

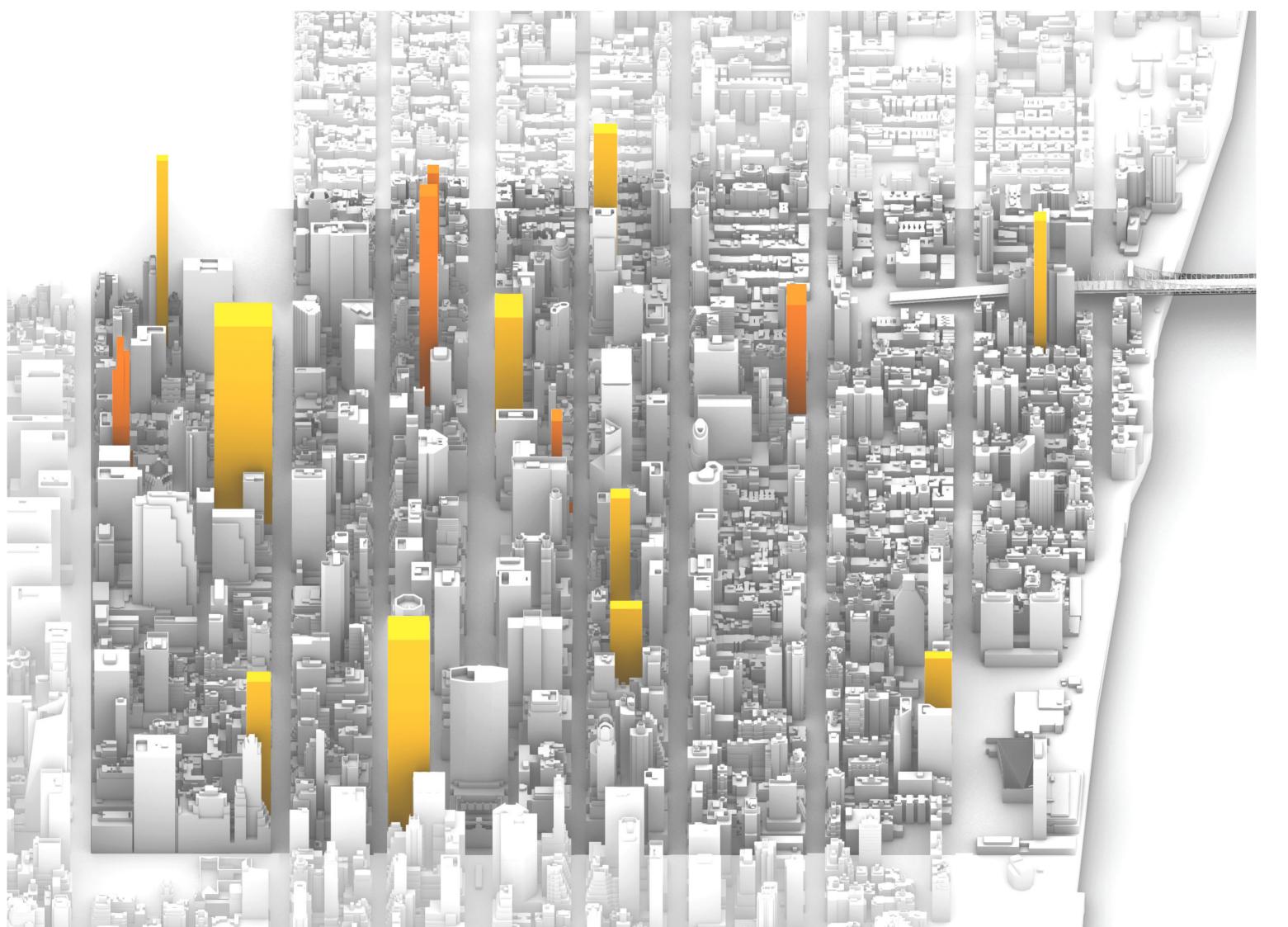
COMPLEX PROJECTS



Midtown Manhattan Group 2

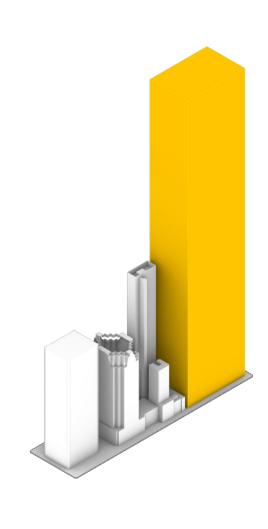


NEW BUILDINGS IN THE AREA TWO NEW SUPERTALL TYPOLOGIES (ABOVE 300 METRES)



