



Swami Keshvanand Institute of Technology,
Management & Gramothan, Jaipur



A
Report
on
Five-day Faculty Development Program
“Ecological and Eco-efficient Construction Practices”
held
on
17th - 21st January 2022

Organized by:

Department of Civil Engineering, SKIT M&G, Jaipur
In collaboration with
Indian Green Building Council (IGBC) & Indian Concrete
Institute (ICI)

Brochure of the Event

<p>FDP COMMITTEE</p> <p>PATRONS Sh. Raja Ram Meel, Patron, SKIT Sh. Surja Ram Meel, Chairman, SKIT</p> <p>ADVISORS Sh. Jaipal Meel, Director, SKIT Dr. S.L. Surana, Director (Acad.), SKIT Ms. Rachna Meel, Registrar, SKIT Dr. Ramesh Kumar Pachar, Principal, SKIT Dr. R.K. Jain, Dean, SKIT Dr. Mukesh Arora, HOD- ECE Dr. Mukesh Kumar Gupta, HOD- CE Dr. Anil Choudhary, HOD- IT Dr. Dheeraj Joshi, HOD- ME Dr. Dhanraj Chitara, HOD- EE Dr. D.K. Sharma, HOD- CE Dr. Ona Ladiwal, HOD- MBA Dr. Rohit Mukherjee, Incharge - B. Tech 1 Year Dr. Anshu Shrivastava, Head- Mathematics Dr. Sharda Soni, Head- Chemistry Dr. Neha Purohit, Head- English Dr. Brajraj Sharma, Head- Physics Mr. Jaini Uberoi, Chairman- IGBC Jaipur Chapter Mr. Mahesh Singhal, Chairman- ICI RSC</p> <p>COORDINATORS Dr. Abhishek Jain, Assistant Prof., CE Dept. Ms. Pooja Jain, Assistant Prof. and Dy. Head, CE Dept. Mr. Rakesh Choudhary, Assistant Prof., CE Dept.</p> <p>ORGANIZING COMMITTEE Dr. B.L. Sharma Ms. Priyanka Gupta Dr. Bharathi M. Dr. Kishan Lal Jain Dr. Prachi Kushwaha Dr. Sunita Tolani Mr. Ajay Mandrawalia Mr. Akash Johari Mr. Anirudh Mathur Mr. Ankur Mishra Mr. Deepak Sharma Mr. Gaurav Gupta Mr. Jetendra B Jangid Mr. Mannohan Sharma Mr. Nikhil K. Sharma Mr. Nishant Sachdeva Mr. Rajkumar Chotia Mr. Sitaram Saini Mr. Vikas Vyas</p>	<p>REGISTRATION</p> <p>5 – Day Faculty Development Program on “Ecological and Eco-efficient Construction Practices” January 17th – 21st, 2022</p> <p>To join the FDP, you need to register by clicking on the registration link or scanning the QR Code: https://forms.gle/apyEftQaZBfXZv16</p>  <p>Note:</p> <ul style="list-style-type: none"> The FDP will be conducted through online platform Cisco Webex or Google Meet. Link to join the session will be provided on participant's registered mail id. E-Certificate will be provided to those participants whose attendance will be satisfactory with assignment and feedback submitted. <p>CONTACT US</p> <p>Dr. Abhishek Jain Email: abhishek.jain@skit.ac.in; 8058170872</p> <p>Ms. Pooja Jain Email: pooja.jain@skit.ac.in; 9694909018</p> <p>Mr. Rakesh Choudhary Email: rakesh.choudhary@skit.ac.in; 9667001388</p>	 <p>Department of Civil Engineering Swami Keshvanand Institute of Technology, Management & Gramothan, Jaipur (www.skit.ac.in) is organising</p> <p>5 – Day Faculty Development Program On “Ecological and Eco-efficient Construction Practices” (January 17th – 21st, 2022)</p>  <p>In Collaboration with</p>   <p>Indian Green Building Council (IGBC) Indian Concrete Institute (ICI)</p>
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<p>RAJASTHAN TECHNICAL UNIVERSITY Rajasthan Technical University (RTU) is located in Kota in the state of Rajasthan. It was established in 2006 by the Government of Rajasthan to enhance technical education in the state. The university currently affiliates about 68 Engineering Colleges, 3 B.Arch., 16 MCA Colleges, 39 MBA Colleges, 31 M. Tech. Colleges and 01 Hotel Management and Catering institutes. The University aims to provide quality technical education which may help Rajasthan in its technical development and will boost technical environment in the country.