



भारत सरकार / Government of India

उत्तरीक्षेत्रकृषिमशीनरीप्रशिक्षणएवंपरीक्षणसंस्थान / Northern Region Farm Machinery Training and Testing Institute

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[ISO – 9001 : 2015 CERTIFIED]

TECHNICAL SPECIFICATIONS FOR FERTILIZER BROADCASTER

1.1	General:		
	Name & address of manufacturer	:	
	Name & address of applicant	:	
	Type	:	
	Make	:	
	Model	:	
	Year of manufacture	:	
	Serial No.	:	
	Recommended prime mover	:	
	Fertilizer spreading range of implement, m	:	
1.2	Prime mover used		
	Type	:	
	Tractor	:	
	Engine No.	:	
	Chassis. No.	:	
	Year of manufacture	:	
	Max PTO power, kW	:	
	Rated engine speed/PTO recommended for field test, rpm	:	
1.3	Specification of machine:		
1.3.1	Propeller shaft:		
	Type	:	
	Length of propeller shaft, mm		
		Maximum	
		Minimum	
	Notation	Corresponding propeller shaft hub dimensions (PTO type 1)	
		As per IS 4931: 1995 (mm)	As observed (mm)
A	54 (minimum)		
L	8.69 (minimum)		
D Ø	34.93±0.03		

Name of the Manufacturer/ Applicant	Document No, if any Revision status	Name of the Test Agency: NRFMTTI,Hisar
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	d Ø	29.7±0.1		
	b Ø	34.6 (minimum)		
	Provision for locking	:		
	Mass of shaft, kg	:		
1.3.2	Mast:			
	Type			
	Constructional details	:		
1.3.3	Dimensions of hitch of implement as per IS 17231:2019 (Table 4) (Ref. Fig. 4):			
Dimensions	Specifications	Dimensions in mm		Remarks
		As per IS 17231:2019 (Cat-I/Cat-2)	As measured	
Upper hitch point				
D ₁	Dia. of hitch pin	25.37 - 25.50		
b ₁	Width between inner faces of yoke	52 (Min.)		
Lower hitch attachments				
D ₂	Dia. of hitch pin	27.8 - 28.0/ 27.8 - 28.0		
b ₃	Linch pin hole distance	49 (Min.)		
b ₅	Clevis width hole	65 - 67		
l	Lower hitch point span	683±1.5/ 825 ± 1.5		
Other Dimensions				
d	Diameter for linch pin hole			
		For Upper hitch pin	12 (Min.)	
		For Lower hitch pin	12 (Min.)	
h	Mast height	460±1.5/ 610 ± 1.5		
1.3.4	Power transmission system			
	Method of transmission	:		
Notation	Corresponding power input shaft dimensions (PTO type 1) (Refer fig.4)		Conformity with IS	
	As per IS: 4931-1995 (mm)	As observed (mm)		
A	54 (min)			
B Ø	29.4+0.1 - 0			
D Ø	34.79±0.06			
d Ø	28.91±0.05			
G	7.0			
C	38.0			
b (optional)	25.0±0.5			
m (optional)	8.3 Ø			
r	6.7±0.25			

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W	8.69-0.09 -0.16		
α	30^0		
1.3.5	Gear box:		
	Type	:	
	Speed reduction ratio	:	
	Lubrication	:	
	Bearing and their location	:	
1.3.6	Hopper:		
	Type	:	
	Size, mm		
	Length	:	
	Width	:	
	Slanted length	:	
	Height	:	
Thickness	:		
Capacity,			
Mass, kg	:		
Volume, m ³	:		
Location	:		
1.3.7	Agitator:		
	Type	:	
	Size, mm		
	Diameter of disc	:	
	Diameter of shaft	:	
Speed of agitator corresponding to 540 PTO rpm	:		
1.3.8	Spreading disc:		
	Type		
	Number	:	
	Size, mm		
	Diameter	:	
	Thickness	:	
	No. of vane		
Size of vane, mm			
Peripheral length	:		
Width	:		
Thickness	:		
Height from base	:		
1.3.9	Feed control mechanism:		
	Type	:	
	Size of lever, mm		
	Length	:	
	Width	:	
Thickness	:		

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	No. of setting for broadcasting	:	
	Height of spreader disc from ground level, mm		
	Maximum	:	
	Minimum	:	
	Method of mounting	:	
1.3.9.1	Quantity adjusting disc mechanism:		
	Type	:	
	Size (Dia. X Thickness), mm	:	
	No. of hole aperture	:	
	Surface area of each opening, mm ²	:	
1.3.9.2	Distribution direction adjustment:		
	Type	:	
	Size of lever (L x W x T), mm	:	
	No. of adjustment	:	
1.3.10	Overall dimensions, mm:		
	Length		
	Width		
	height		
	Mass, kg	:	
1.3.11	Safety mechanism	:	
1.3.12	Lubricating schedule:		
1.3.13	Lubricating points:		
	Propeller shaft	:	
	Oiling point	:	
	Gear Box	:	
	Total lubricating points	:	
1.4	Labeling plate:		

Date:
Place:

Signature:
Name of signatory:
Designation:
Name & address of firm:

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