МОРФОБИОЛОГИЧЕСКИЙ СТАТУС СОРТОВ ХЛОПКА СУЛТАН ДО ДЕФОЛИАЦИИ В ЗАОЛЕНЕННОЙ ЗОНЕ

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MORPHOBIOLOGICAL STATUS OF SULTAN COTTON VARIETIES BEFORE DEFOLIATION IN SALINE AREA

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Abstract: Effect of salts in the soil on the growth and development of Sultan cotton cultivar grown in weak, moderately saline and non-saline soils of Andijan region.

Аннотация: Влияние солей в почве на рост и развитие хлопчатника сорта Султан, выращиваемого на слабых, умеренно засоленных и незасоленных почвах Андижанской области.

Ключевые слова: зона слабого засоления, зона среднего засоления, сорт хлопчатника Султан, количество листьев, количество коробочек.

Key words: Weak salinity area, medium salinity area, Sultan cotton variety, number of leaves, number of bolls.

In the conducted research, the biological condition of cotton was determined based on the instructions before cotton defoliation. Determination of the biological condition of the cotton before defoliation is one of the main factors in studying the effectiveness of the applied defoliants. In this regard, the biological condition of cotton was studied before defoliation. The data obtained on the

determination of the biological condition of cotton before defoliation were analyzed based on the data of 2019.

According to this, in the conditions of weakly saline soils of Andijan region, the medium-fiber cotton variety "Sultan" was grown and defoliated during the period when the bolls were 45-50% open. ,1-32.4 pieces, the number of cysts was 8.1-9.2 pieces, of which 45.3-47.0% were opened and half-opened were 2.3-3.7%.

According to the results of the research carried out in the non-saline area, in the background where cotton bolls are planned to be defoliated in the period of 45-50% opening, the average height of the plant is 93.3-96.6 cm, the number of leaves on the bush is 33.0-34.1 pieces, the total number of bolls is 8 It was noted in the observations that the number of opened cysts was 45.8-48.2% and the half-opened cysts were 2.3-4.4% in accordance with the program period, which was 6-9.8 pieces.

The Sultan cotton variety is planted in an area with medium salinity and defoliation is planned when the bolls are 45-50% open. It was 7-8.1 units, including those that were opened by 44.9-47.6% and half-opened by 2.3-3.9%, and the degree of opening of cysts according to the program was appropriate.

Taking into account that the morphobiological condition of the mediumfiber Sultan cotton variety grown in fields with different salinities before defoliation also has its influence, the morphobiological condition of cotton with returns was determined in all options.

According to the results of the phenological observation carried out in fields with different levels of salinity, in 2017-2019, the height of the cotton head stem in the "non-salted" field before defoliation in the Sultan cotton variety was 99.2-91.1-95.2 cm on average, in proportion to the years of the study, the number of leaves 29.6-35.2-33.6 pieces, the number of stitches is 9.5-10.5-9.3 pieces, the same among them, 46.2-47.3-47.0% were opened, half-opened were 4.6-5.0-3.6%. In the "weakly saline" field, the height of the cotton head stalk is 95.3-90.8-92.9 cm on average, the number of leaves is 24.1-29.4-31.3, the number of bolls is 9.0-8

,3-8.7 pieces, including 45.8-50.0-46.1% of opened ones, 0.5-3.2-3.1% of half-opened ones.

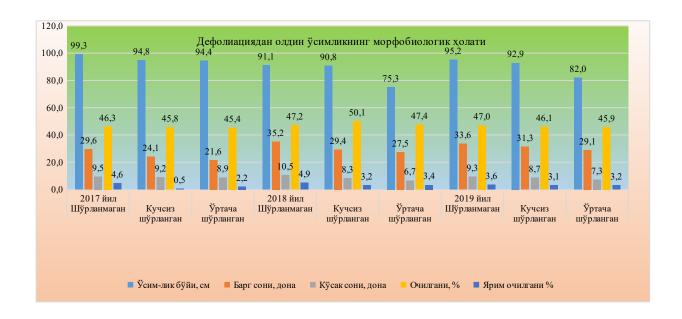


Figure 1. of Sultan cotton variety before defoliation morphobiological status

In the "medium salinity" area, the height of the cotton head stem is 94.7-75.3-82.0 cm on average, the number of leaves is 21.6-27.5-29.1, the number of bolls is 8.9-6, 9-7.3 pieces, including 45.5-46.5-45.9% of opened ones, 4.0-3.6-3.2% of half-opened ones.

According to the analyzes obtained from the saline areas, the height of the head stem in the Sultan cotton variety grown in the non-saline area is 3.9-0.3-2.3 and 4.5-15.8-13.2 compared to the cotton variety grown in the weak and moderately saline areas. cm, the number of leaves is 5.5-5.8-2.3 and 8.0-7.7-4.5, the number of pods is 0.5-2.2-0.6 and 0.6-3, 6-2.0 units, it was observed that it was higher. According to the years 2017-2019, in the area with weak salinity, the opening of pores was 0.4-0.9% less than in the area without salinity, and in 2018, the opening of pores was 2.7% higher than in the area without salinity, in the area with moderate salinity, corresponding to the years 2017-2019 It was found in the experiment that the opening of the bolls was 0.7-0.8-1.1% less than the cotton grown under optimal conditions.

In summary, due to the effect of salts in the soil on the formation of plant height, crop branches, and generative organs, the length of the cotton plant grown in medium salinity areas is 13.2 cm higher than the height of the cotton plant grown under optimal conditions, the number of leaves is 4.5 pieces, and the number of bolls is 13.2 cm. It was found in our experiments that it is formed less than 1-2 pieces.

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