

Newsletter of the Indian Association of Structural Engineers July 2019

Message from the President



Dear Members,

Work has started on the preparation of guideline and commentary, including worked examples for three codes (i,e. IRC code on "Loads & Load Combinations" (IRC:6), BIS code on Wind Loads (IS:875 (Part-3)) and BIS code on ductile design and detailing of RCC structures subjected to seismic loading (IS:13920) by some of the expert panels in IAStructE. We have received many queries, suggestions and clarifications from the members in these codes, which is under active consideration of the expert panels, and which will help us to prepare the guidelines. We hope that with the publication of these documents, the

structural engineering fraternity will have better grip on the codes and will ensure better compliance of the codal provisions in structures designed by them.

The association is now gearing-up for organising a refresher courses on "New seismic design guideline for seismic design of road bridges" (IRC:SP:114), which is planned to commence in the month of August 2019. Another refresher course on "Performance-based design of buildings and bridges" is going to commence in the month of September 2019. We are also planning for an international seminar on "Structural Design for Enhanced Seismic Resilience—Non-Linear Approach for Buildings & Bridges".

It is heartening to note that the present Governing Council members are taking active role in capacity building exercise and in shaping the future of young structural engineers. Our future as structural engineers is likely to be very exciting and challenging as society grapples with some of humanity's most pressing needs: the effects of climate change, migration, increasing urbanisation and automation. The Governing Council looks forward to receive feedback from the members of the association regarding their expectations from the association and also to know whether they are able to reap benefits from the association in their profession. We welcome suggestions, directions, as well as active involvement of any members in the activities of the association.

Thanks and Regards

(AlokBhowmick)

IAStructEPublication Committee

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Member Achievement

Mr Alok Bhowmick, President, IAStructE & MD, B&S Engineering Consultants Pvt. Ltd. receives CEAI National Awards 2018 for Engineering Consultancy Services

The CEAI National Awards Ceremony 2018 was held on 8th July 2019 during the GALA DINNER of ASPAC Conference held at Hotel Le Meridien, New Delhi.

The awards for the year were selected by an independent Jury headed by Mr B N Singh, Ex Member, NHAI, Dr Shilpa Paul, Professor, Delhi Technological University, and Dr M R Ravi, Professor, IIT Delhi To make the competition fair, the Committee had categorised according to the turnover of the companies.

CEAI Award for Excellence in Engineering Consultancy for Project Engineering was presented to Category A: Group 2 to B&S Engineering Consultants Pvt Ltd for the project "2 x 4 Lane Bridge over River Yamuna for Delhi-Meerut Expressway". Er. AlokBhowmickand his team received the award.



Technical Lectures and Webinars

CEAI Webinar on "Quality Assurance for Structural Engineering Firms - Challenges Ahead"

A webinar on the topic "Quality Assurance for Structural Engineering Firms - Challenges Ahead" was organized by CEAI on 07 June 2019. Mr AlokBhowmick, President IAStructE delivered the presentation. Mr Bhowmick in his presentation highlighted the components of a model QA program and review of various procedures, tips, techniques and strategies for conducting in -house quality assurance reviews on structural design & drawings. 38 participants attended the webinar.

Technical Lecture on "Seismic Design of Buildings: A performance-based concept"

Technical Lecture by Dr. DiptiRanjanSahoo, Associate Professor, Civil Engineering Department, IIT Delhi on the topic "Seismic Design of Buildings: A performance-based concept" organized on 25th July 2019 at New Delhi. Dr Sahoo in his presentation highlighted the concept of performance-based seismic design and its practical applications. The numerical modelling techniques as well as analysis methods were also discussed. About 65 participants attended the lecture.





IAStructE Code of Ethics

The code of Ethics for an organization like IAStructE is the very foundation on which its members build their professional reputation and interaction with the society at large.

The Code of Ethics of IAStructE is a Guideline that is largely based on self-regulation. Nevertheless, it is always good to be reminded of the path structural Engineers must take in their work so that ethics becomes an integral part and feature of our professional efforts.

With this in view the code of Ethics of IAStructE is reproduced below.

IAStructE Code of Ethics

Indian Association of Structural Engineers recognizes that the role of Structural engineers is significant in the society to ensure structural safety and to achieve a more sustainable built environment.

To be fully effective not only must Structural engineers constantly improve their knowledge and skills, but also society must respect their integrity and trust the judgment of members of the profession and remunerate them fairly.

As an association of Structural Engineers, IAStructE firmly believes that following principles are fundamental to the behavior of their members if society is to have that necessary confidence in Structural Engineers as its Trusted Advisors.

1. RESPONSIBILITY TO SOCIETY

The Member shall:

Accept the responsibility of the Structural Engineering profession to society.

Seek solutions that are compatible with the principles of Structural safety, serviceability, durability and sustainable development.

At all times uphold the dignity, standing and reputation of the Structural Engineering profession.

2. COMPETENCE

The Member shall:

Maintain knowledge and skills at levels consistent with development in technology, legislation and management, and apply due skill, care and diligence in the services rendered to the client / employer. Perform services only when competent to perform them.

