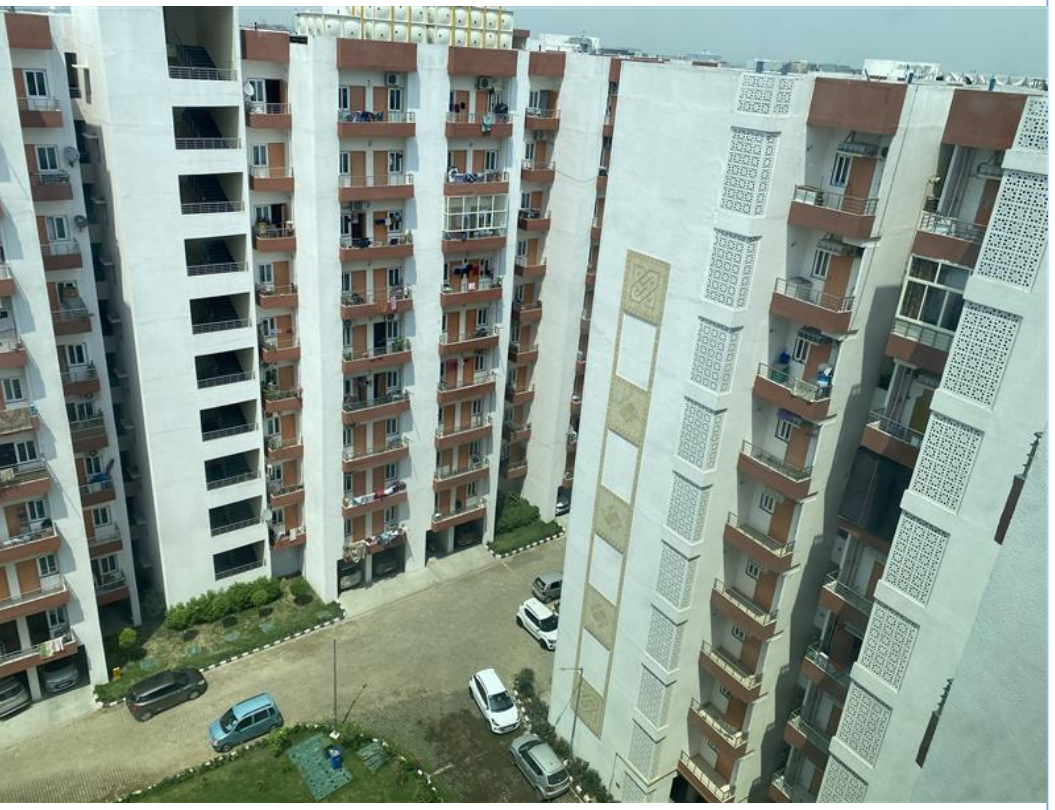
Residential Colony at Thyagraj Nagar, New Delhi

GRIHA

★★★☆☆

3 STAR



Location	: New Delhi
Site Area	: 47,773.60 sq.m.
Built up Area	: 59,526.50 sq.m.
Typology	: Residential
Rating	: GRIHA Provisional Rating
Category	: Version 2015
Version	: 2026
Year of Award Client	: CPWD
Principal Architect	: BB Vats
Green Building Consultant	: Passive Design Consultants

The following strategies were adopted by the project team to reduce the building impact on the environment:

Sustainable Site Planning:

- Air pollution control measures such as site barricading, wheel washing facility and other appropriate measures were strictly adhered to during construction.
- 425 new trees of native species were planted within the campus.

Energy:

- EPI reduction of 33.21% from the GRIHA base case has been demonstrated through the integration of high-performance systems.

Occupant Comfort:

- 78.80% of the regularly occupied spaces are day-lit and meet the daylight factor as prescribed by NBC 2005.
- Low-VOC paint, containing less than 50 g/L of volatile organic compounds and free from lead, has been utilized in the project.

Water Management:

- Reduction of 57% from the GRIHA base case has been demonstrated in the building water demand by installing efficient low-flow fixtures.
- Reduction of 46.23% in landscape water demand from the GRIHA base case has been achieved through the plantation of native trees and shrubs.
- Membrane Bio Reactor (MBR) –based STP with a capacity of 340 KLD was installed in the project.

Sustainable Building Materials:

- Replacement of 25% of Ordinary Portland Cement (OPC) with fly ash by weight of cement in structural concrete.
- AAC blocks with 60% of fly ash content have been used for walling in the project.

Waste Management:

- Organic Waste Convertor (OWC) of capacity 500 kg/day, to convert 100% of the organic waste has been installed in the project.
- Multi-colored bins along with garbage chutes have been provided for segregation of waste.