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भारतीय मानक ब्युरो

BUREAU OF INDIAN STANDARDS

MINUTES

Committee	Date & Day	Time
13 th Meeting of Mechanical Equipment Used in	_	11: 30 hrs
Refueling Stations for Petroleum and Gaseous	=	
Fuel Sectional Committee, MED 38 through		
Webex		

CHAIRPERSON: In absence of Shri P. Kumar (Chief Controller of Explosives) due to unavoidable circumstances, as informed, the committee nominated Shri B. Singh (Deputy Chief Controller of Explosives) as the Chairperson for the meeting.

MEMBER SECRETARY: Ms Ankita Vidhyarthi, Scientist 'D'/Joint Director, Bureau of Indian Standards, New Delhi

ITEM 0 WELCOME AND OPENING REMARKS

- **0.1** Head, Mechanical Engineering Department was unable to attend the meeting due to his presence required in another important meeting.
- **0.2** Shri B. Singh, Deputy Chief Controller of Explosives, welcomed all the committee members and expressed heartfelt gratitude to all committee members for their dedicated involvement in the committee.

ITEM 1 CONFIRMATION OF THE MINUTES OF THE LAST MEETING

The Committee confirmed the Minutes of the last meeting.

ITEM 2 SCOPE AND COMPOSITION OF THE SECTIONAL COMMITTEE

2.1 Scope

The Committee proposed the scope to remain as-

Formulation of standards in the field of mechanical equipment used in refuelling stations for petroleum and gaseous fuels.

2.2 Composition of the Committee

- **2.2.1** *The committee noted the information.*
- **2.2.2** The *committee noted the information*.
- **2.2.3** The *committee noted the information*.

2.3 Co-options & Revised Nominations

a) No new co-option request was received - The committee noted the information.

2.4 Termination letter sent to non-participating members

Sl No.	Organisation Name	Organisation	Termination	Response Mail	Remarks
		Members	Mail sent Date	Received	
,	Kirloskar Pneumatic Company Limited, Pune	Shri Neeraj Asati (P) Shri Pravin T. Nilekar (Alt)	28 Nov 2023	Email Kirloskar 28 Nov 2023.pdf Email Kirloskar 29 Nov 2023.pdf	Request for reconsideration was received. The Committee agreed to accept the request of the firm to continue being the member of the committee. It was decided to advise the firm of adhering to the attendance
/	Petroleum Federation of India, New Delhi	Shri Y. Sahai	28 Nov 2023	08 Dec 2023 Email Federation of indian petroleum g urmeet_singh_11_De c_2023.pdf	supper-annuated
1	Oil Industry Safety Directorate, Noida	Shri Sanjay Kumar Tiwari (P) Shri Harish Gupta (Alt)	28 Nov 2023	11 Dec 2023	Request for reconsideration has been received. The Committee agreed to accept

	T	Т	T		I -
					the request of the
					firm to continue
					being the member
					of the committee.
					It was decided to
					advise the firm of
					adhering to the
					attendance
					requirements.
4)	Tatsuno India Private	Shri R. S. Rana	28 Nov 2023	Shri Dattatraya	Request for
'/	Limited, Navi	Simi it. S. Itana		Dadapure	reconsideration
	Mumbai				has been received.
	iviamoui			Email_tatsuno_7_dec	
				2023.pdf	The Committee
					agreed to accept
					the request of the
					firm to continue
					,
					being the member
					of the committee.
					It was decided to
					advise the firm of
					adhering to the
					attendance
					requirements.
5)	Ashok Leyland	Shri Muthukumar N			Request for
	Limited, Chennai	(P)		Gautam	reconsideration
		Shri Ved Prakash			has been received.
		Gautam (Alt)		Email_Ashok_leylan	
				d_1_DEC_2023.pdf	The Committee
					agreed to accept
					the request of the
					firm to continue
					being the member
					of the committee.
					It was decided to
					advise the firm of
					adhering to the
					attendance
					requirements.
6)	Indian Rubber	Dr K. Raj Kumar (P)	28 Nov 2023	Shri Sanjiv Lathia	Request for
		Dr Debdipta Basu		· ·	reconsideration
	Research Association,			Email Lathia Rubbe	
	Mumbai	(1111)		r 28 Nov 2023.pdf	inas occii icceiveu.
	uviuiiivai			1_40_11UV_4U43.PU1	The Committee
					agreed to accept
					the request of the
					firm to continue
					being the member
					of the committee.
I					It was decided to

