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

संख्या/No: Machine-597/1654

माह/Month: June, 2024

THIS TEST REPORT IS VALID UPTO 31.05.2031



ICS, ICS - PW 1200 POWER WEEDER.



भारत सरकार

Government of India

कृषिएवं किसान कल्याण मंत्रालय

Ministry of Agriculture and Farmers Welfare

कृषिएवं किसान कल्याण विभाग

Department of Agriculture 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.)

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Machine-597/1654

ICS, ICS - PW 1200 POWER WEEDER.

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COMMERCIAL (ICT)

Manufacturer, (apa)

: M/s. ICS MERCHANDISE PRIVATE LIMITED.

31, Rudra's Arcade, 60 Feet, Mallathahalli Lake Road, NGEF Layout, Mallathahalli, Bangalore-

560056, India.

Applicant

: The Manufacturer

ICS, ICS - PW 1200 POWER WEEDER.

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Machine-597/1654 THIS TEST REPORT IS VALID UP TO 31.05.2031 (ICT)

Type of test

: COMMERCIAL (INITIAL)

Period of test

: March, 2024 to June, 2024

Test Report No.

Machine-597/1654

Month / Year of release

June, 2024

- i) The results reported in this report are observed values and no corrections have been applied for atmospheric and site conditions.
- ii) The data given in this report pertain to the particular machine randomly selected by testing authority.
- iii) The results presented in this report do not, in anyway, attribute to the durability of the machine.
- iv) This Test Report should not be reproduced in part or full without prior permission of the Director, Southern Region Farm Machinery Training & Testing Institute, Garladinne, Anantapur (A.P.).
- v) This is a report on Commercial Test of Power Weeder named "ICS, ICS-PW 1200 POWER WEEDER". This report is valid up to 31.05.2031, Vide Ministry's O.M. No. 13-22/2020-M&T (I&P) dated 12.12.2023.

SELECTED CONVERSIONS

S. No.	Units	Conversion Factor
1	Force	
	1 kgf	9.80665 N
		2.20462 lbf
2	Power	
	1 hp	1.01387 metric hp (Ps)
		745.7 W
	1 Ps	735.5 W
	1 kW	1.35962 Ps
3	Pressure	
	1 psi	6.895 kPa
	1 kgf/cm ²	98.067 kPa = 735.56
		mm of Hg
	1 bar	$100 \text{ kPa} = 10 \text{ N/cm}^2$
	1 mm of Hg	1.3332 m-bar

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ICS, ICS - PW 1200 POWER WEEDER.

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COMMERCIAL (ICT)

18. COMMENTS & RECOMMENDATIONS

18.1 Engine Performance:

- 18.1.1 The maximum power was observed as 3.8 kW under natural ambient condition against the declared value of 3.7 kW.
- 18.1.2 Specific fuel consumption of engine corresponding to maximum power was recorded as 430 g/kWh against the declared value of 380 g/kWh.
- 18.1.3 Back up torque of engine was observed as 10 % against declared value of 10 %.
- 18.1.4 Max. torque was observed as 11.48 Nm against the declared value of 12.4 Nm.

18.2 Mechanical vibration:

The amplitude of mechanical vibration on various assemblies of the Power weeder was observed to the extent of 580 micron, which is on higher side. In view of the above, this should be given top priority for corrective action.

- 18.3 The labeling plate does not reveal all the required information. It is therefore recommended that a suitable labeling plate covering all essential components, inter alia, the following MUST be provided:
 - i) Name of the machine
 - ii) Country of origin
 - iii) Engine number
 - iv) SFC

18.4 Technical literature:

User's manual is provided during the test. However, the same must be brought out in Hindi & other regional languages as per IS 8132:1999 (Reaffirmed 2004) for the guidance of users.

The following literature should be provided.

- i) Service manual
- ii) Parts catalogue

TESTING AUTHORITY

Er. PRAMOD YADAV AGRICULTURAL ENGINEER Er. P. KAMALABAI

SENIOR AGRICULTURAL ENGINEER

Dr. B.M. NANDEDE DIRECTOR

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