

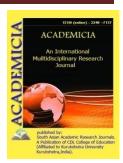
ISSN: 2249-7137 Vol. 11, Issue 4, April 2021 Impact Factor: SJIF 2021 = 7.492



ACADEMICIA

An International Multidisciplinary Research Journal

(Double Blind Refereed & Peer Reviewed Journal)



DOI: 10.5958/2249-7137.2021.01071.5

"TECHNOLOGY OF USING A NEW DEVICE THAT SOFTENS THE CRUST"

Juraev Azamat Jalil ugli*; Farmonov Nozimjon Qosimovich**; Ibodov Islom Nizamiy ugli***; Najimov Dilshodbek Kuvonch ugli****

*A student of agricultural mechanization, Bukhara branch of the Tashkent Institute of Irrigation and, Agricultural Mechanization Engineers, UZBEKISTAN

**A student of agricultural mechanization, Bukhara branch of the Tashkent Institute of Irrigation and, Agricultural Mechanization Engineers, UZBEKISTAN

***A student of agricultural mechanization, Bukhara branch of the Tashkent Institute of Irrigation and, Agricultural Mechanization Engineers, UZBEKISTAN

****A student of agricultural mechanization, Bukhara branch of the Tashkent Institute of Irrigation and, Agricultural Mechanization Engineers, UZBEKISTAN

ABSTRACT

This article focuses on the use of equipment used in the field of agricultural mechanization, especially in the initial processing between rows. The tanch (3) wheel provides balance by protecting the frame from the vibrations that give rise to the resistance forces generated by the working bodies. We use a trail (4) traction so that the quality of processing is high during the next growing season without losing the row.

KEYWORDS: Device frame, base wheels, rail, working grilles and 2 series-mounted customized rollers for tillage.



ISSN: 2249-7137 Vol. 11, Issue 4, April 2021 Impact Factor: SJIF 2021 = 7.492

INTRODUCTION

The onset of heavy rains of the year turns the soil into a muddy chaff, making it difficult for the seeds to germinate, making replanting possible. In order to overcome this difficulty, ration motigo (ROR) is used. [M.Shoumarova, T.Abdillaev.IIbob.176 page]

The main disadvantage of this ration motigo is that it does not produce complete crushing when processing between rows. As a result, not being able to achieve full seedlings reduces yields.

Given that the seeds are sown at a depth of 5–7 cm, the required heat, humidity, germination in the air environment is ensured, the successive rains and high sunlight spoil this environment. In the conditions of Bukhara region, the optimal time for sowing seeds is the first 15 days of April. It is at this time that there is a lot of rainfall, and the effect of sunlight on the ground is the same, ie heating to 30-35 degrees, which causes problems in agriculture.

The purpose of the utility model is to solve the above problems. To do this, we take the existing seeder SChX-4 compacting wheels (rollers) and use it as a working body. We put 2 different shaped teeth on the wheels and install them on the grills in series. The compacting wheels now loosen the soil, which has been turned into cotton, one by one, creating an environment for the seeds to germinate.

The problem is solved by mounting 2 adapted wheels on 4 grids mounted on the main frame of the device and moving it along the rows on a mowing tractor.

Getting the desired harvest will lead to comprehensive economic growth.

In an effort to find a solution to this problem, we embarked on an honorable task, such as creating a device to protect the cotton field from rot.

The working body of the rotary motor is broken by the fact that its star-shaped blade is combined with disks consisting of sharp-toothed teeth and the formed cossettes move into the ground.

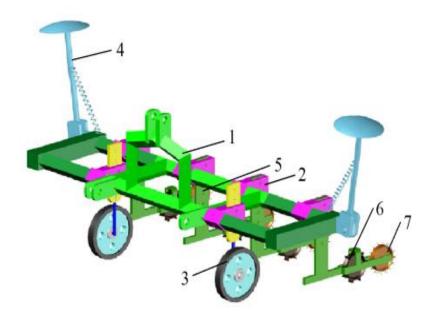
In the proposed device, the purpose is to break the fold. The roller in the first row breaks the crust, the roller in the second row serves to grind the lumps and compact the soil. As a result of the softening of the lumps that fall into the roller, the mud crumbles and a fine soil is formed.