,	MECON Limited, Ranchi	Shri Sudarshan Malik (P) Smt Bindu Gurung (Alt)	29 Nov 2023 Email_MECON_ 28_NOV_2023.p df	Nil	advise the firm of adhering to the attendance requirements. No response to the email was received. The committee decided to terminate the membership of the firm due to noncompliance of
	Indraprastha Gas Limited, New Delhi	Shri P. K. Pandey (P) Shri Sushil Kumar (Alt)	28 Nov 2023 Email IGL 28 N OV 2023.pdf	Nil	attendance guidelines. No response to the email was received.
					The committee decided to terminate the membership of the firm due to noncompliance of attendance guidelines.
9)	Inox India Pvt. Limited, Vadodara	Shri Deepak V. Acharya Shri Nitin Jansari (Alt)	23 Nov 2023 Email_INOX_23 NOV_2023.pdf	Nil	No response to the email was received. Sh Nitin Jansari was avialble during the meeting and requested to be part of the committee. The Committee agreed to accept the request of the firm to continue being the member of the committee. It was decided to advise the firm of adhering to the attendance requirements.

10) Reliance Industries	Shri Prerak Shah	23 Nov 2023	Nil	Request for
Limited, Mumbai	Shri Sanjay Pandita	Email_RELIANC		reconsideration
	(Alt)	E_23_NOV_2023		has been received.
		.pdf		
				The Committee
				agreed to accept
				the request of the
				firm to continue
				being the member
				of the committee.
				It was decided to
				advise the firm of
				adhering to the
				attendance
				requirements.

ITEM 3 ROLLING ANNUAL ACTION PLAN FOR THE YEAR 2024-25

3.1 Proposed meeting Calendar for FY 2024-25 is as follows:

Committee	Q1 2024-25	Q2 2024-25	Q3 2024-25	Q4 2024-25
	June	September	November	February
MED 38	June 27, 2024 Thursday	September 27, 2024 Thursday	November 28 , 2024 Thursday	February 20 , 2025 Thursday

The Committee noted the information and suggested that for conducting face to face meetings following Institutes may be considered – IIT Mumbai, IIT Delhi or IIT Jammu.

3.2 Rolling Action Plan 2024-2025

No published Indian standard is pending for review this year under a five-year review plan.

However, New Work Item Proposals (NWIPs) which are to be reviewed for the current year and carried forward from previous year are listed as below.

Sl No.	NWIP subject					
1)	Petrol filling stations -Safety requirements for construction and performance of metering pumps					
	dispensers and remote pumping units					
2)	Petrol filling stations - Construction and performance of automatic nozzles for use on fuel dispensers					
3)	Natural gas fuelling stations — CNG stations for fuelling vehicles					
4)	Natural gas fuelling stations — LNG stations for fuelling vehicles					
5)	ISO 12617 Road vehicles — Liquefied natural gas (LNG) refuelling connector — 3,1 MPa connector					

The Committee noted the information.

3.3 Standards National Action Plan (SNAP) 2022-2027

SNAP BOOK 2022-2027

Sector	Field	Subject	Priority
Machinery,	Fuel related products	Green Energy generation and storage	Medium
Manufacturing,		related equipment	
Engineering			

The Committee noted the information.

ITEM 4 SELECTION OF SUBJECTS/NEW SUBJECTS

The Committee noted the information.

ITEM 5 ACTIONS ARISING OUT OF THE PREVIOUS MEETINGS

Sl	Background	Committee decision during 12 th	Committee decision
No	Duckground	Meeting 12	during the 13 th
		G	Meeting
1)	Shri Rakesh Chaurasia of M/s Intertek agreed to provide the draft based on EN 13617-1:2021 within 4 weeks in consultation with the Panel members. Draft was received from Sh. Rakesh Chaurasia vide email dated 02 September 2022 BS EN 13617-RAKESH CHAURASIA DRAFT SE P 2022 and was circulated to the Committee vide email dated 25 May 2023 for comments.	The committee deliberated and decided that the panel meeting may be held in the next two to three weeks for final deliberation for the Preliminary draft (P-draft) based on EN 13617-1. Shri Sujit Koli of M/s Gilbarco Veeder Root India Pvt Ltd. (Convener) agreed to provide the panel meeting date, place and time to the Member Secretary.	Committee requested that MS may remind the panel to conduct the meeting at the earliest.
	Following comment was received from Dover India Private Limited (OPW Division), Thane vide email dated 25 May 2023:	Also, it was decided that a comment from Dover India Private Limited (OPW Division), Thane will be put up to the panel in the meeting.	
	Email DOVER INDIA- COMMENT 25 MAY 2023.pdf	The committee decided to reconstitute the panel as – Shri Sujit Koli of M/s Gilbarco Veeder Root India Pvt Ltd. (Convener) b) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd (Co-Convener) c) Shri D.H.V Anand of M/s HPCL d) Jojy Sebastian of M/s BPCL e) Shri Ajai Kumar Gupta of M/s	

