

DESIGN BRIEF



GRIHA



ZEMCH



VSPARC

launching

SHAPE

(Sustainable Habitats Associating People with Environment)

A design competition

#LetsSHAPEit

For more information

GRIHA Council
Core 1B, 3rd floor, IHC Complex,
Lodhi Road New Delhi, 110 003

Tel: (+91 11) 2468 2100

E-mail: info@grihaindia.org

Fax: (+91 11) 2468 2144, 2468 2145

Web www.grihaindia.org



About the Organising Parties

GRIHA Council – Green Rating for Integrated Habitat Assessment

GRIHA Council (registered under the Societies Registration Act, 1860) is an independent society developed for the promotion and adoption of sustainable habitats in the Indian subcontinent. It was established in the year 2007 with the combined efforts of the Ministry of New and Renewable Energy (MNRE), Government of India and The Energy and Resources Institute (TERI) to develop the GRIHA rating system, which is suited to the Indian climate and to promote green buildings in the country.

GRIHA is a green building rating tool that helps in assessing the environmental impact of buildings. It evaluates parameters of energy efficiency, water management, waste management, daylight integration, indoor comfort, life cycle analysis & costing (LCA & LCC), etc. thereby providing a definitive standard for what constitutes a 'green building'. GRIHA Council has received accolades and recognition in the spheres such as energy efficiency, site planning, and conservation and efficient utilisation of resources. India, in its Intended Nationally Determined Contributions (INDC) document submitted at COP 21 in Paris has highlighted GRIHA as an indigenous green building rating system developed in India; and the United Nations Framework Convention on Climate Change (UNFCCC) in their third biennial update report on India has acknowledged the work done by GRIHA in the field of carbon mitigation in the building sector.

School of Architecture (V-SPARC), Vellore Institute of Technology (VIT), Vellore

Vellore Institute of Technology (VIT) was founded in 1984 as Vellore Engineering College by Hon'ble Chancellor Dr. G. Viswanathan. University status was conferred in 2001 by MHRD, Govt. of India in recognition of its excellence in academics, research and extracurricular initiatives.

The School of Architecture (V-SPARC), established in 2015, embarked on its journey with the inaugural class of 40 students; now expanded to 80 B.Arch and 20 M. Arch students. The program's core mission is to prepare students for real-world challenges, achieved through immersive workshops and interactions with industry professionals, emphasising skill development.

In pursuit of its vision, the V-SPARC School of Architecture actively engages in international collaborations for academic and research activities, fostering a global perspective in its students and enabling them to contribute responsibly to the changing needs of the natural and built environment.

Zero Energy Mass Custom Home Network (ZEMCH)

ZEMCH Network was established with the aim to enhance industry-academia R&D collaborations on the delivery of zero energy mass custom homes in developed and developing countries. It was established in 2010 after a number of international industry-academia collaborative study tours were organised in order to observe the state-of-the-art



production and sales facilities of leading low to zero energy or carbon dioxide emission sustainable housing manufacturers in Japan, which also practise inclusive design. Anyone related to construction business and research can join the network. The ZEMCH network aims to tackle issues arising in the delivery of socially, economically, environmentally and humanly sustainable built environments in developed and developing countries, which accommodate people with different socio-economic backgrounds that relate to ages and abilities.

ZEMCH International Conference 2024

The ZEMCH International Conference convenes leading minds to advance socially conscious, ecologically regenerative models of architecture and development. The focus is on zero energy mass customization, where energy efficiency effortlessly integrates with personalised living spaces that not only preserve resources but also reflect the specific preferences and demands of its occupants.

School of Architecture – V-SPARC, VIT is the hosting institution of the 11th ZEMCH International Conference which is scheduled to be held during 8-9 November 2024. It is a gathering of minds dedicated to ushering in the next phase of sustainable living. The purpose of this conference is to discover the next generation of revolutionary approaches and cutting-edge technologies that will reinvent the fundamental core of sustainable design and building.



Brief: SHAPE - design competition

GRIHA Council, V-SPARC and ZEMCH Network are organising SHAPE (Sustainable Habitats Associating People with Environment) - a design competition for practising architects inviting entries to showcase their projects under various categories as mentioned below. The contest aims to bring together sustainably designed and executed projects to exhibit and exchange design ideas promoting the association of humans with the environment. The mission statement of the contest would be to explore the following:

- **Integrated approach:** Showcase integration of design, technology, and imagination to create habitats that are as unique as their inhabitants.
- **Self-sufficiency:** Execute design to advance sustainable habitats for a greener, more resilient future; and have a net-zero approach with a focus on optimising resource utilisation.
- **Innovation:** Explore ways to integrate innovative strategies to promote low impact design.

