

JURY PANEL:

Prof. Neelkanth Chhaya, Ahmedabad

Ranjit Gupta, Principal Architect, Interdesign, Kolkata

Dr. Amit Hajela, Principal Architect, Neev, Delhi

Benny Kuriakuse, Chennai

Dr. H S Gill, Executive Director, HUDCO-HSML, New Delhi

Dr. S K Agarwal, BMTPC, New Delhi

Dr. Umesh Sharma, Civil Engineering, IIT Roorkee

Eligibility:

Any Student pursuing B.Arch/ B.E/ B.Tech/ B.Plan or equivalent, or M.Arch/ M.E./ M.Tech/ M.Plan or equivalent in any Indian Institute duly recognised by competent authority can join the Competition. Maximum 4 such students can join together to form Student Competition Team. Each Team Member shall submit their valid student ID duly certified by their respective schools. Students from different Institutes can form the Team. Each Team need to register for the competition by sending the followings:

- Name and affiliation of each Team members with photo ID
- Bonafide certificate for team members from respective Institutes
- DD of Rs. 500/ in favour of Dean SRIC, IIT Roorkee

Prize Money:

First Prize : 75,000 INR
Second Prize : 50,000 INR
Third prize : 25,000 INR

Important Dates:

- Launch of the NSDC Competition: 25th March '17
- Last Date for Registration: 25th April '17
- Last date for submitting the entries: 1st June '17
- Declaration of Shortlisted entries : 10th June '17
- NSDC event: 22nd and 23rd July '17.

Coordination Team

Students:

Saksham Goel
Preetpal Singh
Venkatesh Babu
Aditya Rahul

Faculty

Dr.Mahua Mukharjee,
Coordinator

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DESIGN INNOVATIONS for HOUSING FOR ALL

NATIONAL STUDENT DESIGN COMPETITION

The Housing for All (HFA) is a long sought after goal for India and it has come as a central government scheme, named as Pradhan Mantri Awas Yojana (PMAY), aiming to achieve affordable 'housing for all' (HFA). Under the mission of HFA, by 2022, India needs to construct 34 million houses in urban area for urban poor. The market supply for low income housing is very less (15% as estimated) in comparison to the requirement (96% total shortage) showing a dichotomy of supply vs demand. Considering this incrementality, and supply-demand mismatch of the housing shortage challenge especially for low and mid income people, India requires a radical change in housing delivery system to generate substantial housing stock in a faster speed. National Housing and Habitat Policy'1998 and National Urban Housing and Habitat Policy'2007 mentioned the necessity of a faster housing supply system to fill up the demand-supply gap for the low-income category housing.

The recent trend of developing market driven housing unit for low income people is a mentionable improvement in India though the quantity is not sufficient enough in comparison to shortage. More supply of housing units using new and innovative technology is capable of mitigating the housing shortage for low income people. Considering this massive task, a Technology Sub-mission, under PMAY, has been envisaged by the government to explore the alternative and innovative technologies in housing supply to achieve time & cost economy, safety and resiliency. Government of India has identified several potential technologies which are developed fully/partially and capable of mass and industrialized construction of houses in shorter time keeping quality within the affordability. It is important to assess the current practice of housing in every state and geo climatic region to enumerate the scope of each new technology and its design interface. The focus of this National Student Design Competition is 'DESIGN INNOVATIONS FOR HOUSING FOR ALL' as a response to meet the long-term target of the HFA.

Organised by:



Indian Institute of
Technology, Roorkee

Supported by:



Ministry of Housing and
Urban Poverty Alleviation

The Process:

The Student teams are required to identify any one residential neighbourhood that is in transformation located within their geographical region/ state. The selected site should ideally have been in contact with the ever-changing pressures from urbanisation processes from nearby urban areas especially in the phase of rapid urbanisation process. The selected area for the neighbourhood study is expected to be within 5 acres. Any of the following contexts may be considered in the selection of the site.

