UDC 631.527.635:652.23

BREEDING IMPORTANT QUANTATIVE TRAITS THAT PROVIDE PERFOMANCE IN GARDEN PEA *(PISUM SATIVUM L.)*

V.M. Strygun

Nizhyn agrotechnical institute

In the creation of new varieties garden Pea important starting material, which is global collection of local and zoned varieties mutant forms. This material can be a source of individual characteristics, and their various combinations. The efficiency of the source material in breeding work is derived from the study of its agronomic morphological traits, breeding and genetic and physiological and biochemical characteristics. Important in this respect are the features that directly or indirectly provide plant productivity (stems and internodes length, type of stem, leaf shape, number of generative units, etc.).

One of the obstacles to obtaining high yields garden Pea stalk lodging is in the phase of biological maturity. The level of losses depends on the length, type and design of the stem of the leaf. In our studies, the greatest losses suffered tall varieties with Indeterminate type stem. Generative organs such varieties are at the top of the plant, which contributes lodging due to excessive weight. In determinant forms pea stem lie down though, but the beans were on the surface, and this reduced crop losses during harvesting.

For different types of stem leaf shape is important. Thus, the combination of selection determined the shape of the stem of the leaf form the baleen, we have obtained hybrid material with high resistance to lodging. Generative of such plants put to the top of the stem, ensuring friendliness ripening green peas and seed maturation.

Trunk shape with acacia similar or conventional type of leaf were overloaded Puff weight quickly and intensively lie down ill from diseases. Therefore, for such forms a promising combination shtambovyh type stems from mustached type of leaf.

An important breeding grounds that affecting on lodging resistance of plants is the length of internodes. Most suitable for high-yield varieties have short internodes (3-6 cm).

Based on the structural analysis of collection samples were established correlations between traits that provide plant productivity. A strong direct correlation between the length of the stem is marked and the length of the stem to the first node productive. In addition, the performance provides Indeterminate short or shortened internodes stem, leaf type doubles feathery, narrow long beans with 10-12 seeds, 2-3 and more beans on fruits, plants with a blunt tip bean, with a share of mechanical vascular tissue, which is from 74 to 95%. The level of overall plant productivity was most correlated with the number of productive units ($r = 0,79$), the number of beans ($r = 0,83$) and number of seeds per plant ($r = 0,92$).

In the studied collection was selected varieties with optimum number of productive (generative) nodes. Varieties belong to different maturity groups.

For further breeding varieties were identified source of each of the studied traits.