3. INTEGRITY

The Member shall:

Act at all times in the legitimate interest of the Project and provide all services with integrity and faithfulness.

4. IMPARTIALITY

The Member shall:

Be impartial in the provision of professional advice, judgment or decision.

Inform the client / employer of any potential conflict of interest that might arise in the performance of services to the client / employer.

Not accept remuneration which prejudices independent judgment.

5. FAIRNESS TO OTHERS

The Member shall:

Promote the concept of "Quality-Based Selection" (QBS).

Neither carelessly nor intentionally do anything to injure the reputation or business of others.

Neither directly nor indirectly attempt to take the place of another fellow engineer, already appointed for a specific work.

Not take over the work of another fellow engineer before notifying the fellow engineer in question, and without being advised in writing by the client / employer of the termination of the prior appointment for that work.

In the event of being asked to review the work of another, behave in accordance with appropriate conduct and courtesy.

6. CORRUPTION

The Member shall act with zero tolerance for bribery, fraud and corruption and neither offer nor accept remuneration of any kind which in perception or in effect either:

seeks to influence the process of selection

or seeks to influence their compensation

or seeks to affect the engineer's impartial judgment.

Member shall co-operate fully with any legitimately constituted investigative body which makes inquiry into the administration of any contract for services or construction.

Forthcoming events

Technical Lecture on "Field test and Simulation of large diameter vertical loaded pile in residual soils"

The monthly Technical Lecture on the topic "Field test and Simulation of Large Diameter Vertical Loaded Pile in Residual soils' by Dr. Naveen B.P, Associate Professor, Civil Engineering Department, Amity School of Engineering & Technology will be held on 22nd August 2019 at 05:30 PM at CDC, India Habitat Centre, Lodhi Road, New Delhi. The details shall be announced shortly.

Refresher Course on IRC:SP:114 at New Delhi

IAStructE is organizing Refresher Course on "Application of New Seismic Code for Highway Bridges - IRC:SP:114-2018" starting from 24th August 2019, which will be concluded on 28th September 2019. The lectures will be held on every Saturday morning from 9.00 AM to 01.15 PM at PHD Chamber of Commerce & Industry, PHD House, 4/2 Siri Institutional Area, August Kranti Marg, New Delhi 110016. Course participation fee shall be Rs. 7,500/- for IAStructE members, Rs.10,000/- for non-members and Rs 5,000/- for Students. The GST @ 18% will be applicable on the Registration fee. In view of limited seats, please send your nomination at the earliest possible. Please note that the registration shall be done on first come first serve basis. For any clarification please contact Mr. VikasVerma, Manager IAStructE, Tel: 011-45794829, Email: iastructe@gmail.com. Please click the following link for downloading the Announcement, Flier & Lecture schedule http://iastructe.co.in/Announcement.pdf

Refresher Course on performance Based Design for Buildings & Bridges

IAStructE is organizing Refresher Course on "Refresher course on Performance Based Design for Buildings & Bridges" which shall be starting from 14th September 2019 at New Delhi. Details shall be announced shortly.

Call for articles

The Chairman and other members of the SED Editorial Board invite article contributions for the quarterly journal of the Indian Association of Structural Engineers, the Structural Engineering Digest.

Write to iastructe@gmail.com for

- Journal subscription
- Article Submission
- Sponsored Advertisement

Deadline for submission in next issue:

1st September 2019

Submission template and ethics statement can be availed by emailing <u>iastructe@gmail.com</u>.

Call for advertisement in Newsletter

The association invites sponsored advertisement for the IAStructE newsletter. The rates for advertisement in the IAStructE monthly Newsletter are as follows:

Half page Rs. 7,000/- per issue, 10% rebate for quarterly, 20% rebate for half yearly and 30% rebate for yearly booking.

Full page Rs. 10,000 per issue, 10% rebate for quarterly, 20% rebate for half yearly and 30% rebate for yearly booking.

(Kindly note that the GST @ 18% shall be payable on reverse charge)

Featured Article: Building collapse - a point of view

Dongri Building Collapse in Mumbai

(Reference: NDTV News)

According to the World Economic forum, Mumbai is world's second most crowded city (after Dhaka, Bangladesh). Building safety has been reportedly a concern in the city. The city's municipal corporation had identified close to 500 buildings under "dangerous" category in May 2019.

The building collapse in south Mumbai's crowded Dongri neighborhood that happened recently (July 16th 2019, Tuesday) has apparently caused death of twelve people. The neighborhood has many such dilapidated buildings with narrow lanes for access and was flooded due to heavy rains this month.

The collapse was classified to fall under Category II incident (with Category I being most severe) under the severity measurement system for building collapse. The building was also reported to be almost 100 years old. The personnel of the National Disaster Response Force (NDRF) aided in the rescue operations.



