# व्यावसायिक परीक्षण रिपोर्ट (प्रारंभिक) COMMERCIAL TEST REPORT (INITIAL)

संख्या /No: IMP-529/1109 माह/Month: January, 2020 Validity: 31.12.2026



# KHAN ENGINEERING WORKS KE 8 SCFD SEED CUM FERTILIZER DRILL (Tractor Mounted)



भारत सरकार

#### **Government of India**

कृषि एवं किसान कल्याण मंत्रालय Ministry of Agriculture and Farmers Welfare कृषि , सहकारिता एवं किसान कल्याण विभाग

Department of Agriculture, Cooperation and Farmers Welfare दक्षिणी क्षेत्र कृषि मशीनरी प्रशिक्षण एवं परीक्षण संस्थान Southern Region Farm Machinery Training and Testing Institute ट्रैक्टर नगर, गार्लदिन्ने-515 731, जिला: अनंतपुर (आं. प्र.)

Tractor Nagar, Garladinne-515 731, District: Anantapur (A.P.)

[An ISO 9001:2015 CERTIFIED INSTITUTE]

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COMMERCIAL (ICT)

Manufacturer : M/s. Khan Engineering Works,

Door No. 5/105, Near water tank, Main Road,

Chippagiri-518 396, Kurnool Dist.,

Andhra Pradesh, India.

Applicant : The Manufacturer

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#### **Government of India**

Ministry of Agriculture and Farmers Welfare Department of Agriculture, Cooperation and Farmers Welfare Southern Region Farm Machinery Training and Testing Institute Tractor Nagar, Garladinne-515 731, District: Anantapur (A.P.) [An ISO 9001:2015 CERTIFIED INSTITUTE]

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COMMERCIAL (ICT)

d) Size	Not Provided	Does not
		conform
e) Type of seeds(suitability)	Provided	Conforms
f) Mass	Not Provided	Does not
		conform

#### 11. COMMENTS & RECOMMENDATIONS

- 11.1 The three point linkage system of the seed cum fertilizer drill does not conform to IS 4468 (Part 1):1997. This should be looked into.
- 11.2 The seed and fertilizer boxes should be provided with self-locking mechanism on being opened.
- 11.3 Accessories like foot board, row marker, press wheel and area recorder may also be provided.
- 11.4 The hardness of shovel was recorded as 235.7 to 261.5 HB, against the requirement of 350 to 450 HB. This should be looked into for necessary improvements in the quality of material of shovel.
- 11.5 Suitable clutches are not provided to stop the movement of metering mechanisms when the wheels are turned in reverse direction. This should be looked into
- 11.6 It is recommended that a permanent metallic calibration plate indicating the metering position and quantity of seed and fertilizer should be attached under the top cover of the seed box.
- 11.7 Seed agitator has not been provided. It should be looked into for corrective action.
- 11.8 Seed rate for Jowar & rate for fertilizer rate are not adjustable up to 125Kg/ha & 1000 Kg/ha respectively. This should be looked into for corrective action.
- Percentage visible damage of seed is more than the limit specified in IS 6316:1993. Therefore, this should be looked into for corrective action.

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COMMERCIAL (ICT)

11.10 The variation in dropping due to box filling at 3/4<sup>th</sup>, 1/2<sup>nd</sup> and 1/4<sup>th</sup> of rated capacity was excessive and calls for improvement in the design.

#### 11.11 Technical Literature:

Operation manual, Service manual, Maintenance manual and Spare parts catalogue of seed cum fertilizer drill in English was provided in a single booklet form for reference during the test. However, this may be brought out in Hindi and other regional languages as per IS: 8132- 1999 (Reaffirmed 2004) for the sake of user & technical personnel.

### **TESTING AUTHORITY:**

B.N. DIXIT AGRICULTURAL ENGINEER	
Dr. P.P. RAO DIRECTOR	P-P. Rai

# 12. APPLICANT'S COMMENTS

"All the suggestions given by the SRFMTTI is very needful for our product development".