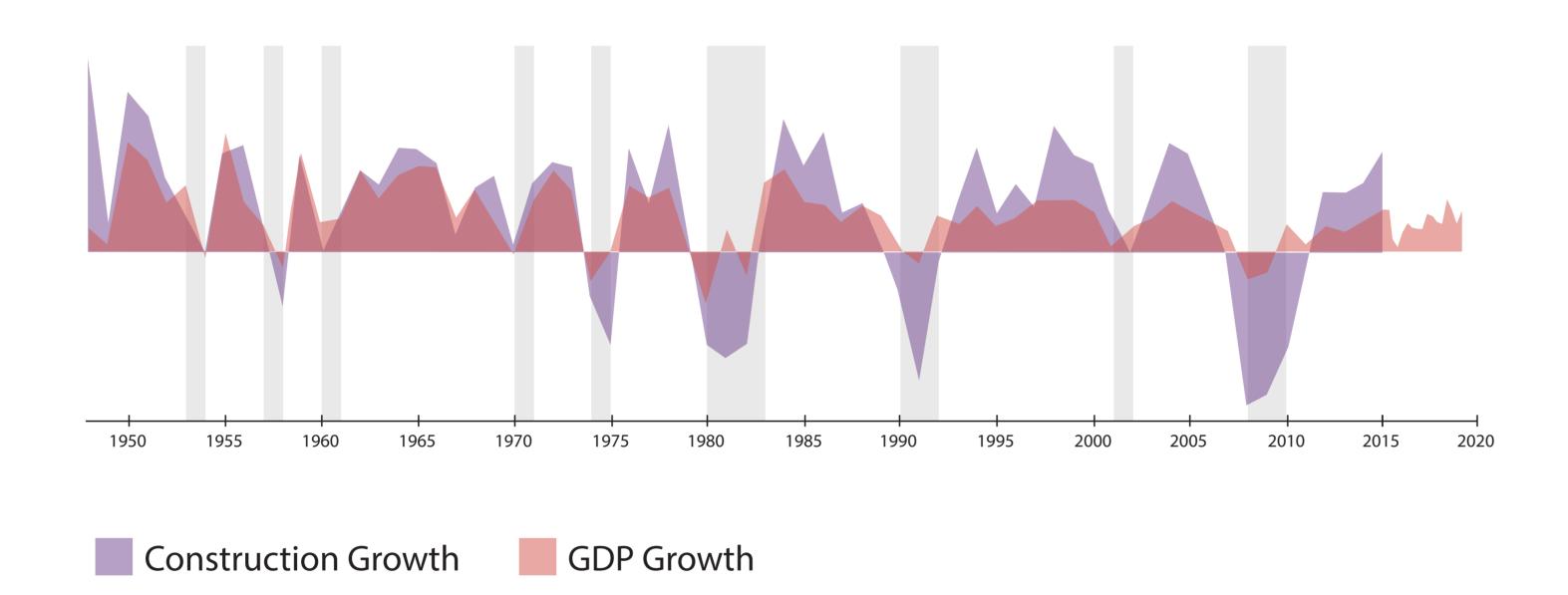


Needle Supertall



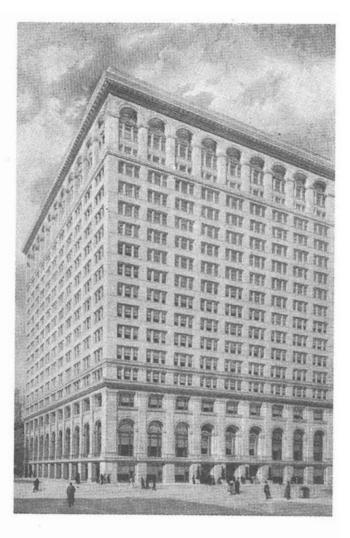
Full block Supertall

CITY GROWTH IS LINKED TO ECONOMIC GROWTH



HISTORICAL BENEFICIAL TO NEW YORK





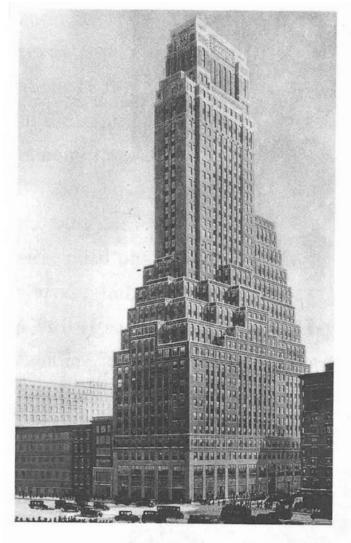




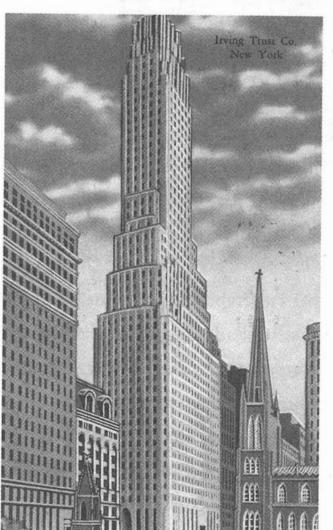
Figs. 54–57 Chicago quarter-block buildings.

Top: Railway Exchange Building (1903), First National Bank Building (1896).

Bottom: Peoples Gas Company Building (1911), Illinois Continental and Commercial Bank Building (1914).