Categories: The design entries will be open for the following categories:

- Hospitality
- Institutional
- Residential
 - Stand-alone
 - Group housing
- Commercial
 - Retail
 - Offices

Areas of Assessment

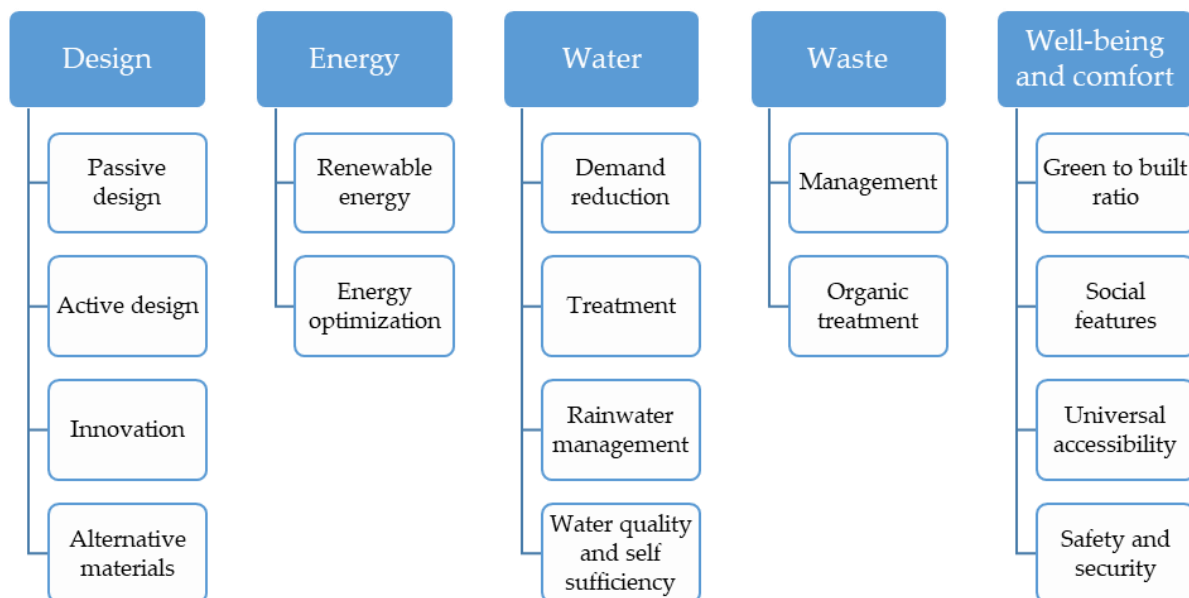
Areas under which the projects will be evaluated are as follows:

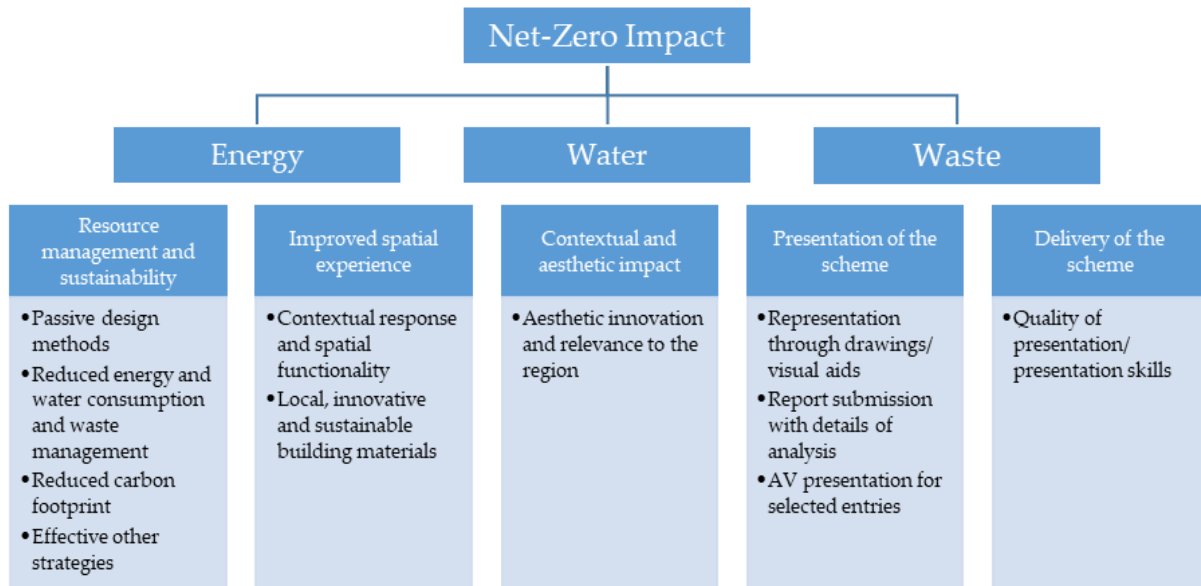
1. Passive strategies for reducing solar heat gain into the building and enhancing thermal comfort. For colder climates, the projects can showcase heat gain into the spaces to enhance thermal comfort.
2. Design strategies for reducing building energy consumption through integration of renewable energy systems in the project.
3. Strategies for reducing water demand in the projects; and utilisation of rainwater and recycled water in the building, site and systems.
4. Strategies for waste management on site in order to reduce load on landfill.
5. Design, integration of materials and methods to reduce the project's carbon footprint.
6. Strategies for improving comfort (visual, thermal and acoustic) in the project.
7. Addressing socio-economic factors of a built project like well-being, universal accessibility, safety and security, and environmental awareness.
8. Design to integrate into the existing contextual conditions responding to the natural and built environment.
9. Architectural quality and aesthetic impact with regard to space, spatial sequences and movement.
10. Innovation in design for enhanced building performance.

