



Commitment, Reliability & Quality

# Safe

Volume III / 2019, Issue 65

ITD CEMENTATION INDIA LIMITED

# Sites

A Periodical on "Safety in Construction"

## Pen Point

Almost 14 lakh houses in India are now 'green'. India has already achieved Green building footprint of 6.33 billion sq.ft. and now has an ambitious target of having 10 billion sq.ft. by 2022. It is expected to increase the green footprint by around 10%.

Green Buildings are becoming an integral part of rapidly developing India. Since last few years, green buildings have taken the front seat in many government initiatives like Smart Cities Mission, Pradhan Mantri Awas Yojana (PMAY) and Atal Mission for Rejuvenation and Urban Transformation (AMRUT). Construction sector in India has taken note of the benefits of going green and hence many famous green buildings have been built in the country over the last decade.

Here's a list of buildings that have led the way on India's road to achieving sustainable growth and energy-efficient in construction sector. *Suzlon One Earth, Pune; CII-Sohrabji Godrej Green Business Centre, Hyderabad; ITC Maurya, New Delhi; Jawaharlal Nehru Bhawan, New Delhi; ITC Green Centre, Gurgaon; Infinity Benchmark, Kolkata.*

The list of green buildings in India looks promising but there is still a long way to go. Real estate developers and consumers need to be educated about the massive benefits of green buildings. Government and regulatory bodies need to play a motivating role to enable consumers as well as developers to understand the need for green buildings in India. To know more on its criteria requirement, we have included an article on Page-3&4 of this issue of Safe sites.

We have already printed and communicated our revised IMS Policy in English and Hindi. As agreed we have translated this Policy in to six other languages so that the contents of the Policy could be communicated to local workers in a better way.

Pravin Panchal

## Winners of NSC Award - 2018 (Maharashtra Chapter)



Sr. No.	Project Name	Awards Received
1	Bhamra Water Supply Scheme (35715 BS) (Div-2)	Certificate and Plaque for Lowest Average Accident Frequency Rate Certificate and Plaque for Longest Accident Free Period
2	JSW Dolvi, Pen Raigad (35615 CF) (Div-3)	Certificate of Merit for Good EHS Performance
3	Pune Satara Road (21811 BR) (Div-2)	Certificate of Merit for Good EHS Performance



Pune Satara & Dolvi Projects received "Certificate of Merit"

**"Our Commitment, Safe & Green Environment"**

## Safety Professionals Training – 2019

To further enhance the Safety Culture, this year Safety Professionals Training was conducted at five locations (Mumbai, Kolkata, Nagpur, Bangalore & Udangudi) covering 104 Permanent & 22 Project based EHS staff. Training was done on topics like Objective & Targets of the Company & Dept. Emphasis was given on Methodology & HIRA preparation as under ISO 45001:2018. Keeping in view the increasing number of Metro & Marine Projects a special OH&S module was included for Working on Live Roads & Marine Works. To strengthen the Material Handling a Technical training on Rigging Safety was also included. To sharpen the skills of EHS professionals, a topic on Incident Investigation & Reporting as under Company Procedure (P-24) was covered.

Interaction with Senior Management at each location was done. Selected EHS Professionals were made to present on identified topics to improve their Presentation Skills. EHS Quiz was conducted amongst the participants to check the effectiveness of the training and winners of the Safety Quiz were awarded.



*Inaugural address by Mr. Jayanta Basu (Managing Director) to EHS team at Mumbai Office, Vile Parle*



*Safety Professionals Training at Kolkata Area Depot (KAD), Jangalpur, Kolkata*



*Mr. Tarun Singharoy addressing Safety Professionals at Bangalore Metro Projects.*



*Mr. Gautam Basuroy, Mr. Kaushik Nandi & Mr. Theodore Paul distributed prizes to the winners of EHS Quiz at Udangudi Project*



*Safety Professionals Group during Training at Nagpur Metro Project*



*Group photo during Safety Professionals Training at Udangudi Tangedco, Tamilnadu Project*

