UDC 635.11:635.132:635.142:631.527:631.52.0

RESPONSE OF VARIETIES OF TABLE BEET TO THE ACTION OF MUTAGEN

I. Rempel, postgraduate student S. Kornienko, Candidate of Agricultural Sciences T. Gorova, Doctor of Agricultural Sciences Institute of Vegetables and melon growing NAAS

The above reaction of varieties and characteristics of mutant offspring resulting from seed treatment nitrozoetylsechovynoyu.

Beet, nitrozoetylsechovyna, mutagenesis, productivity, typicality, chemical composition.

A three-year study showed that for seed treatment before sowing 3 mg/l nitrozoetylsechovynoyu within 18 hours. increased yield and chemical composition of roots offspring M1. Action ripening varieties for yield did not respond to the action of NES. Another reaction of this sort was typical for the release of roots, whose number is compared to medium and late varieties Crimson and welcomed decreased. Bordeaux Kharkov increased in offspring M1 Quality typical roots. For breeding practices is an important positive effect on the NES content of chemical components in the offspring M1 roots, enabling acceleration-dig the creation of new genotypes for the content of nutrients.

About phenotypic changes observed in the offspring of M2 plants AI until arch-tectonics bush, his biometric performance and yield of seeds. All accessions treated NES, there was an increase in the output-Haymarket per plant about 4 g. It was also noted snake height standing bush and increase its diameter, which was Cano change in the architectonics of almost all of the samples except Vital varieties, which had a branch type IV, while all the rest - III type of branching, while control samples (water treatment) and have the type of branching bush.

Biochemical analysis of samples showed that the treatment affected the NPG chemical composition varieties. It was observed increase in the dryve are in the roots

of all the samples Bordeaux Kharkov 0.71%, Action - 0.39 Crimson - 3.72, Vital - 0.73% (Table. 3).

In Bordeaux varieties Kharkov and seed treatment NES action to influence the content of total sugar, which increased by 0.35 and 2.35%, respectively, and the varieties Crimson and Vital decreased by 0.37 and 0.16%.

Decrease in the yield of roots uterine typical phenotypic changes indicative of plant mutation, which is a positive result for selection.

References

 Бондаренко Г. Л. Методика дослідної справи в овочівництві і баштанництві / Г. Л. Бондаренко, К. І. Яковенко. – Х. : Основа, 2001. – 369 с.

2. Сучасні методи селекції овочевих і баштанних культур / За ред. Т. К. Горової, К. І. Яковенка. – Х., 2001. – 432 с.

 Химические супермутагены в селекции / За ред. С. Л. Зимонт. – М. : Наука, 1975. – 207 с.

4. Химический мутагенез в повишении продуктивности сельскохозяйственных растений / За ред. Н. Н. Зоз. – М. : Наука, 1975. – 308 с.

 Шкварников П. К. Експерементальний мутагенез і селекція рослин / П. К. Шкварников, С. П. Моргун, М. К. Коваленко // Експериментальні мутації та селекція рослин. – К. : Наукова думка, 1971. – 246 с.