BUREAU OF INDIAN STANDARDS

MINUTES

Panel on IS 3370, CED 2:2/P1 : Eighth Meeting

Friday, 04 October 2024 : 1500 h

Venue : Hybrid (New Delhi) - Through

Webex

Convener: Shri L K Jain **Member Secretary:** Shri J. K. Chaudhary

Member Present Virtually

SI No.	Representative(s)	Organizations
1)	Shri Jose Kurian	In Personal Capacity, Thiruvalla
2)	Dr. A.K. Mittal	In Personal Capacity, Faridabad
3)	Dr Hemant Oke	In Personal Capacity, Nagpur
4)	Dr Namdeo A. Hedaoo	Government College of Engineering, Pune
5)	Shri T. V. G. Reddy	National Council for Cement and Building Materials, Faridabad
6)	Shri Suman Sen	Tata Consulting Engineers Limited, Navi
		Mumbai

Invitees

	SI No.	Representative(s)	Organizations
Ī	1)	Dr A K Jain	In Personal Capacity, New Delhi
ſ	2)	Prof. M N Shariff	Indian Institute of Technology Bombay, Mumbai

ITEM 0 OPENING REMARKS

The Convener of the Panel welcomed all the members of CED 02:2/P1 Panel for IS 3370 in its 8th meeting and requested all the members for their active participation and contribution.

With these introductory remarks, the Convener requested BIS Secretariat for taking the agenda item wise.

ITEM 1 CONFIRMATION OF THE MINUTES OF LAST MEETING

1.1 Since there were no comments, the Panel confirmed the Minutes as circulated.

ITEM 2 COMPOSITION

- **2.1** The Panel reviewed the composition and decided to drop the following organizations due to lack of participation:
 - a) Gammon Engineers and Contractors Private Limited, Mumbai
 - b) Indian Institute of Technology Roorkee, Roorkee
 - c) Shri Arvind Kumar, In Personal Capacity, New Delhi
- **2.2** The Panel also decided to co-opt Dr A. K. Jain (*In Personal Capacity*). Also, the Panel suggested BIS to write a letter to the organizations which had not participated in the last two meetings (including this meeting also) to send revised nomination on the Panel. Shri L. K. Jain agreed to communicate with Indian Concrete Institute, Chennai for fresh nominations on the Panel.

ITEM 3 COMMENTS ON PUBLISHED STANDARDS

- **3.1** The Panel reviewed the proposal from Dr A K Jain for inclusion of ferrocement lining on the inner wall of the tank and requested him to provide summary on the various research studies conducted on water retaining structures with ferrocement lining. The Panel also requested Dr Jain to provide a brief background on liquid retaining structures constructed using ferrocement technology based on the available research and which shall include the following aspects which will be helpful for the Panel for further understanding of the proposed subject.
 - 1. Reduction in weight of the structure after using ferrocement lining
 - 2. Thickness of the ferrocement lining for creating impermeable layer
 - 3. Types of tests to be conduct for ferrocement
 - 4. Economical aspects.
 - 5. Methodology, supervision and inspections that should be taken.

Dr Jain agreed to provide the background on the details as mentioned above.

- **3.2** The Panel considered the comments received from Dr. Hemant Oke on various parts of IS 3370. After brief discussion, the Panel decided/noted the following:
 - 1) The Panel agreed on the suggestion of Dr Oke that a sentence may be added in the IS 3370 at suitable place to specify that 'The clear cover to steel reinforcement should not be more than 75 mm'.
 - 2) The Panel agreed to include 8 mm diameter bar in Table 3 of IS 3370 (Part 2).
 - 3) The Panel agreed to add the sentence on tension stiffening of concrete 'Tension stiffening shall not be more than 60 percent of the strain in steel'.

- 4) The Panel agreed to delete the clause on partial fixity from IS 3370 Part 2 as it is given in more details in IS 3370 (Part 4).
- 5) The Panel decided to refer the comment to CED 2:2/P5 Panel on revision of IS 456 for consideration.
- 6) The Panel suggested no change required in the clause on enhancement due to shear in IS 3370 (Part 2).

In view of the above, the Panel suggested that the above recommendations along with the comments shall be referred to CED 2:2/P5 for further consideration and acceptance.

ITEM 4 ISSUES RELATED TO EXISTING PARTS OF IS 3370

4.1 IS 3370 Part 2 Concrete Structures for Retaining Aqueous Liquids — Code of Practice Part 2 Plain and Reinforced Concrete (Second Revision)

The Panel considered the comments from Shri L. K. Jain and suggested Prof M N Shariff (IIT Bombay) to review the proposal related to temperature shrinkage reinforcement and redistribution of bending moments in line with crack width calculations. The updated draft amendments from Shri L. K. Jain for inclusion of provisions in relation to redistribution of moments, temperature shrinkage reinforcement and shell structures in water tanks to IS 3370 Part 2 will be considered in the next meeting of the Panel.

4.2 Proposal for amendment to IS 3370 Part 4 Section 3 Concrete Structures for Retaining Aqueous Liquids — Code of Practice Part 4 Design Tables Section 3 Circular tanks (*First Revision*)

The Panel considered the comments from Shri L K Jain to use centreline dimensions in case of circular and rectangular tanks instead of clear dimensions as the same will cater to the linear distribution of pressure in the thickness of the tank. In this regard, the Panel requested to BIS secretariat to prepare the draft amendment on IS 3370 Part 4 Section 3 which can be tabled in the next meeting.

Item 5 ANY OTHER BUSINESS

There being no other item to discuss, the meeting ended with thanks to all.