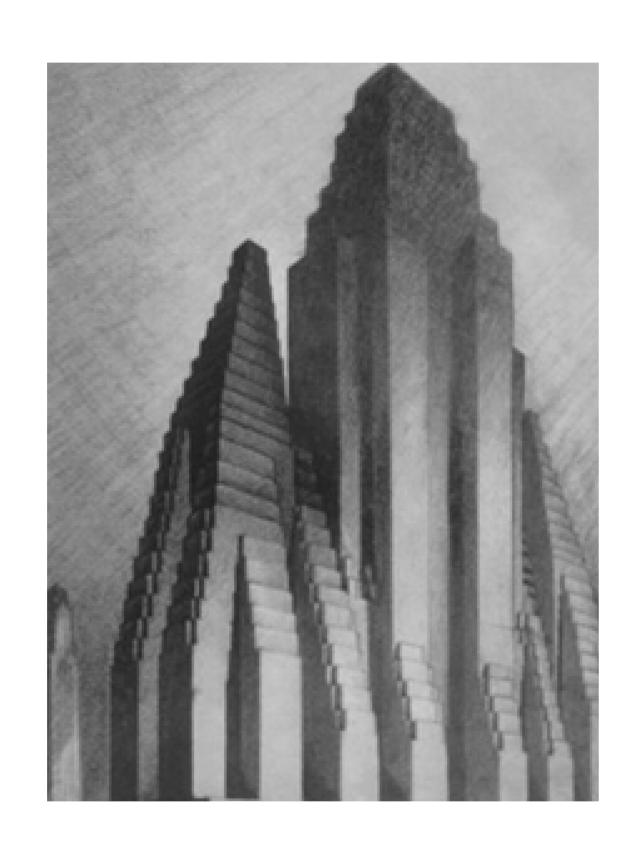
Figs. 83–86 Zoning envelope towers, New York. Top: French Building (1927), 500 Fifth Avenue (1931). Bottom: Irving Trust/1 Wall Street (1931), City Bank Farmers Trust (1931).

