

BUREAU OF INDIAN STANDARDS

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Draft Indian Standard

DATA SHEET FOR INDUSTRIAL TOWING TRUCKS: PART 1 — I.C. ENGINE POWERED
(Second Revision)

(ICS 53.060)

Transport Tractors, Trailers and Industrial Trucks
Section Committee, TED 22

Last Date for Comments: XX.XX.XXXX

Transport Tractors, Trailers and Industrial Trucks Sectional Committee, TED 22

FOREWORD

(Formal clause to be added later on)

This standard was first revised in 1987. First revision included some additional information which may be used by the manufacturer and purchaser alike for giving details of the equipment to be manufactured by the manufacturer or required by the purchaser.

This revision has been taken to incorporate the latest development in the field.

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**DATA SHEET FOR INDUSTRIAL TOWING TRUCKS: PART 1 — I.C. ENGINE
POWERED
(Second Revision)**

1 SCOPE

This standard lays down the data required for the selection of I.C. engine powered industrial towing trucks.

2 REFERENCE

This standard does not contain any cross reference.

3 TERMINOLOGY

For the purpose of this standard, the following definitions shall apply.

3.1 Industrial Towing Trucks — A self-propelled industrial truck with solid or pneumatic tyres, with three or more wheels, with front or rear drive wheels, intended for towing or shunting one or several non-powered trucks or trailers inside or outside buildings and occasionally on public roads.

3.2 Drawbar Pull — The drawbar pull measured on a smooth, dry and horizontal concrete surface, with a horizontal towbar in the longitudinal axis of the vehicle, after progressive acceleration, and with a driver weighing 70 kg in the case of sit-on or stand-on tractor.

3.2.1 The drawbar pull shall be given for a tractor equipped with solid tyres or with pneumatic tyres inflated to the pressure specified by the tractor manufacturer.

4 DATA SHEET

4.1 Application and Site Data — *(To be furnished by the users)*

- a) Hours per shift h
- b) Shifts per day.....
- c) Days per week.....
- d) Temperature : Max ... °C; Min °C
- e) Altitude m, above mean sea level
- f) Relative humidity, Max at..... °C%

4.2 Engine

- a) Make, model
- b) Type.....
- c) Cooling system Air Cooled/Water Cooled
- d) Gross power kW at rpm
- e) Fly wheel power..... kWat rpm
- f) Maximum torque..... Nm at rpm
- g) No. of cylinders.....
- h) Bore mm
- j) Displacement.....

- k) Type of fuel used.....
- m) Type of fuel pump.....
- n) Oil specification.....

4.3 Transmission

- a) Model.....
- b) Type.....
- c) Converter/clutch.....
- d) Speed in kmph (Unladen)
 - 1) Forward speed.....
 - 2) Reverse speed.....
- e) Neutral start provision Yes/No
- f) Controls..... Single/Multi-lever

4.4 Maximum Drawbar Pull.....N

4.4.1 Sustained drawbar pull N

4.4.2 Height of coupling..... mm

4.5 Braking

- a) Type (drum/disc, wet/dry, hydraulic).....
- b) Actuating system (hydraulic/mechanical).....
- c) Operation of brake (hand operated/foot operated).....
- d) No. of levers/pedals.....

4.6 Steering

- a) Type (mechanical/power assisted).....
- b) Power pump.....
- c) Actuator details.....

4.7 Electrical System

- a) Starting/Type..... Voltage..... V
- b) Battery, Type..... Capacity..... Ah c)
- Lighting.....
- d) Charging: Type (Alternate/Dynamo).....

4.8 Tyre

NUMBER/SIZE	TYPE OF TYRE			
	Solid Rubber	Pneumatic Shaped Resilient	Pneumatic	Any Other Type
a) No. of wheels (driving)				
b) No. of wheels (steering)				
c) Tyre size				
d) Rim size				

4.9 Oil

	Oil Capacity	Type of Oil
a) Fuel tank		
b) Engine crank case		
c) Final drive		
d) Torque converter		
e) Transmission		
f) Steering		
g) Differential		

4.10

- a) Overall length mm
- b) Overall width mm
- c) Height mm
- d) Minimum ground clearance mm
- e) Wheel base ,
- f) Wheel track
 - 1) Front
 - 2) Rear
- g) Turning radius
- h) Angle of approach and departure.....

4.11 Mass of Base Machine (Without any Attachment) kgs _____

4.12 Standard equipment

4.13 Optional Attachments

4.14 Other Attachments

4.15 Gauges and Indicators

4.16 Truck Provided with Overhead Canopy Yes/No

