. 1 - 2 ml of an alcoholic solution of aluminum chloride is added to 1 - 2 ml of material obtained from the herb of medicinal chamomile. In the presence of flavonoids, we can see a yellow coloration.

4. Qualitative reaction to triterpene saponins, Salkowski's reaction, wipe the dry residue with a little chloroform and add concentrated sulfuric acid, the solution turns yellow to red.

End of work and the conclusion part:



1. The etymology and botanical definition of medicinal chamomile was studied
2. The chemical composition of medicinal chamomile was studied.
3. Methodology of quality analysis of medicinal chamomile (herb) was studied.
4. A quality reaction was carried out on medicinal chamomile herb.

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