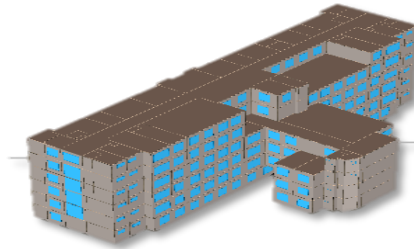


<b>Building Type</b>	: Business
<b>Climate Zone</b>	: Composite
<b>Area</b>	: 8980.2 m <sup>2</sup>
<b>WWR</b>	: 27.9%
<b>Conditioned Area</b>	: 7000 m <sup>2</sup>
<b>Occupancy Type</b>	: 8 hours
<b>ECBC Compliance</b>	: Whole building performance method - 2007
<b>Baseline EPI</b>	: 82.14 KWh/m <sup>2</sup> /year
<b>Proposed EPI</b>	: 60.18 KWh/m <sup>2</sup> /year
<b>% Energy saving</b>	: 26%
<b>Payback period</b>	: 1.59 years
<b>HVAC Specifications</b>	BEE 5 star rated split AC
<b>Piping and ductwork</b>	System Description: 20 mm thick Nitrile Rubber, R value of insulation: .35, Thickness of insulation 13 mm.
<b>Air leakage</b>	Air blower test will be adopted.
<b>Envelope Sealing</b>	Envelope is sealed, caulked, gasket or weather-stripped.

## Office of the Excise and Taxation Department (Haryana)



### PROJECT SUMMARY

Office of Excise and taxation department is six storied G+5 building located in Gurgaon. The longer axis of the building is towards north east to south west direction.

## Building Envelope

**Opaque wall** : 12 mm Plaster + 115 mm Fly ash brick + 50 mm puff insulation + 230 mm Fly Ash + 12 mm Plasters

U-value, W/m<sup>2</sup>K: 0.39 W/m<sup>2</sup>K

Assembly thickness : 419 mm

**Roof Assembly:** 8mm tiles + 50 mm

Portland cement+70 mm XPS insulation + 150mm RCC + 12 mm Cement plaster

U-value: 0.4 W/m<sup>2</sup>K

Assembly thickness : 240 mm

**Glazing type 1** :DGU( Double Glazed Unit)

U-value: 1.87 W/m<sup>2</sup>K, SHGC: 0.28, VLT: 23%

**Glazing type** : Single Glazed Unit

U-value: 5.4 W/m<sup>2</sup>K, SHGC: 0.53, VLT: 43%

**Lighting Power Density**

LPD of the proposed case is 5.5 W/m<sup>2</sup> as per Building Area method.

**Fixtures** :LED Bulbs

**Occupancy Sensors** :in corridors, toilets, offices and conference rooms

**Exterior Lighting Details**

LED Fixtures with minimum efficacy of 80 lumens/watt.