</p> <p>ABOUT SKIT Swami Keshvanand Institute of Technology, Management & Gramothan (SKIT) is Ranked No.1 (Fifth consecutive year) Engineering College in Rajasthan declared by Rajasthan Technical University (RTU), Kota. SKIT is a selective comprehensive institution offering undergraduate and postgraduate programmes in Engineering and Management. The institute was established in the year 2000 by a team of committed professionals and academicians. During all the past years SKIT has emerged as a premier center of technical education not only in Rajasthan but also in northern India which has been realized through efficient and dedicated faculty members, innovative teaching learning methods, state of the art infrastructures and core value of discipline. The various undergraduate programmes of the institute are accredited by the National Board of Accreditation (NBA).</p> <p>DEPARTMENT OF CIVIL ENGINEERING The Department offers UG program in Civil Engineering and PG program in Transportation Engineering. The Vision of the department is “to become a discipline of excellence that promotes higher learning and advanced technology to meet current and future challenges of Civil Engineering industry”. The department has grown tremendously over the years and has established all the laboratories providing necessary infrastructure for various research projects. The department has active</p>	<p>student chapters of Indian Concrete Institute (ICI) and Indian Green Building Council (IGBC). The department also provides consultancy services to the government and non-government agencies. Many alumni of the department are working at prestigious positions in various organizations of repute.</p> <p>Department is also recognized as “Centre of Excellence” in “Transportation Research” by Rajasthan Technical University, Kota.</p> <p>ABOUT THE FDP The FDP is designed to bring researchers, academia and technocrats from different parts of the country to a common platform for exchanging and sharing the recent developments in construction industry. Experts from prestigious institutions, research agencies and industries will deliver sessions in this program. Experts will elaborate their knowledge by sharing their research work and case studies. Some of the topics to be covered in this FDP are:</p> <ul style="list-style-type: none"> Sustainable construction practices Reduce, recycle and reuse Sustainable construction products Application of drone technology in construction Carbonation curing and low-energy cement Construction project management practices <p>ELIGIBILITY CRITERIA The FDP is interdisciplinary and is open for all faculty members from various institutions.</p> <p>REGISTRATION FEE There is no registration fee for the FDP.</p>	<p>RESOURCE PERSONS</p> <p>Prof. O P Chhangani, Vice Chancellor, Apex University</p> <p>Prof. Sandeep Chaudhary, IIT Indore</p> <p>Mr. Sandeep Narang, Senior Consultant- Sustainable Construction, New Delhi</p> <p>Dr. Trilok Gupta, Associate Prof, CTAE, Udaipur</p> <p>Er. Vinod Garg, Director, Promac Advisors Pvt. Ltd.</p> <p>Dr. Raju Sharma, Post-doctoral researcher, Incheon National University, South Korea</p> <p>Er. Sunil Nandipati, Asst. Prof, GITAM University, Visakhapatnam</p> <p>Ms. Rekha Mavulati, Counsellor, IGBC</p> <p>Dr. Vivek Gupta, Asst. Prof, Thapar University, Punjab</p> <p>Er. Rohit, Director, Texel Consulting Engineers Pvt. Ltd.</p> <p>Note:</p> <ul style="list-style-type: none"> The final schedule of the FDP will be shared before the event. Session Timings: <ul style="list-style-type: none"> Session I = 9:30 AM – 11:00 AM Session II = 12:00 PM – 1:30 PM
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Schedule of the Event