- a. Climate responsive Housing
- b. Relocation and Resettlement
- c. Slum Upgradation / Redevelopment
- d. Urban Renewal (Housing)
- e. Housing in Suburban areas
- f. Urban villages
- g. Rural housing
- h. Incremental housing
- i. Affordable Housing
- j. Inclusive housing for special needs
- k. Housing for Refugees/Asylums

After identifying the appropriate site for study, there are two components to meet for formal submission requirements.

1. **Documentation and Research:** Document the characteristics of the residential neighbourhood of today and yesterday; and search shall answer to the following queries: How the transformation process is addressing the dimension of 'ALL'?

How new innovations and interventions in the building and spatial practices have given new meanings to 'Housing for All' in the contemporary context?

How communities have responded or adapted to such new innovations and interventions into the built environments.

Through such processes, what has been accepted, adapted modified, rejected, or even reused and recycled?

2. **Design Innovations:** After having a thorough documentation and research, the student groups should be able to identify a potential built /open space within the documented settlement or in the site which is to be considered under proposal of any development scheme. In the selected site/built/open space they shall be able to propose possible 'Design Intervention' which is well integrated with the five dimensions of 'Housing for All', and easily adapted with contemporary development context. Proposals could range from the design of a product to built form and may even can extend to a public place in the context of housing. If incrementality is being thought of, then phases for construction and its corresponding activities shall be defined.

Submission Requirements:

Submissions shall be accepted in any of the following (combination) formats: Drawings, sketches, photographs, model, multimedia presentations, reporting on interviews with local people and factual evidences. However, the representation of documentation, research and design innovation / ideas should be explicitly communicated. The softcopy format of the entries are accepted through email. The registered themes will be receiving the format and guidelines for submission.

Theme

The Theme for the NSDC 2017 is 'DESIGN INNOVATIONS FOR HOUSING FOR ALL'. The need for adequate and appropriate shelter for all along with basic services is more urgent than ever particularly for developing countries like India. Habitat in India is a function of sociocultural and regional diversity, though the stratification has always been on economic criterion wherein the livability has been defined by affordability. This Design Competition defines this diversity through 'ALL' in the following five dimensions as the central theme to guide :

1. Accessible to All diverse abled users, age groups, and gender groups
2. Affordable to All including the low income groups and economic weaker sections
3. Adaptable in All Seasons in a particular geo-climatic region including hazard resistant construction
4. Attractive places for All including diverse social groups, local communities
5. Adoption of All possible appropriate emerging technologies to promote speedier construction without compromising structural & functional performance.

In addition, the dimension of incrementality need to be considered while selecting the Project for intervention. Incrementality is key to housing development in the developing nations which could be as a consequence of increase in family size, opportunity for rental income or evolving affordable conditions over a period of time. This concept resonated in the work of Pritzker prize winning architect Alejandro Aravena's project -The Quinta Monroy Housing in Chile. Housing tends to serve as a catalyst for a change in socio-cultural milieu and also aids in economic development and lays foundation for a life of dignity. By investing in homes, people in particular the economically weaker sections, urban poor and the low income groups accumulate equity that can be used as collateral, making them more credit worthy for accessing finance through normal channels and also as a resource for income.

Selection Criteria:

Competency of the competition entries will be evaluated by a Panel of Jury; and it will be based on (a) research and documentation process, quality and analysis; and (b) merit of design proposals addressing the five important principles i.e. Accessibility, Affordability, Adaptability and Attractive Places to Live-in, and Adoption of All possible appropriate emerging technologies to promote speedier construction.

Shortlisted Teams will be required to present their entries in front of the Jury Panel in IIT Roorkee for the final round. Two members of these shortlisted Teams will be receiving travel support from their home Institutes in second class. Their boarding and lodging will be arranged by the Organizing Team.

On conclusion of the activity, copies of all design entries in soft format be submitted to MoHUPA for reference. Also, the winning design entries will be uploaded on IIT Roorkee, MoHUPA, HUDCO-HSMI and BMTPC websites.