Minutes (Final) | 13th Meeting | MED 38 | 26 September 2024 | Page 7 of 15 Nayara Energy Ltd (Formerly Essar Oil) f) Shri Ravi Paranjpe of M/s Karamdikar Lab g) Mr. Ajay Deshpande M/s Tokheim India Pvt. Ltd h) Shri Srinivasa Rao Keta of PESO i) Shri Dattatraya Dadapure of M/s Tatsuno India Pvt. Ltd. j) Shri Sanjay Khanna from Dover India ltd Earlier The Committee reviewed the status and requested Shri Rakesh to provide the draft based on EN 13617-1:2012. The Committee was of the view that documents under formulation by this Panel can be subsequently reviewed and revised based on revised EN 13617-1. Shri Rakesh agreed to provide the draft based on EN 13617-1:2012 in consultation with the following Panel members within 45 days:

- a) Shri Sujit Koli of M/s Gilbarco Veeder Root India Pvt Ltd. (Convener)
- b) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd (Co-Convener)
- c) Shri R. Murali Mohan of M/s HPCL
- d) Shri Kapil Niranjan of M/s BPCL
- e) Shri Ajai Kumar Gupta of M/s Nayara Energy Ltd (Formerly Essar Oil)
- f) Shri Ravi Paranipe of M/s Karamdikar Lab
- g) A representative of M/s Tokheim India Pvt. Ltd
- h) Shri Srinivasa Rao Keta of PESO
- i) Shri Dattatraya Dadapure of M/s Tatsuno India Pvt. Ltd.
- i) A representative of BIS

The Committee further decided that the panel may consider to include the 'vapour recovery requirements' as per EN 16321 (Part 1 & 2) in this draft. The draft was to be circulated to the Committee members for their comments for 30 days.

The Committee reconstituted the 2) existing panel to provide the draft based on ISO 16923:2016 'Natural gas fuelling stations -- CNG stations for fuelling vehicles.

> Comments on the draft were received from the following panel members:

> a) Shri Ashok Anand, M/s Tulsa Gas Technologies India PVT. LTD. vide email dated 01 August 2022.

Email_Ashok_Anand_TULSA_AUG_

The Committee decided that the comments can be disposed off through the panel meeting.

The committee reconstituted the panel as -

- a) Shri Ashok Anand, M/s Tulsa Gas
- b) Shri Yashpal Soni of M/s MGL
- c) Shri Ravi Kumar Ravipalli of M/s Gujarat Gas
- d) Shri Ravi Paranipe of M/s Karamdikar Lab
- e) Shri Surendra Kaul of M/s Compac Industries India Ltd.

Contact details of representatives from M/S Atlas Copco and M/s EKC was provided by Shri Ravi Ravipalli during the meeting and are to be contacted by the MS for nomination in the panel.

Committee requested that MS may remind the panel to conduct the 2022_COMMENTS.pdf

TGT comments IS 16923 Draft for BIS.docx

b) M/s Gujarat Gas Company Ltd. vide email dated 23 August 2022.

Email_GGL_RAVI_KR_COMMENT_ 23_AUG_2022.pdf GGL_Comments_ISO 16923

c) M/s Compac Industries India Ltd. vide email dated 19 August 2022.

Email COMPAC COMMENT 19 A <u>UG 2022.pdf</u> COMPAC_Comments

During the meeting, representatives of the Panel informed the Committee that a week's time may be given to examine the ISO 16923:2016 and existing regulations and to provide suggestions for the modification as per Indian conditions and regulations.

The comments received to be referred to the existing Panel for its disposal and further recommendation.

- f) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd
- g) Shri Dattatraya Dadapure of M/s Tatsuno India Pvt. Ltd.
- h) Shri Praveen Nilekar of KPCL.
- i) A representative of M/s Atlas Copco*
- j) A representative of M/s EKC
- k) Shri Srinivasa Rao Keta of PESO

meeting at the earliest.

Background

The recommendation of the Panel meeting dated 01/08/2022 is placed below (Agenda and draft minutes of the meeting).

