

## PRODUCT MANUAL FOR STEEL DRUMS (GALVANIZED AND UNGALVANIZED) ACCORDING TO IS 2552:1989

This Product Manual shall be used as reference material by all Regional/Branch Offices & licensees to ensure coherence of practice and transparency in operation of certification under Scheme-I of Bureau of Indian Standards (Conformity Assessment) Regulations, 2018 for various products. The document may also be used by prospective applicants desirous of obtaining BIS certification licence.

1.	Product	:	: IS 2552:1989			
	Title	:	Steel Drums (Galvanized and Ungalvanized)			
	No. of Amendments	:	1			
2.	Sampling Guidelines:					
a)	Raw material	:	As per clause 6 of IS 2552:1989.			
b)	Grouping guidelines	:	Please refer ANNEX- A			
c)	c) Sample Size		Two Drums (One drum without protective coating for air pressure test) and 5 closures			
3.	List of Test Equipment	:	Please refer ANNEX $-\underline{B}$			
4.	Scheme of Inspection and Testing	:	Please refer ANNEX – <u>C</u>			
5.	Possible tests in a day	: All tests				
6.	Scope of the Licence:					
	"Licence is granted to use Standard Mark as per IS 2552:1989 with the following scope:					
	Name of the product	Steel Drums				
	Grade					
	Nominal Capacity					
	Туре	Galvanized/ Ungalvanized				

BUREAU OF INDIAN STANDARDS ManakBhawan, 9, Bahadur Shah ZafarMarg, New Delhi – 110002

#### **ANNEX A**

### **Grouping Guidelines**

- 1. Drums as per IS 2552: 1989 can be classified based on the following:
  - (a) Nominal Capacity 3 litres to 150 litres
  - (b) Grade A1, A2, B1, B2, C
  - (c) Type Galvanized/ Ungalvanized
- 2. The following grouping shall be considered for the purpose of GoL/CSoL:

Group	I	II	III	IV
Nominal Capacity (litres)	3 to 10	Over 10, up to and including 30	40 and 50	75 to 150

- 3. Considering the above, one sample of any nominal capacity from each grade and type shall be drawn from each group to cover the entire nominal capacity range in that particular group.
- 4. The Firm shall declare the Varieties of drums they intend to cover in the Licence. The Scope of Licence may be restricted based on the Manufacturing and Testing capabilities of the Manufacturer.
- 5. During the operation of license, it shall be ensured that all varieties covered in the license are tested in rotation, to the extent possible.

# ANNEX B

# **List of Test Equipment**

### Major test equipment required to test as per the Indian Standard

Sl. No.	Tests used in with Clause	Test Equipment		
	Reference			
1.	Capacity as per Cl 5	Platform balance		
		Thermometer		
		Hydrometer		
		Depth Gauge		
		Flowmeter		
		Standard measures		
		Graduated measuring cylinders		
2.	Dimensions as per Cl 5	Vernier calliper		
		Steel measuring tape		
		Steel scale		
3.	Sheet thickness as per Cl 6.2	Micrometer		
4.	Finish as per Cl. 8	Visual examination		
5.	Air pressure test as per Cl. 9.1	Arrangement for pressurizing the drum		
	1	Pressure gauge		
		Stop watch		
		Soap solution		
		Water tank		
6.	Drop Test as per Cl 9.2	Concrete Floor		
		Arrangement for suspending and dropping the drum		
7.	Handle pull test as per Cl 9.3	Arrangement for application of Required pull load Hook		
		attachment as per Fig. 3		
		Stop watch		

The above list is indicative only and may not be treated as exhaustive

#### ANNEX C

### **Scheme of Inspection And Testing**

- **1. LABORATORY** A laboratory shall be maintained which shall be suitably equipped (as per the requirement given in column 2 of Table 1) and staffed, where different tests given in the specification shall be carried out in accordance with the methods given in the specification.
- **1.1** The manufacturer shall prepare a calibration plan for the test equipments.
- **2. TEST RECORDS** The manufacturer shall maintain test records for the tests carried out to establish conformity.
- **3. LABELLING AND MARKING** As per the requirement of IS 2552:1989.
- **4. LEVELS OF CONTROL** The tests as indicated in column 1 of Table 1 and the levels of control in column 3 of Table 1, shall be carried out on the whole production of the factory which is covered by this plan and appropriate records maintained in accordance with paragraph 2 above.
- **4.1** All the production which conforms to the Indian Standards and covered by the licence should be marked with Standard Mark.
- **5. REJECTIONS** Disposal of non-conforming product shall be done in such a way so as to ensure that there is no violation of provisions of BIS Act, 2016.

TABLE 1

(1)				(2)	(3)			
Test Details				Test equipment	Levels of Control			
Cl.	Requirement	uirement Test Method		requirement	No. of	Frequency	Remarks	
		Clause	Reference	R: required (or) S: Sub-contracting	Sample			
	D: 1		IC 2552	permitted	T	E 20.1 C	TC 1 C 1 11 1 1 11 1 1 1 1	
5	Dimensions and Capacity	5	IS 2552	R	Two	Every 20 drums of one size	If any sample fails, all drums shall be checked and those found non-conforming shall not be marked.	
6	Material	6.1	IS 2552	S		Steel used shall be ISI Marked.		
	Thickness	6.2	IS 2552	R	One	Each Consignment		
7	Construction	7.1 to 7.4	IS 2552	R	Each Drum			
8	Finish	8.1, 8.2	IS 2552	R	Each Drum			
9	Air pressure test	9.1	IS 2552	R	Each Drum		Drums not conforming shall not be marked	
9	Drop Test	9.2	IS 2552	R	One	Every 2000 drums of one size	If any sample fails, two more samples shall be drawn from the same lot and subjected to drop test. In case of any failure, the entire lot of 2000 drums shall not be marked.	
9	Handle pull test	9.3	IS 2552	R	One	Every 100 drums of one size	If any sample fails, the entire lot of 100 drums shall not be marked.	

Note 1: Sub-contracting is permitted to a laboratory recognized by the Bureau or Government laboratories empaneled by the Bureau.

Note 2: Levels of control given in column 3 are only recommendatory in nature. The manufacturer may define the control unit/batch/lot and submit his own levels of control in column 3 with proper justification for approval by BO Head.