

HSBC Corporate Building Mexico D.F., Mexico



Construction Value
\$ 137 M

Schedule
September 2005 (Core and Shell)
June 2006 (Fit Out – Move in)

Area
78,655 m² – Built Area
(847,000 sqf)

Assignment
Owner Representative (Core and Shell)
Construction Manager (Fit Out)

Client
HSBC Bank



HSBC Corporate Building Tower has become one of the first buildings in Latin America to obtain certification under the international standards of sustainable construction (LEED), which means that its construction and performance are regarded as the most advanced technology in preventing negative impact in terms of environment, health and efficiency for the users. By means of an evaluation of the design process, recommendations and changes, the project reached the required qualification for the LEED Gold Level, granted by US Green Building Council).

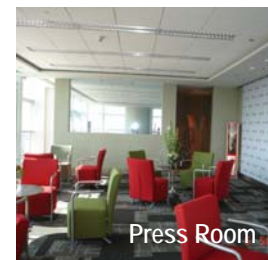
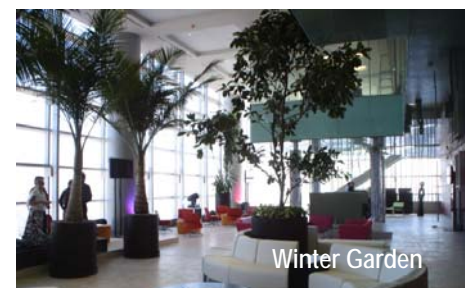
HSBC Building is located in a "landmark" area of Mexico City – the "Angel de la Independencia" (Independence Angel) – in the Paseo de la Reforma. Bovis Lend Lease provided its services as Owner's Representative during the Feasibility, Pre-construction and Core and Shell Construction stages, as well as Construction Manager for the Fit-out stage of the building.

The building has 430,556 sqf of saleable areas, distributed in 32 floors, being its total construction area approximately 860,000 sqf. It includes an IT Center, Cafeteria, a Gym for employees, an Auditorium for 400 people, meeting rooms, a pent house space for directors with a winter garden providing the best views of Mexico City, a roof garden in the parking area terrace, heliport and a parking area for 1,169 vehicles.

Bovis Lend Lease led the project team which was integrated by its own staff, HOK Studio for the façade and internal architecture, MEP consultants, BMS advisors, and the Bank areas involved (Property, Facility Management, Civil Protection, Security, IT, and the Managers of the different sections of HSBC).

Special attention was given to the specific planning of Steel Framework, Curtain Walls, Safety and Long Lead items.

The construction was completed within the scheduled time - two years – and the moving operations started on January 20th.



LEED

The building has become the largest LEED certified building in Latin America, reaching GOLD Rating. Furthermore, the green roof with 465m² is currently the largest in Latin America.

Bovis worked closely with HSBC in order to designate the appropriate strategy for achieving the desired points.

Water Conservation and Reuse

- The building saves about 5,068,794 gallons of water annually by collecting and treating storm water for cooling tower make-up and toilet flushing.
- The low flush toilets reduce the use of potable water for toilet flushing by about 61%.
- In order to manage storm water, the project's design includes a green roof and a storm water retention and treatment system.
- The project is striving to use 72.4% less water than Federal standards mandate for kitchen and bathroom fixtures.

High Performance Design

- The building uses 30% less electricity than a conventional building.
- Heat is also recovered from the HVAC condensate loop to preheat the building's domestic water.
- The building has been designed with operable windows that allow lighting control and day light dimming.
- Occupancy sensor controlled lighting is also used throughout the building.
- The cable, telephone and electrical wiring is distributed under an "access floor" which offers maximum space flexibility and low-cost layout reorganization.
- The parking garage is naturally ventilated.
- All of the HVAC systems are "ozone friendly".
- The project has specially designed exterior light fixtures to focus light where it is needed, and minimize light pollution.

Resource Conservation

- The carpet is recyclable.
- Wood furniture is certificated as "LEED" approved.

- Concrete, drywall and metal waste was recycled by the manufacturers.

Indoor Environmental Quality

- Outside air ventilation is ducted to each floor for optimal indoor air quality.
- The entire building is non-smoking.
- Low-VOC adhesives, sealants, paints and coatings were used throughout the construction.
- The project did not use any wood products, including doors, cabinetry and paneling manufactured with formaldehyde-based resins.
- A Construction IAQ Management Plan that protected HVAC system from construction dust during construction, protected materials from moisture damage and prohibited smoking in the building was implemented.

Sensitivity to the Community During Construction

- Storm sewers were covered with filter fabric and surrounded with hay bales.
- Trucks' wheels were washed before they left the site.

Challenges and Lessons Learned

- Since this was the first building pursuing LEED certification where Bovis participated in Mexico and at the same time it was a "first" for all subcontractors and trades, it was a new and challenging experience for all.
- Lessons learnt in the field and an understanding and interpretation of the LEED requirements were experiences led by the Bovis Lend Lease Team.
- Bovis Lend Lease had to police the tradesmen closely, to confirm they used only the approved no- and low-VOC products.
- Meeting the project's green performance specifications sometimes meant using new products.