AGENDA_10TH_MEETING_MED_38.docx

MINUTES_10TH_MEETING_MED_38.docx

The Committee may consider and decide further action.

Earlier

The Committee reconstituted the existing panel to provide the draft based on ISO 16923:2016 'Natural gas fuelling stations -- CNG stations for fuelling vehicles':

- a) Shri Ashok Anand, M/s Tulsa Gas,
- b) Shri Ujwal Bhandari, M/s IGL,
- c) Shri Ashish Bajaj of M/s MGL
- d) Shri Ravi Kumar Ravipalli of M/s Gujarat Gas
- e) Shri Ravi Paranjpe of M/s Karamdikar Lab
- f) Shri Surendra Kaul of M/s Compac Industries India Ltd.
- g) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd
- h) Shri Dattatraya Dadapure of M/s Tatsuno India Pvt. Ltd.
- i) A representative of M/s Atlas Copco*
- j) A representative of M/s EKC

- f) Shri Srinivasa Rao Keta of PESO
- g) Representative of BIS

*Shri Ashok Anand agreed to provide the contact details

3) Substitution of referred standards with Indian Standards as applicable in the draft based on ISO 16924 was done and National Foreword was prepared.

<u>Copy of 20240508 IS-ISO 16924-NF_ARIF_DRAFT_01.docx</u>

The draft which was provided by Convener of the panel was circulated to the Committee vide email dated 27 July 2022, and is attached below for reference.

Email_16924_CIRCULATION MAIL 2022.pdf BS EN ISO 16924-2018 (1).docx

The Committee was informed by MS that in the changes proposed by the convener of the draft; there are still many changes to be made.

It was proposed that the draft should be made not equivalent to ISO 16924. The Committee agreed to this proposal.

The Committee further decided that adopted ISO/IEC shall be substituted by the member secretary (as applicable) and the modified draft to be substituted to the Panel for their examination and comment.

The Committee reconstituted the following Panel to examine the draft provided by the member secretary and to provide its recommendation for its wide circulation:

- a) Shri Deepak Acharya of M/s INOX India Pvt Ltd (*Convener*)
- b) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd
- c) Shri Ujwal Bhandari of M/s Indraprastha Gas Ltd
- d) Shri Ashish Bajaj of M/s Mahanagar

The Committee decided that the final P-draft incorporating National foreword & draft and also information on clause-wise deviations from the ISO Standard as provided by Convener, can be circulated to the Committee for examination and comments.

Shri Nitin Jansari of M/s Inox India Ltd. Agreed to provide the contact details of M/s VRV, H energy and M/s Cryogas Industries for inviting them in the panel.

The committee agreed that the final P-draft may be circulated by MS to the panel and then to the committee and may be discussed during the next committee meeting for examination and comments.

Gas Ltd

- e) Shri Ravi Kumar Ravipalli of M/s Gujarat Gas
- f) A representative of M/s VRV*
- g) A representative of M/s H- Energy*
- h) A representative of M/s IOCL Nasik
- i) Shri Anil Kumar Patel M/s Petronet LNG
- j) A representative of M/s Cryogas Industries*
- k) Shri Srinivasa Rao Keta of PESO
- l) Shri Sanjay Khanna of M/s Dover India Pvt Ltd
- m) Shri Ashok Anand

*Shri Deepak Acharya during the meeting agreed to provide the contacts details

Background

The draft received from the Convener was circulated to the Panel.

No comment has been received from the Panel and Committee members.

Earlier

During the last meeting, Shri Deepak Acharya in detail explained the major changes done in the draft considering Indian conditions. Member secretary appraised the Committee that as such with these changes, ISO 16924 cannot be adopted and modified adoption is to be done indicating the clause wise deviation from ISO standard along with justification in the national foreword. The Committee requested member's secretary to prepare the national foreword of ISO 16924 and circulate to the Panel members for their comments for 30 days. The Panel to make suitable recommendations to the Committee for wide circulation of the draft.

The Committee noted the information as given in the agenda.

4) The Convener of the Panel agreed to provide the draft based on ISO 12617 in consultation with the Panel members.

Reminder for draft has been sent to Shri Deepak Acharya of M/s INOX India Pvt Ltd, Convener of the Panel vide email dated 26 May 2023.

Draft is wait from the panel.

Sh Nitin Jansari of M/s Inox India Ltd. Agreed to provide the contact details of M/s VRV, H energy, M/s Cryogas Industries and M/s Rego LNG products for inviting them in the panel. He informed of holding the meeting with M/s Rego LNG products first and the circulating the draft in the panel for discussion.