Submission Requirements

1. Design development highlighting an iterative approach and integration of strategies, highlighting the climate responsive and passive/ active features of the design.
2. Design concept highlighting energy, water and waste management strategies showcasing the approach towards self-sufficiency.
3. Concept highlighting strategies for improving occupant comfort and wellbeing, universal accessibility security and environmental awareness.
4. Area statement with break up area areas, highlighting spatial zoning diagrams.
5. The submission should include
 - a. Site plan
 - b. Floor Plans, Elevations and Sections
 - c. Views / photographs
 - d. Simulation results showcasing analysis of any strategies adopted for low environmental impact (optional, but weightage will be given to projects)

Evaluation Criteria





Evaluation Format

STAGE 1: First round of online Submission and e-Jury

- The design entries will be submitted online and will undergo the process of evaluation by an esteemed jury panel comprising professionals from the sustainable design industry.
- Top 3 entries from each category will be shortlisted for the final round, which will be held during the conference and in-person.
- A PDF file of maximum file size of 25MB should be uploaded (sheets should not be pixelated). The project should be presented on a maximum of FIVE A1 (594 X 841 mm) sheets.

Note: Scale of the drawings is at the discretion of the participating individuals. All entries must be prepared using metric units of measurement.

STAGE 2: Final round

- Shortlisted entries from the first round will present their design in front of the jury in the final round for evaluation during the conference.
- This will be a presentation with interaction from the panel.
- A maximum of two participants per entry will be allowed to give the AV presentation.
- Time given for the short-listed entries shall not exceed 15 minutes.

General Guidelines

- Participation in the contest is on an individual basis/ practising architectural firms.
- The designs submitted should be original and should be designed by the participant.
- Registrations and submissions should be done by the participants in the ZEMCH 2024 VIT Vellore India website before the deadline.
- All text should be in English.

- All sheets shall have the title of “SHAPE Design Competition 2024” clearly mentioned on them.
- Submitted entries should not mention/print/stick their name or firm name, firm logo or any other identifying mark. Such identifications shall lead to cancellation of entry.
- The sheets should bear the VIT and GRIHA logos on the right -hand bottom corner.
- The entries should not contain information on any misconduct such as exposing identity through the firm name/stamp, participant(s) name will be DISQUALIFIED.

Important Dates

DETAILS	TENTATIVE DATES
Release of brief	5 June 2024
Registrations open	5 June 2024
Early bird registrations deadline	30 June 2024
Registrations deadline	31 July 2024
Submission deadline	31 August 2024
Shortlisting of entries	30 September 2024
Final round	7 November 2024
Announcement of results	7 November 2024
Felicitation	7 November 2024

Registration Fees

- Early bird registrations:
 - National participants - INR 3,000 + 18% GST
 - International participants – 100 USD (Including GST)

- Regular registrations:
 - National participants - INR 5,000 + 18% GST
 - International participants – 150 USD (Including GST)

Prize money and GRIHA trophy

For Winners of each category: Prize Money + Trophy + Certificate

For Special Mention: Trophy + Certificate