**SWAMI KESHVANAND INSTITUTE OF TECHNOLOGY,
MANAGEMENT & GRAMOTHAN**

Department of Civil Engineering

Organising
5 – Day Faculty Development Programme
on
“Ecological and Eco-efficient Construction Practices (EECP – 2022)”
In collaboration with IGBC and ICI
TENTATIVE SCHEDULE AND TOPICS

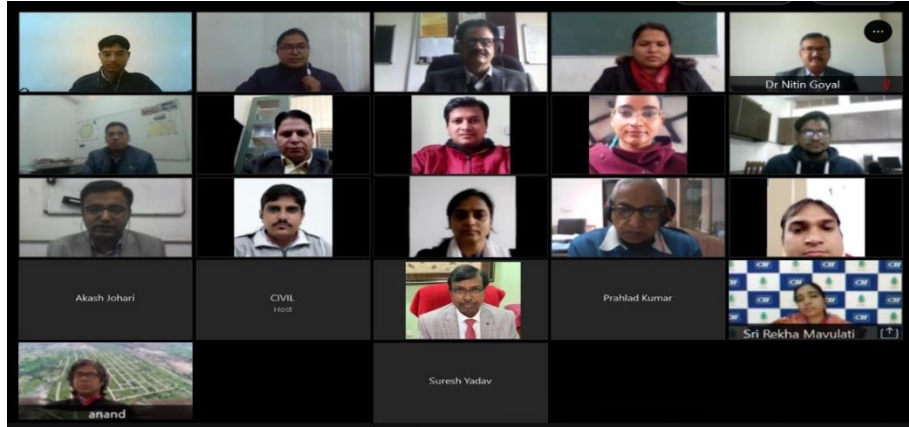
January 17 th , 2022 (Monday)	
09:00 AM to 09:30 AM	Inaugural Session
09:30 AM to 11:00 AM	<i>“Green Buildings – Benefits & Impacts”</i> Ms. Sri Rekha Mavulati, Counsellor, IGBC
12:00 PM to 01:30 PM	<i>“Sustainable construction practices for Repair and Rehabilitation”</i> Er. Rohit, Director, Texel Consulting Engineers Pvt. Ltd.
January 18 th , 2022 (Tuesday)	
09:30 AM to 11:00 AM	<i>“Sustainable Bricks”</i> Dr. Vivek Gupta, Assistant Professor, Thapar Institute, Patiala, Punjab
12:00 PM to 01:30 PM	<i>“IS Codes for Construction Project Management”</i> Er. Vinod Garg, Director, Promac Advisors Pvt. Ltd.
January 19 th , 2022 (Wednesday)	
09:30 AM to 11:00 AM	<i>“Utilization of Plastic and Rubber Waste in Road Construction”</i> Dr. Trilok Gupta, Associate Professor, CTAE, Udaipur
12:00 PM to 01:30 PM	<i>“Challenges in Civil Engineering Profession in Construction and Sustainable Development”</i> Prof. O P Chhangani, Vice Chancellor, Apex University
January 20 th , 2022 (Thursday)	
09:30 AM to 11:00 AM	<i>“Sustainable Construction Practices”</i> Mr. Sandeep Narang, Senior Consultant, New Delhi
12:00 PM to 01:30 PM	<i>“Applications of Drone Technology in Construction Industry”</i> Er. Sunil Nandipati, Assistant Professor, GITAM University, Visakhapatnam
January 21 st , 2022 (Friday)	
09:30 AM to 11:00 AM	<i>“Accelerated carbonation curing and low-energy cement”</i> Dr. Raju Sharma, Post-Doctoral Researcher, Incheon National University, South Korea
12:00 PM to 01:30 PM	<i>“Sustainable Construction Products”</i> Prof. Sandeep Chaudhary, IIT Indore
01:30 PM to 01:45 PM	Valedictory Ceremony

Regards,
Organising Team (EECP-2022)

List of Invited Guests and Speakers

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01:30 PM to 01:45 PM	Valedictory Ceremony

Photographs/Screenshots of the Event:



A Report on Five-day Faculty Development Program 6

The screenshot shows a Zoom meeting interface with a presentation slide. The slide title is "Key aspects for unfired bricks". The content is a flowchart showing the process from raw material characterization to a hardened product. The flowchart includes boxes for "Raw material characterization", "Design mix" (with sub-points: Binder, Mix proportions, Liquid content), "Mixing strategy" (with sub-points: Mixing sequence, Mixing time, Mixing equipment), "Compaction strategy" (with sub-points: Vibration, Compression, Self-compaction), "Green bricks/blocks", "Curing technique" (with sub-points: Curing time, Curing medium (air / water/ moist), Curing parameters (temperature /pressure/humidity)), "Sales check" (with sub-points: Cost, Production cycle, Product handling, Social acceptance), "Hardened product", and "Technical check" (with sub-points: Physical properties, Mechanical properties, Durability properties). At the bottom of the slide, there is a citation: "Gupta V, Chai H K, Lu Y, Chaudhary S. A state of the art review to enhance the industrial scale waste utilization in sustainable unfired bricks. Constr Build Mater. 2020;254:119220." The Zoom interface shows participants: Dr. Abhishek Jain, Dr. Vivek Gupta, Pooja Jain, Akash Johari, and Ankur Mishra.

The screenshot shows a Zoom meeting interface with a presentation slide. The slide is for a book titled "PRACTICAL PROJECT MANAGEMENT" by Rtn Vinod Garg. The slide includes the book cover, a "THANKS" message, and a "Q&A" section. The Zoom interface shows participants: Ashish Nayyar and Vinod Garg. The Zoom interface also shows a menu with options: File, Edit, Share, View, Audio & Video, Participant, Event, Help.

Swami Keshvanand Institute of Technology Management & Gramothan
Ramnagar, Jagatpura, Jaipur-302 017, Rajasthan, India

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Dr. Abhishek Jain Me | **Trilok Gupta** | Pooja Jain | Prof. D. K. Sharma | Ankur Mishra | Layout

Viewing Trilok Gupta's screen

Types of Concrete Pavement

- Jointed Plain Concrete Pavement (JPCP)
- Jointed Reinforced Concrete Pavement (JRCP)
- Continuously Reinforced Concrete Pavement (CRCP)

om prakesh chhangaru | Pooja Jain | Ankur Mishra | Layout

Viewing Challenges for ...

• Thank you for bearing with me

• Remain Environmental Friendly!

Navigation arrows: Play, Previous

File Edit Share View Audio & Video Participant Event Help

Dr. Abhishek Jain Me | **Sandeep Narang** | Pooja Jain | Ankur Mishra | Bharathi M | Layout

Viewing Sandeep Narang's a...

Mulch Carpets

Pin it

Media Coverage

एस.के.आई.टी. में पांच दिवसीय फैकल्टी डेवलपमेंट प्रोग्राम का उद्घाटन

300 से अधिक फैकल्टी सदस्यों ने कराया पंजीकरण



बढ़ता राजस्थान

जयपुर। एसकेआईटी जयपुर के डिपार्टमेंट ऑफ सिविल इंजीनियरिंग ने आईजीवीसी और आईसीआई के सहयोग से आयोजित इकोलॉजिकल एंड इको-एफिसिएंट कंस्ट्रक्शन प्रैक्टिस पर पांच दिवसीय फैकल्टी डेवलपमेंट प्रोग्राम का सोमवार, दिनांक 17 जनवरी 2022 को उद्घाटन हुआ। डॉ. नितिन गोयल (प्रिंसिपल साइंटिस्ट एंड इंजीनियर, सीएसआईआर-नोरी, मुंबई) कार्यक्रम के मुख्य अतिथि थे। उन्होंने सस्टेनेबल प्रैक्टिस की उपयोगिता के बारे में जानकारी दी।