Committee requested that MS may remind the panel to conduct the meeting at the earliest.

Background

Draft is wait from the Panel.

Earlier

The Committee requested the Panel to expedite and provide the draft based on

ISO 12617.

The Committee reconstituted the following panel to review and to provide the draft based on ISO 12617:2015 'Road vehicles — Liquefied natural gas (LNG) refuelling connector — 3,1 MPa connector' (considering applicable Rules/Regulation):

- a) Shri Deepak Acharya of M/s INOX India Pvt Ltd (Convener)
- b) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd
- c) Shri Ujwal Bhandari of M/s Indraprastha Gas Ltd
- d) Shri Ashish Bajaj of M/s Mahanagar Gas Ltd
- e) Shri Ravi Kumar Ravipalli of M/s Gujarat Gas
- f) A representative of M/s VRV*
- g) A representative of M/s H- Energy*
- h) A representative of M/s IOCL Nasik
- i) Shri Anil Kumar Patel M/s Petronet LNG
- j) A representative of M/s Cryogas Industries*
- k) Shri Srinivasa Rao Keta of PESO
- 1) A representative of M/s Rego LNG products

The panel agreed to provide the draft within 06 weeks.

Draft received from the panel to be circulated to the Committee members.

5) Shri Rakesh Chaurasia of M/s Intertek agreed to provide the draft based on revised EN 13012.

Draft is awaited.

Shri Sujit Koli of M/s Gilbarco Veeder Root India Pvt Ltd. (Co-Convener) was present during the meeting. He agreed to conduct the panel meeting along with panel meeting for EN 13617-1 as the composition of the panel is the same, vide Item **2**, Sl No. 1.

Shri Rakesh Chaurasia of M/s Intertek informed of providing the draft within 4 weeks.

Committee requested that MS may remind Mr. Rakesh Chaurasia for providing the draft and thereafter to panel for conducting the meeting at the earliest.

Background

Draft is awaited.

Earlier

During the 09th meeting, Shri Rakesh Chaurasia of M/s Intertek informed the Committee that revised version of EN 13012 is yet under publication. The Committee reviewed the status and requested the Shri Rakesh to provide the draft based on EN 13012 'Petrol filling stations. Construction and performance of automatic nozzles for use on fuel dispensers'. The Committee was of the view that document under formulation by this Panel can be subsequently reviewed and revised based on revised EN 13012. Shri Rakesh agreed to provide the draft in consultation with the following Panel members within 45 days:

a) Shri Rakesh Chaurasia of M/s Intertek India Pvt Ltd (Convener)

^{*}Shri Deepak Acharya during the meeting agreed to provide the contacts details

- b) Shri Sujit Koli of M/s Gilbarco Veeder Root India Pvt Ltd. (Co-Convener)
- c) Shri R. Murali Mohan of M/s HPCL
- d) Shri Kapil Niranjan of M/s BPCL
- e) Shri Ajai Kumar Gupta of M/s Nayara Energy Ltd (Formerly Essar Oil)
- f) Shri Ravi Paranjpe of M/s Karamdikar Lab
- g) A representative of M/s Tokheim India Pvt. Ltd
- h) Shri Srinivasa Rao Keta of PESO
- i) Shri Dattatraya Dadapure of M/s Tatsuno India Pvt. Ltd.
- j) A representative of BIS

The draft was to be circulated to the Committee members for their comments for 30 days.

NOTE —As the last meeting i.e the 11th meeting of the committee had actions pertaining to only Hydrogen Fuelling stations only as consulted and agreed upon by the chairperson. This section contains remaining actions arising from the 10th meeting of the committee.

ITEM 6 Programme of Work

The Total number of published standards in MED 38 is seven (07).

POW_MED38_JUNE

The Committee noted the information.

ITEM 7 INTERNATIONAL ACTIVITIES

7.1 Liaison with ISO TCs

The Committee noted the information.

ITEM 8 NATIONAL AND INTERNATIONAL LEVEL EVENTS TO BE PARTICIPATED IN

The Committee noted the information.

ITEM 9 SCIENTIFIC JOURNALS AND PERIODICALS TO BE SUBSCRIBED

BIS has taken a new initiative to subscribe to scientific journals and periodicals relevant to committee work. It is also envisaged that relevant articles from these journals and periodicals are shared with members of the sectional committee.

The Committee noted the information.