***“Fire Easy to Prevent, Difficult to Control”***



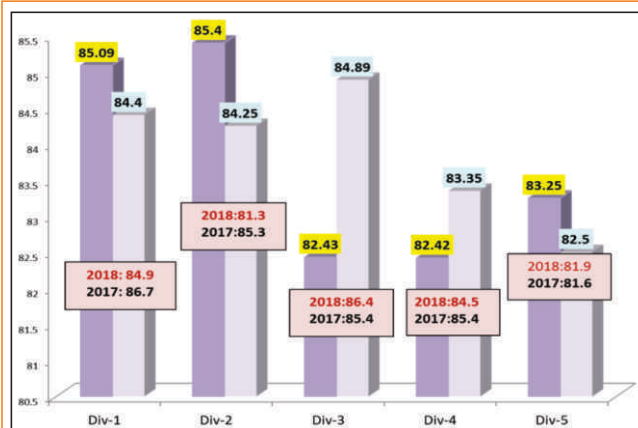
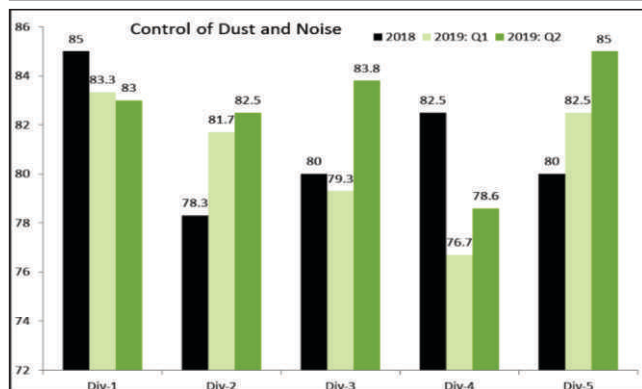
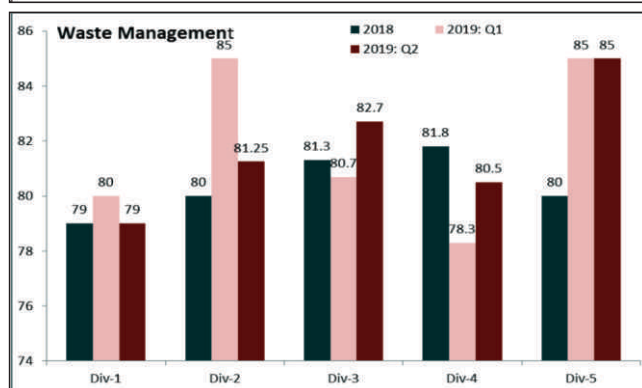
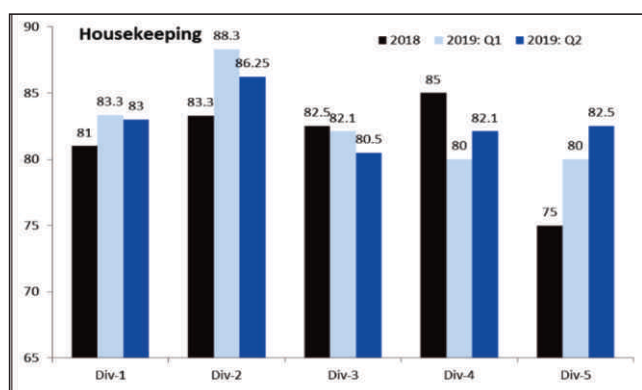
## Customer Feedback (Corporate Objective)

We, at ITD Cementation India Ltd, monitor customer's perception of the degree to which their needs and expectations have been fulfilled. It is one of our Corporate Objectives and it is collected from the customers on Quarterly basis in the prescribed format (SR-10). The result of Customer feedback analysis of Quarter-wise performance and parameters wise performance is shown in the graphical manner.

Improvement Programs for increasing awareness on sites in form of-Training Module, Inspection Checklist (SCL-12) and Posters were prepared and implemented. Trainings were conducted at projects. Close Monitoring is a part of the action plan and the results on three following identified areas are depicted in the form of graphs

- House Keeping,
- Waste Management &
- Control of Dust and Noise

Q1: 83.74 Q2: 84.07



We seek whole hearted support from all the project sites to achieve the target of 85.37% set for 2019-20

*"A Brand is defined by Customer 's experience...  
the Experience is delivered by the Employees "*

Shep Hyken

Chhavi Upadhyaya

## Green Building Requirements

There are three primary rating systems in India such as GRIHA, IGBC and BEE. Let's understand GRIHA (Green Rating for Integrated Habitat Assessment) Rating system.