आनंद मिश्रा (को-चेयर, आईजीवीसी जयपुर और मैनेजिंग डायरेक्टर, त्रिमूर्ति कोलॉनिजेशन प्राइवेट लिमिटेड) ने आईजीवीसी द्वारा की जा रही सस्टेनेबल कंस्ट्रक्शन योजनाओं के बारे में जानकारी दी। मोहेश सिंघल (चेयरमैन, आईसीआई-आरएसी) ने आईसीआई द्वारा की जा रही सस्टेनेबल प्रैक्टिस योजनाओं के बारे में जानकारी दी। प्रो. एस. एल. सुराणा (डायरेक्टर-एकेडेमिक्स) ने अतिथियों और प्रतिभागियों का स्वागत किया और एसकेआईटी की उपलब्धियों के बारे में बताया। प्रो. डी. के. शर्मा (प्रमुख-सिविल

इंजीनियरिंग) ने प्रतिभागियों को प्रोग्राम के बारे में जानकारी दी। डॉ. भारती एस. ने धन्यवाद प्रस्ताव दिया। इस अवसर पर कार्यक्रम के संयोजक डॉ. अभिषेक जैन, पूजा जैन, राकेश चौधरी और विभाग के अन्य फैकल्टी सदस्य भी उपस्थित थे। इस कार्यक्रम के आगामी दिनों में उद्योग, शिक्षाविदों और अनुसन्धान संस्थानों के 10 प्रख्यात वक्ता अपने ज्ञान और अनुभवों को साझा करेंगे। इस कार्यक्रम के लिए भारत भर के विभिन्न शैक्षणिक संस्थानों के 300 से अधिक फैकल्टी सदस्यों ने पंजीकरण कराया।



एस.के.आई.टी. में पांच दिवसीय फैकल्टी डेवलपमेंट प्रोग्राम का समापन

P3 Police Public Politics जयपुर ! एसकेआईटी जयपुर के डिपार्टमेंट ऑफ सिविल इंजीनियरिंग ने आईजीवीसी और आईसीआई के सहयोग से आयोजित इकोलॉजिकल एंड इको-एफिसिएंट कंस्ट्रक्शन प्रैक्टिस पर पांच दिवसीय फैकल्टी डेवलपमेंट प्रोग्राम का शुक्रवार, दिनांक 21 जनवरी 2022 को समापन हुआ। श्री जैमनी उबेरोय (अध्यक्ष, आईजीवीसी जयपुर चैटर) ने इस आयोजन के समापन समारोह में

अपने बहुमूल्य विचार अभिव्यक्त किए। उन्होंने आयोजन के विषय की सराहना की और सस्टेनेबल प्रैक्टिस के महत्व के बारे में चर्चा की। कार्यक्रम का संचालन पूजा जैन एवं राकेश चौधरी ने किया। कार्यक्रम की तकनीकी रिपोर्ट डॉ. अभिषेक जैन ने प्रस्तुत की। प्रो. डी. के. शर्मा (प्रमुख - सिविल इंजीनियरिंग) ने सभी प्रतिभागियों को धन्यवाद ज्ञापित किया और सभी समन्वयकों और संकाय सदस्यों को इस

आयोजन की शानदार सफलता के लिए बधाई दी। इस आयोजन में भारत भर के विभिन्न शैक्षणिक संस्थानों के 150 से अधिक संकाय सदस्यों ने सक्रिय रूप से भाग लिया। उद्योग, शिक्षाविदों और अनुसन्धान संस्थानों के प्रख्यात वक्ताओं ने आयोजन के दौरान अपने ज्ञान और अनुभवों को साझा किया। सभी वक्ताओं ने प्रतिभागियों को टिकाऊ निर्माण उत्पादों के उत्पादन के लिए विभिन्न तकनीकों के बारे में बताया।

Valedictory ceremony @ SKIT

CITY FIRST

An online 5-day faculty development programme on "Ecological and Eco-efficient Construction Practices (EECP-2022)" organised by the Department of Civil Engineering, SKIT M&G, Jaipur in collaboration with IGBC & ICI witnessed its valedictory ceremony on Friday. Jaimni Uberoi (Chairman, IGBC Jaipur Chapter) delivered their valuable words in the val-



edictory ceremony of this event. He appreciated the theme of the event and discussed the importance of sustainable practices. Pooja Jain and Rakesh Choudhary

facilitated the Programme. More than 150 faculty members from various educational institutes across India have actively participated in the event.