Although permission for redevelopment had been given, the same had been delayed due to some reasons. Dwellers of the neighborhood seem to have reported their interest in repairing the other buildings at their own cost and have also expressed that they encountered delays in permissions from the municipal corporations for carrying out the necessary operations.

The incident of grief sparks the discussion on the many problems associated with building collapses in India and reignites the need for us to act at the scale of urgency, severity and mass of such situations that can be predicted. The underlying issues: (a) durability concerns of old buildings (b) national classification and categorization system for all buildings (c)frequency of structural audits (d) need for structural health assessment and monitoring (e) need for appropriate repair and restoration techniques (f)legal and permission procedures (g) narrow accesses and other challenges of existing brownfield development (h) safety audits (i) appropriate rescue procedures (j) management and clearance of debris and(k) awareness of citizens and professionals involved; are being discussed at multiple segmented forums but there is need for integrated national level discussion on understanding and combating building collapse issues. A database inventory of all buildings in India (similar to the Indian bridge management system (IBMS) by NHAI) is required to be set up, activated and enforced. Maybe, the Ministry of housing and urban affairs, GoI should consider declaring year 2020 as *Year for building safety*. Maybe, the IAStructE team can contribute to avoiding such accidents and national loss through necessary initiatives and legislations.



The article is prepared by Er. Anal Sheth, member of IAStructE and just expresses her point of view on building collapse incidents reported now and then in India. The article is open to response on the newsletter forum and further discussion by readers of the newsletter.

New IAStructE members

"MEMBER" Grade Members

M/S No	Name	Designation, Organization	City
M-278	Mr. Satyam Kumar	Sr. Engineer, McDermott International	Gurgaon
M-279	Mr. Ambavaram Hari Krishna	Sr. Structural Engineer, McDermott International	Gurgaon
M-280	Mr. DhrumilKamleshbhai Parikh	Joint Director & Project Manager (Bridge Dept.) Multi Media Consultants Pvt Ltd	Ahmedabad

"ASSOCIATE MEMBER" Grade Members

M/S No	Name			Designation, Organization	City
AM-287	Mr. Kalashe	Ramesh etty	D.	Consulting Structural Engineer	Gulbarga (Karnataka)

About IAStructE

The Indian Association of Structural Engineers (IAStructE) is the national apex body of structural engineers in India established with the objective to cater to the overall professional needs of structural engineers. The association has become the source of expertise and information concerning all issues that involve structural engineering and public safety within the built environment. It has no commercial aim or objective. IAStructE is purely a professional learned society with the prime objective of supporting and protecting the profession of structural engineering by upholding professional standards and acting as a mouthpiece for structural engineers. IAStructE endeavors to ensure that its members develop the necessary skill in structural engineering and work to the highest standards by maintaining a commitment to professional ethics and standards within structural engineering. IAStructE strives for continued technical excellence; advancing safety and innovation across the built environment. It also strives to make available to the Government, Public Sector and Private Sector - a credible source of well qualified and experienced Structural Engineers. A nationwide database of Structural Engineers has been compiled and is being constantly updated. IAStructE undertakes a broad range of technical activities which are aimed at information sharing and capacity building. The association provides opportunity for all the members to develop various skills in structural engineering and helps members to be at the forefront of structural engineering practice. Towards achievement of its aims and objectives, IAStructE is engaged in organizing the following: CPD Courses for Professionals at all levels Refresher Courses for Fresh Graduate Engineers, Student's orientation program, Seminars/Workshops, Technical Lectures by Experts, Technical Discussions on Contentious Issues. IAStructE is currently operating from four regional centers. These regional centers located in the Eastern, Western, Northern and Southern parts of the country effectively cater to the professional needs of members residing/practicing all over the country.

How to become a member?

Membership form and details are available at http://www.iastructe.co.in/membership-form.html
For membership information and other details contact the Indian Association of Structural Engineers Secretariat.

Membership Benefits

Membership of IAStructE is a sought after professional accreditation. Your membership of IAStructE can help you enhance your intellectual, academic, technical and professional status. It provides inter connectivity to the fellow professionals and the fraternity. Some of the benefits of membership is provided below:

- ↓ Complimentary magazine subscription: All members (except Student Members) receive a complimentary subscription to the Institution's flagship publication 'Structural Engineering Digest' (SED). Published quarterly, each issue allows members to remain connected to the association through the provision of technical papers, Industry and Institution News, Featured articles, Professional Guidance on everyday matters affecting the practicing structural engineers. [Released]
- ♣ Access to all Technical Lectures, organized every month, at no charge
- Access to Technical Discussions held regularly
- Access to the association's library (Including e-library)
- ♣ Discounts in attending Seminars and Workshops organized by the association
- ≠ Full on-line access to the current volume and entire e-archive of journal "Structural Engineering Digest (SED)", Refresher Course Materials, Technical Lectures E-Newsletters and other Technical Resources of the Association.
- ♣ Opportunity to network with professional structural engineers of eminence and to meet potential employers in the association.
- ♣ Opportunities for professional development

IAStructE Secretariat

Indian Association of Structural Engineers

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