GRIHA rating system was developed by The Energy and Resource Institute (TERI) in the year 2006, with an objective of having minimum detrimental impact on the environment by the construction sector. It is a five star rating system (five star being the highest rating), which evaluates a building out of 100 points over 33 criteria (Refer Table-1) focusing on sustainable site planning, design optimization, energy efficiency, sustainable building materials, water and waste management and occupational health and comfort. The GRIHA Tool, by its qualitative and quantitative assessment rates a building on the degree of its 'greenness'. The performance of the building is assessed against certain nationally acceptable benchmarks, over its entire life cycle, thereby providing a definitive standard for what constitute a 'Green Building'. Given its inherent relevance to the Indian context, in the year 2007, it was endorsed by the Ministry of New and Renewable Energy, Government of India as national rating system for green building of India.

In GRIHA, eight of these 33 criteria are mandatory, six are partly mandatory and rest are optional. Out of these eight mandatory criteria, the following one of the Criteria is Reduce Air Pollution during construction. A project failing to demonstrate compliance with these mandatory criteria, at any given point during the entire project implementation phase, will be rendered disqualified for the rating system.

Contd. on Page.4

**"Unsafe Menu, Accident Venue"**

## Green Building Requirements

**Table No. 1: GRIHA Criteria**

Sr. No.	Description	Points	Discipline
1	Site Selection*	1	Architecture
2	Preserve and protect landscape during construction/ compensatory depository forestation*	4	Architecture & Landscape Designing
3	Soil Conservation (Post Construction)#	2	Civil Engineering & Landscape Designing
4	Design to include existing site features#	4	Architecture & Civil Engineering
5	Reduce hard paving on site*	2	Architecture
6	Enhance outdoor lighting system efficiency *	1	Electrical Engineering
7	Plan utility efficiently and optimize on-site circulation efficiency#	3	Architecture Civil, Mechanical, Plumbing & Electrical Engineering
8	Provide minimum level of sanitation/safety facilities for construction workers@	2	Architecture & Engineering
9	Reduce Air Pollution during construction@	2	Architecture & Engineering
10	Reduce Landscape water demand#	3	Landscape Designing
11	Reduce Building water use*	2	Civil Engineering
12	Efficient water use during construction#	1	Civil Engineering
13	Optimize building design to reduce conventional energy demand@	8	Architecture Civil Engineering
14	Optimize energy performance of the building with specified comfort limits@	16	Architecture & Civil Engineering
15	Utilization of fly ash in building structures	6	Civil Engineering
16	Reduce embodied energy of the construction is reduced by adopting material efficient technologies and /or low-energy materials#	4	Civil Engineering

Sr. No.	Description	Points	Discipline
17	Use of low-energy materials in interiors #	4	Architecture Interior Designing
18	Renewable Energy Utilization *	8	Electrical Engineering
19	Renewable energy based hot water system#	3	Electrical Engineering
20	Waste water treatments#	2	Plumbing Engineering
21	Water recycle and reuse (Including rainwater)#	5	Plumbing Engineering
22	Reduction in waste during construction#	1	Civil Engineering & Facility Management
23	Efficient Waste segregation#	1	
24	Storage and disposal of waste#	1	
25	Resource recovery from waste#	2	
26	Use of Low-VOC Paints/adhesives/ sealants#	3	Architecture Interior Designing
27	Ensure Water Quality@	2	Civil Engineering & Plumbing Engineering
28	Minimize Ozone depleting substances@	1	Electrical Engineering
29	Acceptable Indoor and Outdoor noise levels#	2	Architecture & Acoustical Engineering
30	Tobacco and smoke control#	1	Civil & Mechanical Engineering
31	Provide at least the minimum level of accessibility for person with disabilities#	1	Architecture & Civil Engineering
32	Energy Audit and Validation@	-	Electrical Engineering
33	Operation and Maintenance@	2	Facility Management
<b>Sub Total</b>		<b>100</b>	
<b>Innovation Points</b>		<b>4</b>	
<b>Total</b>		<b>104</b>	

Note: (\* Partly Mandatory # Optional @ Mandatory)

Presently we are following requirements for "GRIHA" Certification at our Pune & Trichy Airport projects and Indian Green Building Council "IGBC" Certification at our Mumbai & Nagpur Metro Projects.

### Conclusion:

Green Building rating system such as 'GRIHA' attempts to address this segment in a holistic way such that the project proponents are more responsive towards Environment as well as Welfare needs of the workers.

Nilesh Penkar

**"Conserve Environmental Resources"**