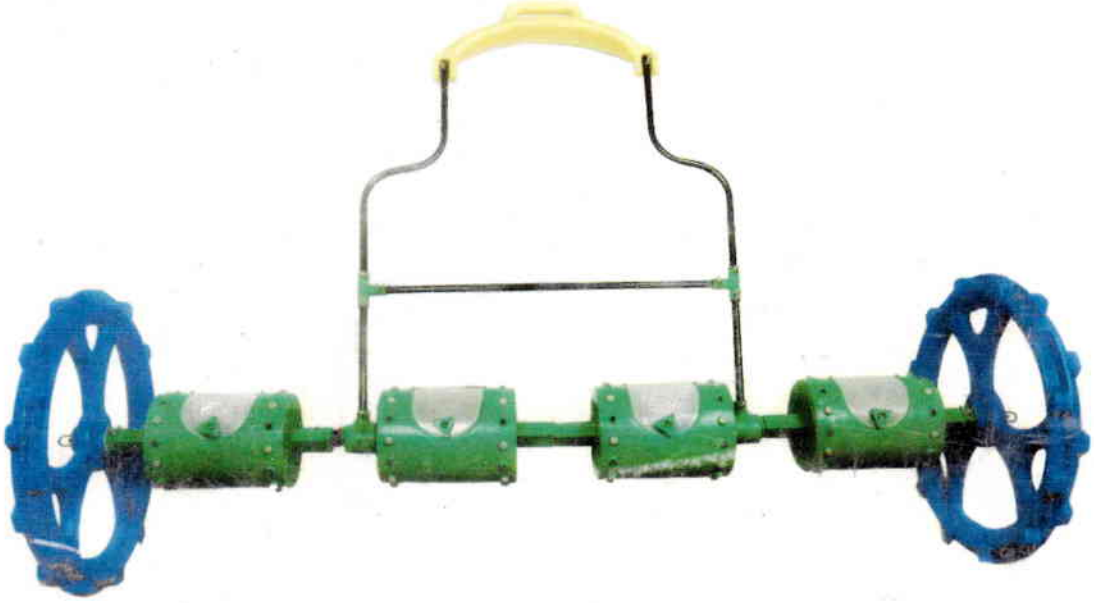


व्यावसायिक परीक्षण रिपोर्ट
COMMERCIAL TEST REPORT

संख्या / No. : Imp. 115/162
माह / Month : September, 2012



BANABETHI DRUM SEEDER



भारत सरकार
GOVT OF INDIA

कृषि मन्त्रालय
MINISTRY OF AGRICULTURE

कृषि एवं सहकारिता विभाग
DEPARTMENT OF AGRICULTURE AND COOPERATION

उत्तर पूर्वी क्षेत्र कृषि यंत्र प्रशिक्षण एवं परीक्षण संस्थान
NORTH EASTERN REGION FARM MACHINERY TRAINING & TESTING INSTITUTE

विश्वनाथ चारिआलि, जिला-शोणितपुर (असम)
BISWANATH CHARIALI :: SONITPUR :: ASSAM, PIN - 784 176

Website: <http://nerfmtti.dacnet.nic.in>

Ph. No. 03715-222094

Fax No: 03715-230358

E-Mail: fmti-ner@nic.in

4. SPECIFICATIONS

4.1 General:

Manufacturer	:	M/s Banabethi, 63/4, Nabalia Para Road, Behala Chowrastha, Kolkata, West Bengal- 700 008
Name of machine	:	Banabethi Drum Seeder
Type	:	Manually Operated
Make	:	BANABETHI
Model	:	N. A.
Serial No.	:	N. A.
Year of manufacture	:	N. A.
Utility	:	For direct wet-seeding of Rice
Source of power	:	Manual

4.2 Brief description of the machine

The Banabethi Drum Seeder mainly consists of drum, drum seeder shaft, drive wheel etc. The drum is made of plastic sheet in cylindrical shape of diameter 181.5 mm. Two square shaped plastic pipe of length 74 mm and inner diameter 27 mm x 27 mm are provided on each side of the drum through which the drum seeder shaft passes. The drum seeder shaft is driven through drive wheels. Thus, the motion of the drive wheel via, drum seeder shaft causes the drum to rotate. There are two rows of orifices in each drum with 14 numbers of seed metering orifices of 9.0 mm diameter on each row at equal distance of 40.0 mm from each other. When drum rotates, the seeds are fallen through these orifices. The drum seeder shaft is fitted with the frame and at the front of the frame handle grip is provided to pull the drum seeder.

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7.4 Service and maintenance

Tightening of all nuts and bolts and checking of seed gate way locks were required regularly.

8. EASE OF OPEARTION AND ADJUSTMENTS

8.1 No difficulty was observed in operation and maintenance of the machine. However, the operator* can pull the Drum Seeder maximum for 30-45 minutes continuously.

9. DEFECTS, BREAKDOWNS AND REPAIRS

9.1 Breakdown of Tee joint attached to the tie rod for handle was observed in the machine after 16.75hours of field operation.

10. COMMENTS AND RECOMMENDATIONS

10.1 Necessary modifications need to be done to avoid opening of seed gateway lock of the drum during operation.

10.2 It is recommended that the drum seeder may be provided with an identification plate having details like name of manufacturer or trade name, model, serial number of machine, year of manufacturer, type, size and mass, etc. The plate should be riveted on a non-wearing part of the machine.

10.3 Frequent loosening of lock nut of Drum Seeder Shaft provided at both the ends was observed. Necessary modifications need to be done to avoid the same.

10.4 Necessary tools may be supplied with the drum seeder to attend the adjustments and repairs.



* **Operator:** The operator bears good health and weight as per BMI i.e., Body mass (kg)- 78, Height (cm)-175 and Age(years)- 40.

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11. APPLICANT'S COMMENTS

Para No.	Our Reference	Applicant's Comments
11.1	9.1	We shall take care about the durability of the Tee joint of our Drum Seeder Machine in future though we maintain the product quality in all parts of the said machine.

TESTING AUTHORITY

SANJAY KUMAR AGRICULTURAL ENGINEER	
M.K. VISHWAKARMA DIRECTOR	

Test conducted and report compiled by- P.C. Dihingia, S.T.A.