CITY GROWTH ALIENATING THE PUBLIC



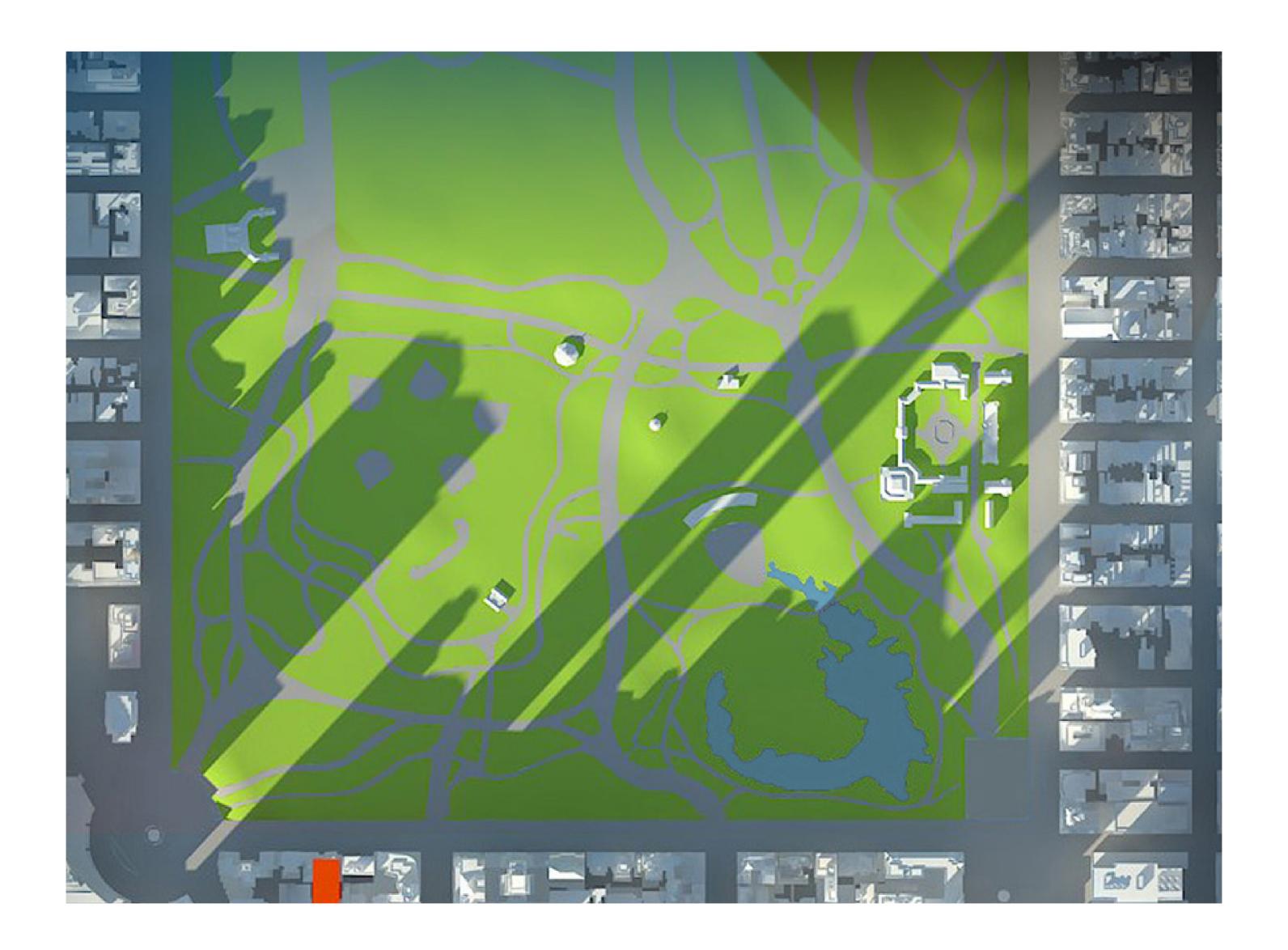
8

ZONING LAWS CONTROLLED HEIGHT AND BULK





PUBLIC ASSETS NO LONGER PROTECTED BY ZONING LAWS



9

LOOPHOLES CAPABLE OF BEING EXPLOITED



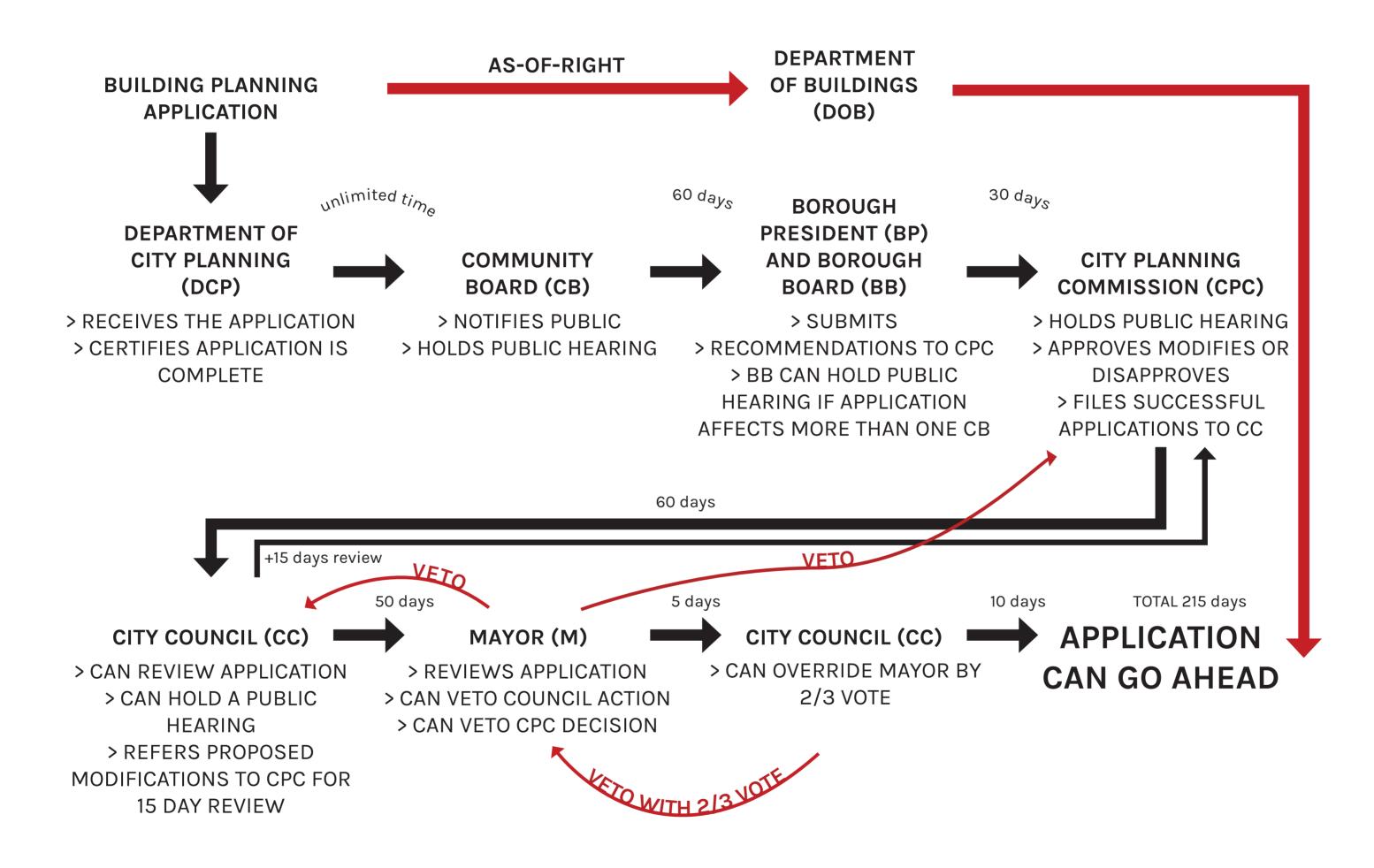