The function of the proposed utility model is that the conversion of soil prepared for planting in the rainy season of the year into muddy cotton not only causes problems with seed germination, but also causes seed rot.

In this case, the task of creating a favorable environment for the germination of seeds, the formation of betalofot full seedling area is assigned to the proposed device.



ISSN: 2249-7137

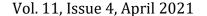


The device, which protects the cotton field from hardening, is aggregated to the mowing tractor. The main (1) frame is mounted on it by means of a fastener (2) of all details made by integral welding. The tanch (3) wheel provides balance by protecting the frame from the vibrations that give rise to the resistance forces generated by the working bodies. We use a trail (4) traction so that the quality of processing is high during the next growing season without losing the row. The tillage working bodies (5) are attached to the pole. The sharp-toothed roller (6) and the spring-loaded (7) plate welded roller do the main job, ie they grind the soil and create a favorable environment for seed germination.

The device, which protects the cotton field from hardening, is aggregated on a mowing tractor, such as TTZ-80, MTZ-80. The tractor power that pulls the device should not be less than 80-100 horsepower. The main (1) frame is made by integral welding, all details are mounted on it by means of fasteners (2). The support (3) wheel provides balance by protecting the working forces from the vibrations transmitted to the frame by the resistance forces generated. In order not to lose the row, we use the cultivator (4) to ensure high quality of processing in the next growing season. The tillage working bodies (5) are attached to the pole.

The sharp-toothed roller (6) and the spring-loaded (7) plate welded roller do the main job, ie they grind the soil and create a favorable environment for seed germination. When assembling the device, it is advisable to adjust the parallelism of the working rollers in the horizontal plane.

The device, which protects the cotton from the husk, is equipped with a main frame, support wheels, a column, a harrow and a series of mounted tillage working bodies, which is distinguished by a flat plate roller that crushes the husk.



Impact Factor: SJIF 2021 = 7.492



ISSN: 2249-7137

CONCLUSION

Following the above recommendations, we should follow the following.

- 1. It is necessary to determine the number of hectares of cotton fields in the region and to determine how many devices are needed for processing during the cultivation period.
- 2. We need to put into practice that this device, which is created when we organize planting on the basis of agro-technical requirements, is effective in cotton growing, the first prototypes of the device are used in advanced farms of our region.
- 3. Introduction of this device in the existing clusters and farms in the region in this way we use advanced technology in agriculture.

Our task now is to get a certificate from the Intellectual Property Agency, to develop a lot with the support of the Ministry of Innovation Development and to contribute to the well-being of our people, easing the burden on farmers.

REFERENCES:

- **1.** Decree of the President of the Republic of Uzbekistan "ON MEASURES TO IMPROVE THE SYSTEM OF PUBLIC ADMINISTRATION IN THE AGRICULTURE." 2019.17.04.
- **2.** Murodov M.M., Baymetov R.I., Bibutov N.S. Mehaniko-tehnologicheskie osnovy i parametry orudiy dlya razuplotneniya pochvy. Tashkent, "Fan", 1988, -100b.



ISSN: 2249-7137 Vol. 11, Issue 4, April 2021 Impact Factor: SJIF 2021 = 7.492

3. GOST 20915-2011 Ispytaniya selskoxozyaystvennoy technical. Methods of determining the conditions of examination - M .: Standartinform, 2013. 34 p.

- **4.** Z.A.Artukmetov, H.Sh. Sheraliev. Basics of crop irrigation. MilliyNational Society of Philosophers of Uzbekistan. T. 2007 y. Textbook for university students. 312 b.
- **5.** Dospexov B.A. Methodology of field opyta. Moscow: Kolos, 1979. 416 p.