ITEM 10 CREATION OF POOL OF EXPERTS

The Committee noted the information.

ITEM 11 RESEARCH PROJECT TO BE TAKEN UP FOR INCLUSION OF EMPIRICAL DATA AND INSIGHTS

The Committee noted the information.

11.2 Guidelines for Research & Development Projects

The Committee noted the information.

11.3 Exposure Visits by Member Secretary

The Committee noted the information.

ITEM 12 RECENT INITIATIVES IN THE STANDARD DEVELOPMENT PROCESS OF BIS

In the recent months, several initiatives have been undertaken to reform the standard-making process in BIS with the aim to make the delivery mechanism in tune with the National needs and aspirations. These initiatives are both process initiatives as well as technical initiatives. Some of the important initiatives are:

12.1 Green Initiative by BIS

The Committee noted the information.

12.2 Interaction with SDO

The Committee noted the information.

12.3 Training of Committee Members

The Committee noted the information.

ITEM 13 GUIDELINES FOR MEMBERS OF TECHNICAL COMMITTEES

The Committee noted the information.

ITEM 14 NEW INITIATIVES IN STANDARDIZATION

a) Downloading of Indian Standards (Free of Cost)

The Committee noted the information.

b) National Institute for Training in Standardization (NITS)

The Committee noted the information.

c) BIS Activities on Social Media

The Committee noted the information.

d) One Nation One Standard

The Committee noted the information.

e) Memorandum of Understanding with Eminent Institutes

The Committee noted the information.

ITEM 15 OTHER ACTIVITIES/INFORMATION

a) WTO-TBT ENQUIRY POINT

The Committee noted the information.

b) TRANSLATION OF INDIAN STANDARDS

The Committee noted the information.

ITEM 16 SUSTAINABILITY PERSPECTIVE IN INDIAN STANDARDS

The Committee noted the information.

ITEM 17 UNECE GENDER RESPONSIVE STANDARDS DECLARATION

The Committee noted the information.

ITEM 18 ACCESSIBILITY

The Committee noted the information.

ITEM 19 DATE AND PLACE FOR THE NEXT MEETING

The Committee may see Item No. 3.1.

ITEM 20 ANY OTHER BUSINESS

There being no other business, the meeting ended with a vote of thanks to the Chair and the members.

ANNEX-A

(*See* Clause **2.2**)

COMPOSITION OF MECHANICAL EQUIPMENT USED IN REFUELING STATIONS FOR PETROLEUM AND GASEOUS FUEL SECTIONAL COMMITTEE, MED 38

13th	26 Sep 2024	Webex Online
12 th	27 June 2024	Webex Online
11 th	26 Sep 2023	Webex Online

Sl No.	Organization Represented	Principal Member/Alternate Member	Email
1.	Bharat Petroleum Corpn Ltd, Mumbai	Shri Ravikumar CV	ravikumarcv@bharatpetroleum.in
	Withhour	Shri Jojy Sebastian (Alt)	sebastianj@bharatpetroleum.in
2.	Compace Industries India Ltd, New Delhi	Shri Varun Sethi	varun@compacindia.com
		Shri Surendra Kaul (Alt)	skaul@compacindia.com
			kaul1948@gmail.com
3.	Dover India Pvt Limited (Opw Division), Thane	Shri Ajay Deshpande (Alt 1)	ajay.deshpande@doverfs.com
4.	Gilbarco Veeder-Root India Pvt. Ltd, Mumbai	Shri Sandeep Salvi Shri Sujit koli	sandeep.salvi@gilbarco.com
5.	Gujarat Gas Company Ltd, Ahmedabad	Shri Ravi Ravipalli	ravi.ravipalli@gujaratgas.com
6.	Hindustan Petroleum Corporation Ltd, Mumbai	Shri D. H. V. Anand	dhvanand@hpcl.in
7.	Inox India Limited	Shri Nitin Jansari	dhvanand@hpcl.in
8.	Intertek India Pvt Ltd, Gurugram	Shri Rakesh Chaurasia	rakesh.chaurasia@intertek.com
9.	Karandikar Laboratories Pvt Ltd, Mumbai	Shri Ravindra Keshav Paranjpe (Alt)	ravi@karandikarlab.com

Guests

Sl No.	Name	Organisation Represented	Email
1	Dr. B. Singh, Deputy Chief	PESO	bsingh@explosives.gov.in
	Controller of Explosives		
2.	Sh. J. Rout, Controller of	PESO	j.rout@explosives.gov.in
	Explosives		