SUTTON PLACE SUPERTALL



90% OF BUILDINGS ARE BUILT WITHOUT PUBLIC REVIEW



A LONG AND COMPLEX PUBLIC REVIEW SYSTEM



DEMOCRACY IS AT RISK

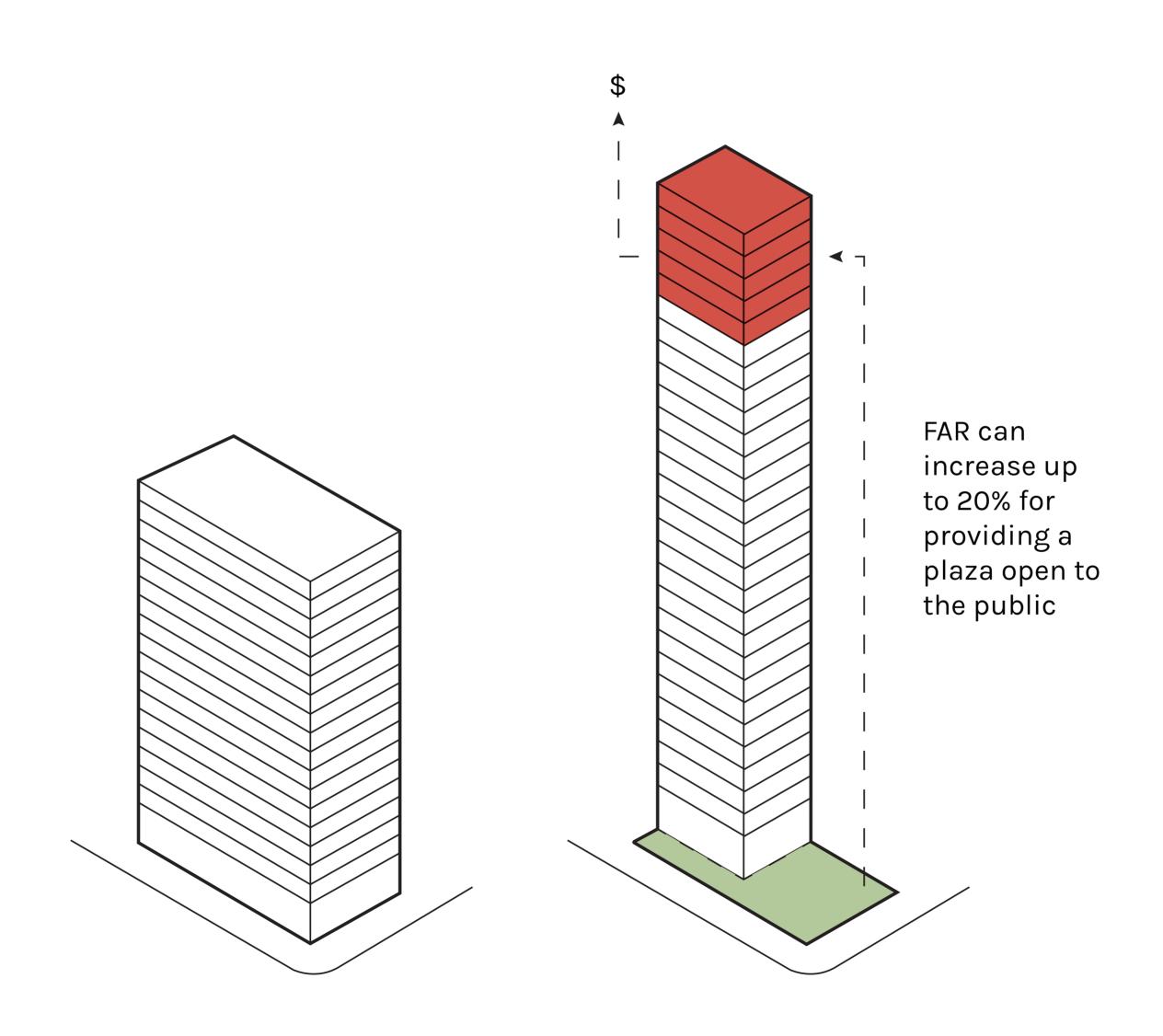


WHAT IS PRIVATE AND WHAT IS PUBLIC?

