

## Building Summary:

Lexington II is the luxury apartment tower built as part of the Market Square North complex in Washington D.C. With 72,000 square feet of floor area, Lexington II has 11 residential stories, a ground level with retail, and 3 below grade parking and retail stories.

### **Key Players:**

Lexington II was built by Square 407 LP, a joint venture of Gould Property Company and Boston Properties. The architecture of Lexington II was designed by Studios Architects. The structural engineer on the project was the Washington D.C. office of Thornton Thomasetti Group, formerly James Madison Cutts. Other engineers on the project include The Engineering Design Group as the MEP and The Clark Construction Group as the general contractor.

### **Architecture:**

The Lexington was designed to be exclusive apartments located in downtown Washington D.C., and to compliment the surrounding architecture. Lexington II consists of 49 individual apartment units varying between one bedroom, two bedrooms, and studio apartments. All apartments feature over sized windows, walk in closets, and spacious ceramic baths. Interiors are finished in luxury materials including Italian marble, French limestone, granite and cherry. Some apartments also feature French balconies, terraces, and bay windows. A luxurious main lobby with full concierge service is provided. A reception room is also available.

Lexington II also includes three below grade levels that are utilized as parking and retail space. The below grade levels connect Lexington II via tunnel to the rest of the Market Square North development.

### **Building Envelope and Façade:**

Lexington II has a non-load bearing exterior brick cavity wall featuring pre-cast stone trim and pre-cast concrete accents. Punched windows are in a grid like pattern along the two exposed exterior walls. The other two walls of Lexington II abut other buildings in the Market Square North complex.

A typical wall sandwich of Lexington II consists of facebrick, a 1 7/8" airspace, 15# building paper, 5/8" exterior gypsum sheathing, 3 5/8" galvanized metal studs located 16" on center, 3" batt. insulation with an R-value of 19, and a 1/2" gypsum wallboard. See appendix Figure A-1 for wall section.

A steel and glass canopy defines the entrance to Lexington II. The main entrance is a set of double glass doors opening up into a vestibule with a second set of doors leading into the lobby. The other building entrances are directly connected to adjoining buildings, the below grade parking areas, and retail spaces which opens exteriorly to the street.

The roof of Lexington II has no special features except for a mechanical penthouse that houses elevator equipment, a cooling tower, and a backup generator. Roof construction is a ballast, filter fabric, rigid insulation, separation sheet, and fluid applied

membrane waterproofing. The penthouse enclosure surrounding the backup generator is made of 2" exterior insulation and finish system (EILF), #15 building paper, 5/8" exterior gypsum sheathing, 3 5/8" metal studs 16" on center and 1/2" gypsum wallboard. The cooling tower is enclosed by 2" EILF and an 8" CMU wall. See Appendix Figure A-2 for roof sections.

**Zoning/ Site:**

Lexington II is located in downtown Washington D.C. at the corner of 8<sup>th</sup> Street and E Street, a few streets back from Pennsylvania Avenue. This location places the Lexington in Washington D.C.'s Historic Penn Quarter. Being in the Historic Penn Quarter means that the Lexington is located close to many nationally significant sites; such as the White House, Capitol Building, Mall, Smithsonian, Shakespeare Theater, and MCI Arena as well as numerous other upscale restaurants, galleries, and theaters. Being such a historically rich area, the Historic Penn Quarter was declared a national historic site on September 30, 1965 by the Secretary of the Interior. October 15, 1966 the site was added to the National Registry of Historic Places. Currently the block on which Lexington II is located is governed by the Pennsylvania Avenue Development Corporation, established on October 27, 1972.

The District of Columbia Office of Zoning has designations to the block Lexington II is located on. Found on zoning map 10, Lexington II has been given a designation of DD/C-4. DD/C-4 refers to the downtown development district and the central business district of Washington D.C. Taken from the District of Columbia Office of Zoning, regulations for DD and C-4 are as follows:

**DD – Downtown Development District**

Permits incentives and requirements for downtown sub-areas to a maximum FAR of 6.0 to 10.0, and a maximum height of one hundred-thirty feet.

**C-4**

The downtown core comprising the retail and office centers for the District of Columbia and the metropolitan area, and allows office, retail, and housing and mixed uses to a maximum lot occupancy of 100%, a maximum FAR of 8.5 to 10.0, a maximum height of 110 feet and 130 feet on 110-foot adjoining streets.

**Other systems:**

**Transportation:** The vertical transportation system of Lexington II is located in a central core of the building. Two passenger elevators operate, both traveling the entire vertical length of the building. Two stairwells also run the vertical length of the building. One stairwell terminates on the underground concourse level while the other continues to the lowest parking level.

**Mechanical:** The mechanical system for The Lexington is a water source heat pump system. This system involves the use of a boiler located in the building's basement, pumps, and a rooftop-cooling tower. The cooling tower is a 176-ton counter flow blow-thru tower. Fresh air requirements are met by operable windows in all residential units and fresh air intake units in the roof that provide 100% outside air to the corridor spaces. All residential units are equipped with kitchen, toilet, and washer/dryer exhausts.

Electrical/Lighting: Each apartment unit is provided with a voltage of 120/208V. This power is on a phase 1P 3-wire system. Located in the roof penthouse is an emergency generator. The incoming electricity is provided by a PEPCO vault located outside of The Lexington's parking levels. This incoming power is 120/280V and is 3 phase with 4 wires. Fluorescent lighting is used in both public and private spaces of Lexington II.

Fire Protection: The Lexington is provided with a 100% fully sprinklered, automatic wet and dry pipe system. This system utilizes a fire pump, jockey pump, wet pipe sprinkler system, dry pipe sprinkler system, and fire standpipe systems as its components.