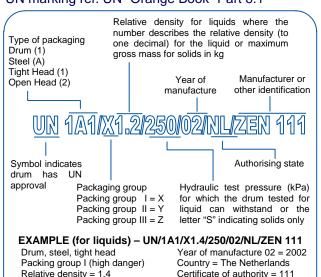
UN Marking of large TH steel drums

For the transport of dangerous goods				
Gauge Combinations (mm)			UN Mark	UN Mark
Top	Body	Bottom	Recommendation	Special
1.5	1.5	1.5	X 1.2/250	X 2.0/400
1.5	1.2	1.5	X 1.2/250	X 2.0/400
1.2	1.2	1.2	X 1.2/250	X 1.8/300
1.2	1.1	1.2	X 1.2/250	X 1.8/300
1.2	1.0	1.2	X 1.2/250	X 1.8/300
1.0	1.0	1.0	X 1.2/250	N/A
1.0	0.9	1.0	X 1.2/250	N/A
1.0	0.8	1.0	X 1.2/250	N/A
0.8	0.8	0.8	Y 1.4/150	N/A
0.8	0.7	0.8	Y 1.4/150	N/A

These UN marking are now also an ICDM recommendation

UN marking ref: UN "Orange Book" Part 6.1



EXAMPLE (for solids) - UN/1A2/Y350/S/03/D/ZEN 112

Year of manufacture 03 = 2003

Country = Germany Certificate of authority = 112



Hydraulic Pressure test = 250 kPa

Packing group II (medium danger)

"S" = denotes drum intended for solids

Maximum gross mass = 350 kg

Drum, steel, open head

SETA

Large steel drums are dimensionally defined by ISO & EN standards

SEFA in close cooperation with ICDM – harmonise and standardise the additional aspects of drum making

All approved recommendations can be found on the SEFA website



www.sefa.be

ICDM recommendations can be found on the ICDM website



SEFA

The SEFA head office is located in Belguim

c/o Agoria Fax and phone:

Diamant Building +33 (0)490 965 853 (France)

Bld. A. Reyers 80 Mobile:

B-1030 Bruxelles +33 (0)618 875 120 (France)



E-mail

patrick.moet@wanadoo.fr



SEFA TECHNICAL RECOMMENDATIONS FOR STEEL DRUMS

International standard for steel drums are: ISO 15750 EN209 & EN210

SEFA Tel: +33 (0)490 965 853 (France)

European Association of Steel Drum Manufacturers Syndicat Europeen De L'Industrie Des Fûts En Acier Verband Der Europaischen Stahlfassindustrie



Cold rolled steel specification for drums

The reference international standard for steel specification are: ISO 3574 & ISO 16162

Additional specification

Aspect of steel for drums have been developed by SEFA in co-operation with its suppliers members from the European Steel Industry and can be found on the SEFA website



External RAL paint colours

ICDM including SEFA, SSCI, AOSD have developed a worldwide fully compliant standard for external drum paints

Why was the RAL standard chosen?

The RAL (European Colour Standard) is the most widely accepted international colour system and is suitable for printing of drums (the alternative Pantone® system is only suitable for printing on paper)

SEFA Colour Booklet

A fully up to date colour booklet is available from any drum-making member of SEFA



Palletising SEFA has adopted the VCI (German Chemical Industry) standards for the palletisation of empty/filled steel drums. Detail of configurations can be found on the SEFA website Www.vci.de For filled steel drums





DISCLAIMER: Please note that the colours shown on this page offer only an approximation of their actual real-life counterparts.





www.ral.de

Internal cleanliness of steel drums

This is a very important issue for drum users in certain critical industries.

These two methods are recommended by SEFA and ICDM:

- Laboratory test
- Factory production test

Laboratory test

ICDM (SEFA, SSCI, AOSD) has adopted the NAS 1638 (National Aerospace Standard) cleanliness test method as their measure for the cleanliness of steel drums. According to this standard a fluid cleanliness is measured by weighing and particulate counting. Plain drums typically comply with NAS class 5, weight class 100 of this standard. Internally coated drums comply typically with NAS class 3, weight class 100.

This method is complicated and time consuming, a simpler Factory Production Test is available and suitable for most of the drum applications

Factory production test

This method involves using a vacuum cleaner with a well-defined filter fitted in order to compare visually against a white filter reference and evaluate dirt in the drum.

Contamination weight is given by the filter weight increase after the test

Details of test methods can be found on the SEFA and ICDM websites



www.sefa.be



www.icdm.org