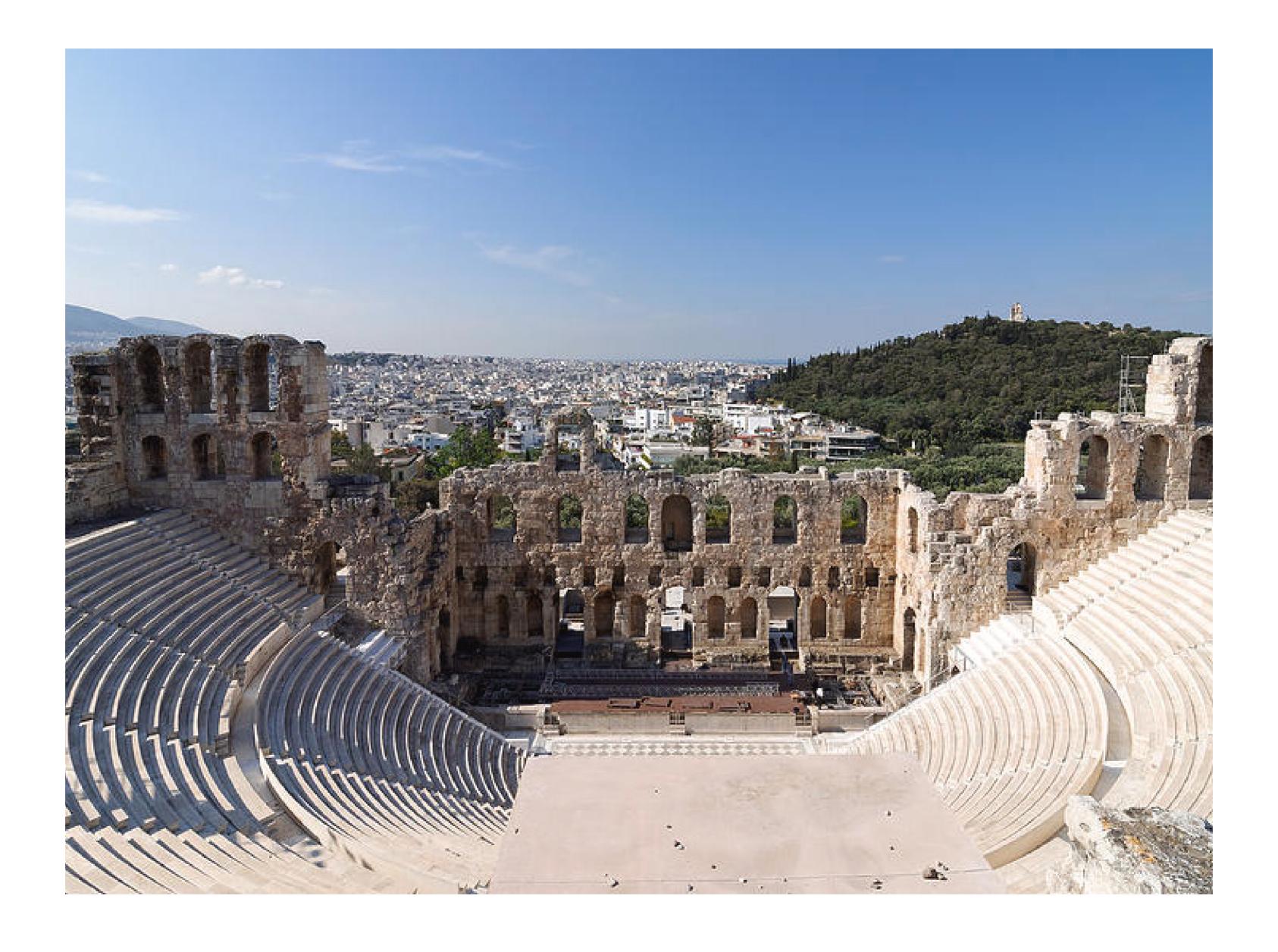


POPS (Privately Owned Public Space)

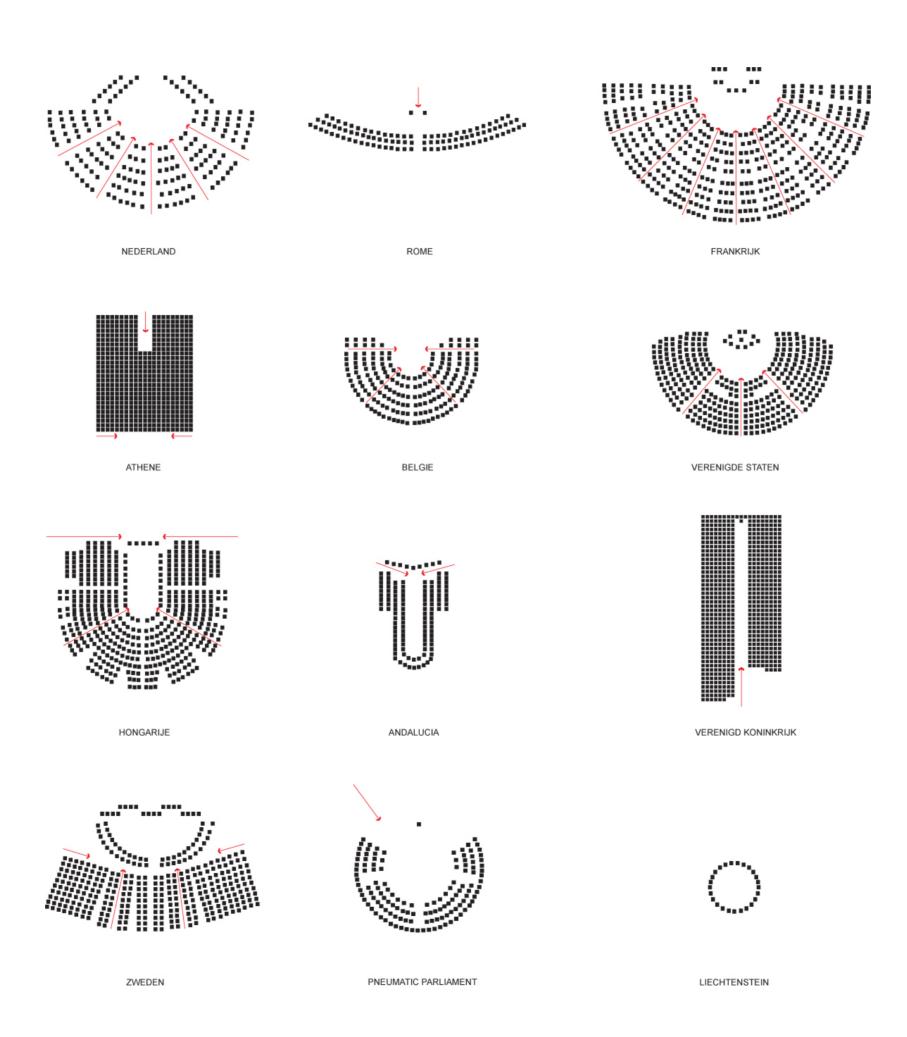
P.O.P.S. (PRIVATELY OWNED PUBLIC SPACE)



