

ECONOMIC AND BIOLOGICAL SIGNIFICANCE OF MEDICINAL PLANTS GROWING IN THE DESERTS OF UZBEKISTAN

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Abstract. *The article presents information about the features of some medicinal plants growing in Uzbekistan, in particular about the yellow Hyacinth plant (*Iris pseudacorus*), its chemical composition, medicinal properties, and use in viral diseases of poultry.*

Keywords: *medicinal plant, raw materials, Hyacinth, Iris pseudacorus, pharmaceuticals, infection, juice, Hyacinth, stone, essential oil, soothing, analgesic, hypnotic, heart, vascular system, central nervous system, trigger, blood pressure.*

It is known that approximately 50-60% of drugs produced by the pharmaceutical industry worldwide are made from raw materials of medicinal plants. The rapid development of the pharmaceutical industry in the Republic of Uzbekistan is causing a sharp increase in the demand for raw materials of medicinal plants. It should be noted that due to the limited number of medicinal plants that grow naturally in our republic, the demand of the pharmaceutical industry for raw materials of medicinal plants can be met mainly by growing medicinal plants. However, the technology of growing medicinal plants requires knowledge of certain agronomic and agrochemical, biological, ecological, botanical, and general methodological rules. At present, medicinal plants are grown in specialized farms of our country, farmers, foresters, peasants and other types of ownership.

The extreme continentality of the climate (weather) conditions and the differences in soil conditions and many other factors require a combination of theoretical and practical knowledge in the development of medicinal plant breeding technology. The urgent task facing the network of farms growing medicinal plants in Uzbekistan is to increase the weight of the crop obtained from each hectare of land and improve its quality. Advanced experience and scientific achievements are of great importance in solving these tasks. Also, the increase in the efficiency of the cultivation of medicinal plants is directly related to the agrotechnics of cultivation of medicinal plants and protection from harmful organisms.

Medicinal plants - plants used for the treatment of humans and animals, for the prevention of diseases, as well as in the food, perfumery and cosmetic industries - herbs. It has been determined that there are 10-12 thousand species of medicinal plants on earth. The chemical and pharmacological properties of more than 1000 plant species have been investigated. There are more than 700 species of medicinal plants in Uzbekistan. Of these, about 120 species of plants grown in natural conditions and cultivated are used in scientific and folk medicine. Currently, about 40-47% of medicines used in medicine are obtained from raw plant materials. Plants are living natural chemical laboratories with complex structures and the ability to create complex organic substances or compounds from simple inorganic substances. Dried herbs, shoots, roots,

rhizomes, nodules, bulbs, bark, leaves, flowers, buds, fruits (seeds), seeds, juice, paste, essential oil, etc. of medicinal plants are used as medicine.

Two different classifications of medicinal plants are accepted: 1) depending on the composition of active substances - alkaloidal, glycoside, essential oil, vitamin, etc. 2) depending on its pharmacological properties - sedative, pain reliever, hypnotic, affecting the heart and blood-vascular system, stimulating the central nervous system, lowering blood pressure, etc. Uzbekistan is considered a natural and geographically rich region of medicinal plants, and about 1,200 of the 4,500 species of tall plants naturally present in the republic have medicinal properties. In our article, we provide information about some medicinal plants that grow in the desert regions of our republic.

In a large part of sandy deserts, there are plants growing in the sand: there are many trees of the white saxophone (sometimes reaching 6-7 meters in height), large juzgun. Sand acacia from the bushes, wormwood, ivy, and sedum from the bushes are very common. Among the grasses here, there are many sedges, tulips, gorse, *Iris pseudacorus*, cornflowers, and sedges.

Yellow safflower (*Iris pseudacorus*) is a medicinal, dyeing, honey-juice plant widely used in tanning skins. The rhizome contains essential oil, glycosides, additives, organic acids. In folk medicine, it is used for inflammation of the lungs, inflammation of the spleen, tonsils, women's gynecological diseases, wound and purulent wounds, freckle removal, inflammation of the gums, relief of toothache and tonic. It is also widely used in the perfumery industry. Its freshly collected rhizome is used in folk medicine and homeopathy. The rhizome of *Iris pseudacorus* is part of Zdrenko's collection (pharmacological collection method) and is used for bladder diseases, stomach ulcer and inflammation.

Yellow cauliflower leaves contain from 80-90 milligrams to 140 milligrams of vitamin C. The composition of the flower contains additives, pyrogallol and violaxanthin. In folk medicine, a decoction of the rhizome is used as an astringent, tonic, anti-inflammatory, diuretic. There is also information about the possibility of treating epilepsy. It is used to relieve headaches, toothaches, as a laxative, in acute respiratory infections, in diathesis, and to improve hair growth.

In addition, there is information about the possibility of use in cases of inflammation of the oral cavity. The crushed powder of the rhizome is part of the medicine.

Steaming yellow cauliflower leaves and using them as a compress is also useful for rectal ulcers. According to M. Kozirenko and others, the above-ground part of yellow cauliflower is used as a raw material for obtaining biologically active substances against viruses. Its rhizome is widely used in Bulgaria for the treatment of diabetes, in the perfumery industry it is used to obtain high-quality perfumery products, toothpaste and powder. The rhizome, leaves, and flowers show activity against bacteria, are used to tan skins, dye leather, woolen fabrics, and paper yellow. Its seeds are used as a coffee substitute. In addition, it has been noted that the rhizome and flower can be somewhat poisonous when not dried.

According to Abu Ali ibn Sina, the rhizome of yellow cauliflower, dried in the shade, removes freckles and pimples, its decoction removes swellings, glands, rashes, improves sleep, is beneficial for headaches, heals purulent wounds, relieves pain. It is used in the treatment of cough and respiratory diseases, pain relief in liver and spleen diseases, and fever reduction.

To do this, mix 2-4 tablespoons of juice from the crushed rhizome in 700 grams of whey and drink 100 ml several times a day. A spoonful of dried rhizomes is added to 0.5 liters of white wine to make tincture, or 15-30 grams of rhizomes are infused in 150 grams of boiled water and

drunk 1-2 spoons 3 times a day. In general, medicinal plants are of great biological and economic importance.

In order to study its economic value, it was used as a mixture with different medicinal plants in poultry.

The following results were obtained from our scientific observations and experiments with poultry: if it is mixed with poultry feed in late autumn and early spring, it increases their resistance to various diseases;

when added with chamomile (chamomile) branches, increased activity in poultry; led to a mild recovery of ultraviral disease (plague, respiratory tract disease) in poultry.

This led to a decrease in the number of deaths among poultry, especially chicks, and eliminated economic damage.

In general, medicinal plants are of great biological and economic importance.

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