

SDB 1, Infosys Limited, Hyderabad

 Location
 : Hyderabad

 Site area
 : 64,806.92 m²

 Built-up area
 : 24,730 m²

 Air-conditioned area
 : 17,338 m²

 Non-Air-conditioned area
 : 7,392 m²

Energy consumption reduction : 56% reduction from GRIHA benchmark

Water consumption reduction : 56% reduction from GRIHA benchmark

PI: 51.85 kWh/SqM/year

Occupancy hours : 8.5 hrs/day
Renewable energy installed on site : 44 KWp
GRIHA rating : 5 Stars

The following strategies were adopted to reduce the impact of the proposed building on natural environment:

Sustainable site planning:

- Existing trees were preserved and native trees were planted on site
- . Excavation and construction started after the monsoon season to prevent soil erosion and soil runoff from the site
- Top soil was preserved and reused during the construction period for landscaping
- · Construction activities were confined to pre-designated areas

Reduction in water consumption (compared to GRIHA benchmark):

- Reduction in building water consumption by use of low-flow fixtures: 56%
- Water recycled and reused within the complex: 78%
- Reduction in landscape water consumption by planting native species of trees and shrubs and by using efficient irrigation systems: 53%

Passive architectural design strategies adopted in the building:

- The building's longer axis is oriented on the East West axis in order to reduce solar heat gain
- 78.54% of living areas are day-lit and window to wall ratio restricted to less than 38% to reduce solar heat gain inside
 the building
- Natural ventilation induced in the building

Reduction in energy consumption (compared to GRIHA benchmark) while maintaining occupant comfort:

- · For achieving visual comfort
- Energy-efficient artificial lighting design is compliant with ECBC recommendations
- Occupancy sensors in rooms to reduce energy consumption
- External shading and efficient glazing to reduce solar heat gain and have glare-free daylight have been installed
- For achieving thermal comfort
- Building envelope is ECBC compliant, which helps reduce cooling loads in AC spaces and meets thermal comfort levels in non-AC spaces
- Radiant cooling technology has been installed
- External shading and light shelves to cut glare and reduce solar heat gain

Renewable energy technologies installed on site:

· Installed capacity of Solar energy: 44 KWp

Use of low-energy/green materials:

- Use of ceramic tiles and carpets with recycled content
- Use of low energy material for internal partitions, paneling, false ceiling, and in-built furniture

Integrated Design Team:

Project Owner : Infosys Limited
Project Head Infrastructure : Rohan M Parikh

Principal Architect : Sundaram Architects Pvt Ltd

Landscape Architect : M/s MASTERPLAN Landscape Architects

Green Facilitation : AECOM