ANCIENT AMPHITHEATRE IN ATHENS

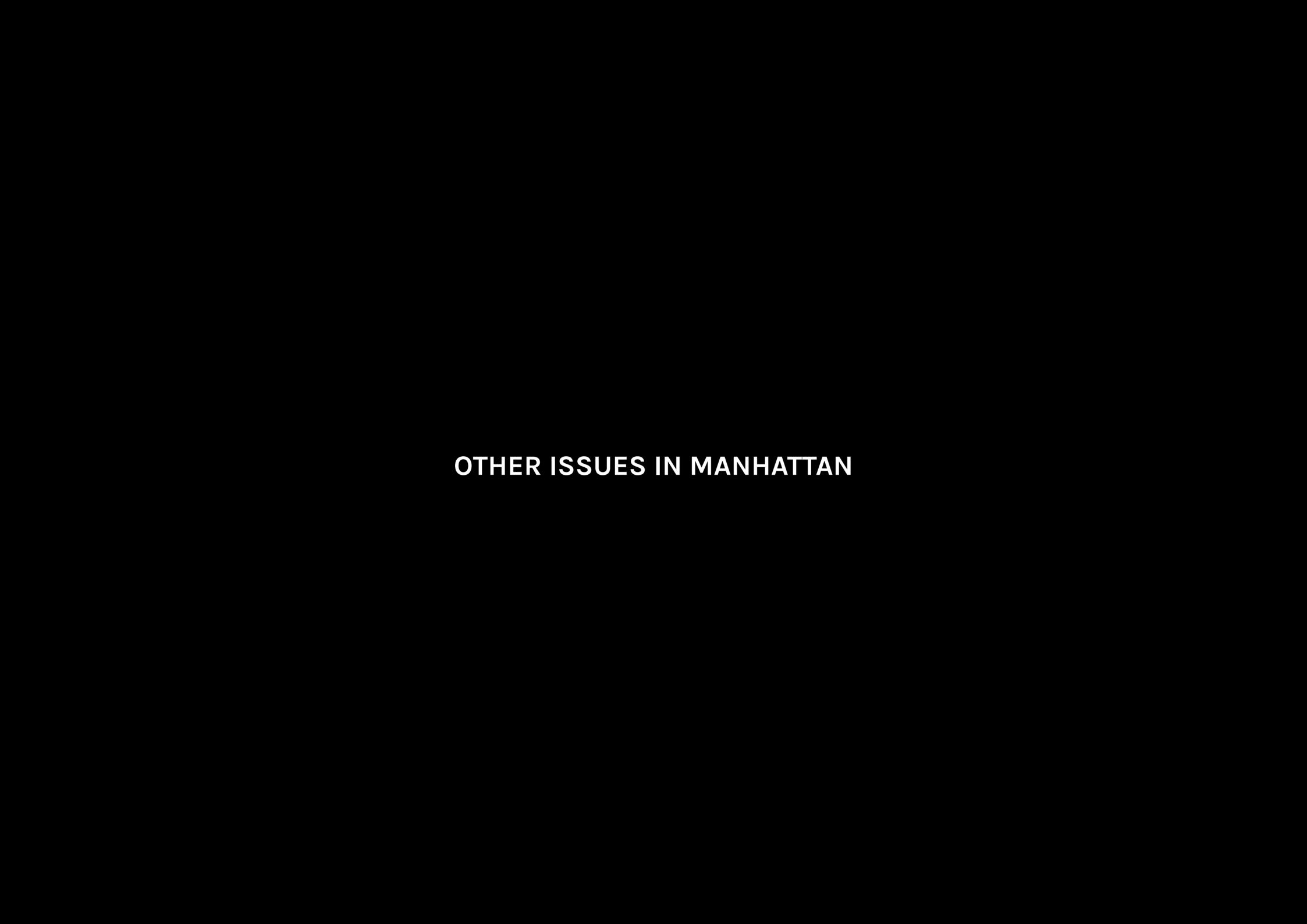


THEATRES OF DEMOCRACY



MANHATTAN'S CIVIC CENTER