cityfirst@firstindia.co.in

Technical Report

5-day Faculty Development Programme on “**Ecological and Eco-efficient Construction Practices (EECP- 2022)**” organized by Department of Civil Engineering, SKIT M&G, Jaipur in collaboration with Indian Green Building Council (IGBC) and Indian Concrete Institute (ICI) from 17th to 21st January 2021. Dr. Nitin Goyal (Principal Scientist and In-charge, CSIR-NEERI, Mumbai) was the chief guest of the inaugural session of this event. He explained about the importance of sustainable practices. Mr. Anand Mishra (Co-Chair, IGBC Jaipur & Managing Director, Trimurti Colonizers Pvt. Ltd.) informed about the various initiatives of IGBC for sustainable construction. Mr. Mahesh Singhal (Chairman, ICI-RSC) informed about the various initiatives of ICI for sustainable practices. Prof. S. L. Surana (Director – Academics) welcomed the guests and participants. Prof. D. K. Sharma (Head – Civil Engineering) briefed the audience about the FDP. Dr. Bharathi M. delivered a vote of thanks. Ten eminent speakers from industry, academics and research institutions shared their knowledge and experiences during the course of event. I would like to thank all the experts for accepting out invitation and delivering wonderful session. More than 350 faculty members from various educational institutes across India have registered for the event.

On Day 1, first session was delivered by Ms. Sri Rekha Mavulati (Counsellor, IGBC). she discussed the benefits of green building construction and their impacts on environments. Second session of the day was taken up by Er. Rohit (Director-TeXel Consulting Engineers Pvt. Ltd.). He explained the various techniques for the repair and rehabilitation of construction activities.

On Day 2, first session was delivered by Dr. Vivek Gupta (Assistant Professor- Thapar University, Patiala, Punjab). He enlightened the participants about the development of sustainable bricks. Characterization methods for various industrial ashes were also explained. Second session of the day was taken up by Er. Vinod Garg (Director, Promac Advisors Pvt. Ltd.). He explained about IS codes 15883 guidelines and their various parts for the construction project management.

On Day 3, In session 1, Dr. Trilok Gupta (Associate Professor, CTAE, Udaipur) discussed in detail about the utilization of plastic and rubber waste in road construction. Second session of the

day was conducted by Prof. O P Chhangani (Vice Chancellor, Apex University). He discussed the challenges in civil engineering profession in construction and sustainable development.

Day 4 started with session of Mr. Sandeep Narang (Senior Consultant, New Delhi). He briefed the participants about the various sustainable construction practices in civil engineering and impact of construction activity on the surrounding climate. He also told the audience about that this is one of the emerging topics and more research is required in this sector. In second session Er. Sunil Nandipati (Assistant Professor, GITAM University, Vishakhapatnam) delivered a session on the applications of drone technology in construction industry.

First session of Day 5 was delivered by Dr. Raju Sharma (Post-Doctoral Researcher, Incheon National University, South Korea). He briefed the participants about accelerated carbonation curing & low-energy cement and also discussed various schemes and criteria to achieve sustainable development goals. Last session of the FDP was delivered by Prof. Sandeep Chaudhary (IIT Indore) on “sustainable construction products”. He discussed the various techniques to produce sustainable building products.

The discussed areas are of great benefit for the participants as they are enlightened with the most widely used techniques to produce sustainable building products.

13. **Objective and Outcome of the event**

Objectives

- To disseminate knowledge on sustainable construction practices.
- To encourage faculty members and scholars to go for ecological and eco-efficient construction practices.

Outcomes

The participants of the FDP will be able to understand the various techniques to produce sustainable construction products. This FDP will bring a positive transformation in the faculty member's attitude in their project and research works and get them more focused on the sustainable development of construction products.

---Thank You-----