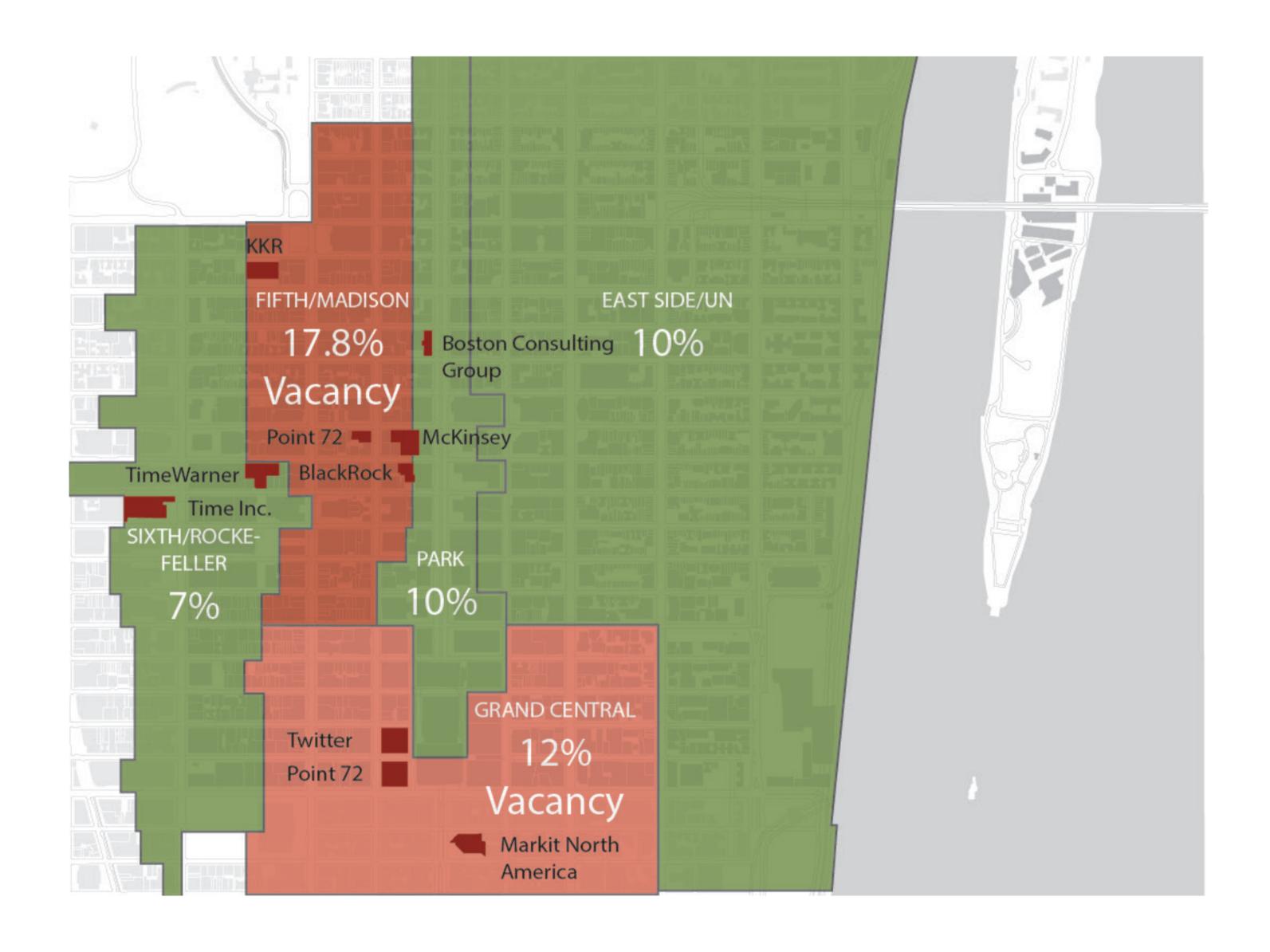




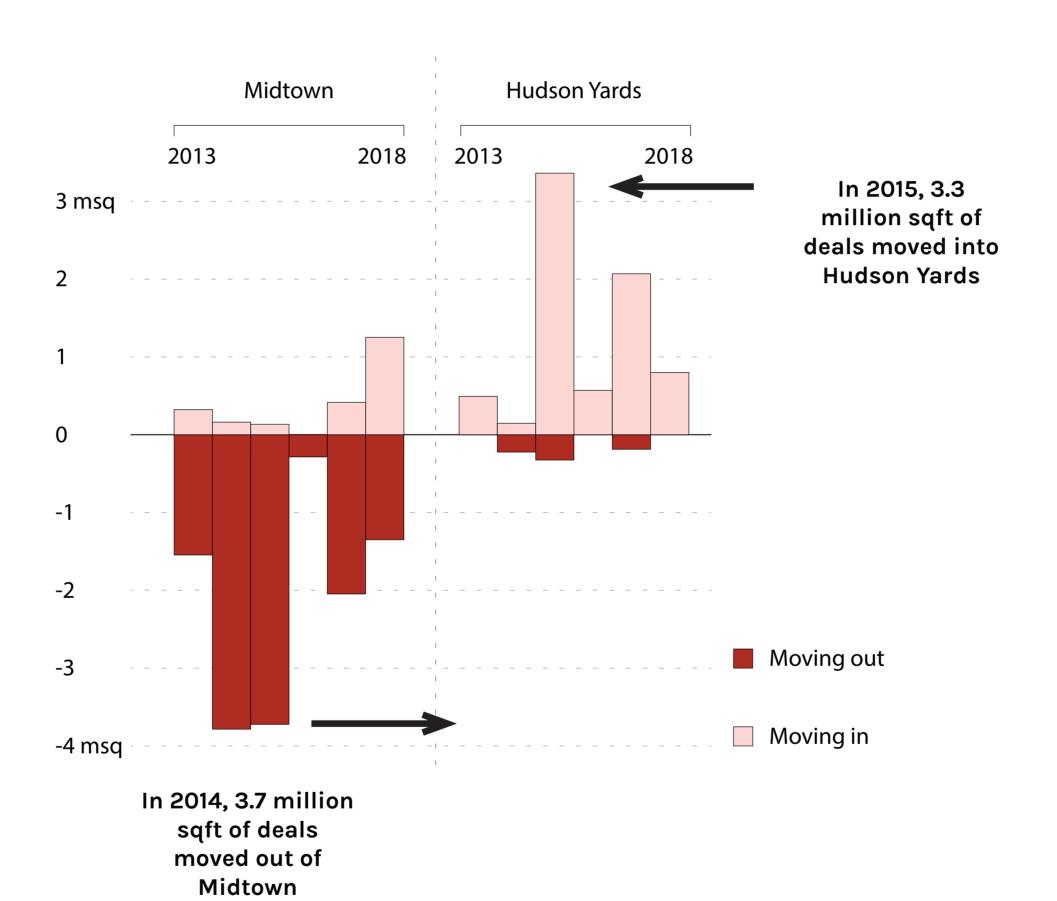
AN AGING BUILDING STOCK



INCREASING OFFICE VACANCY

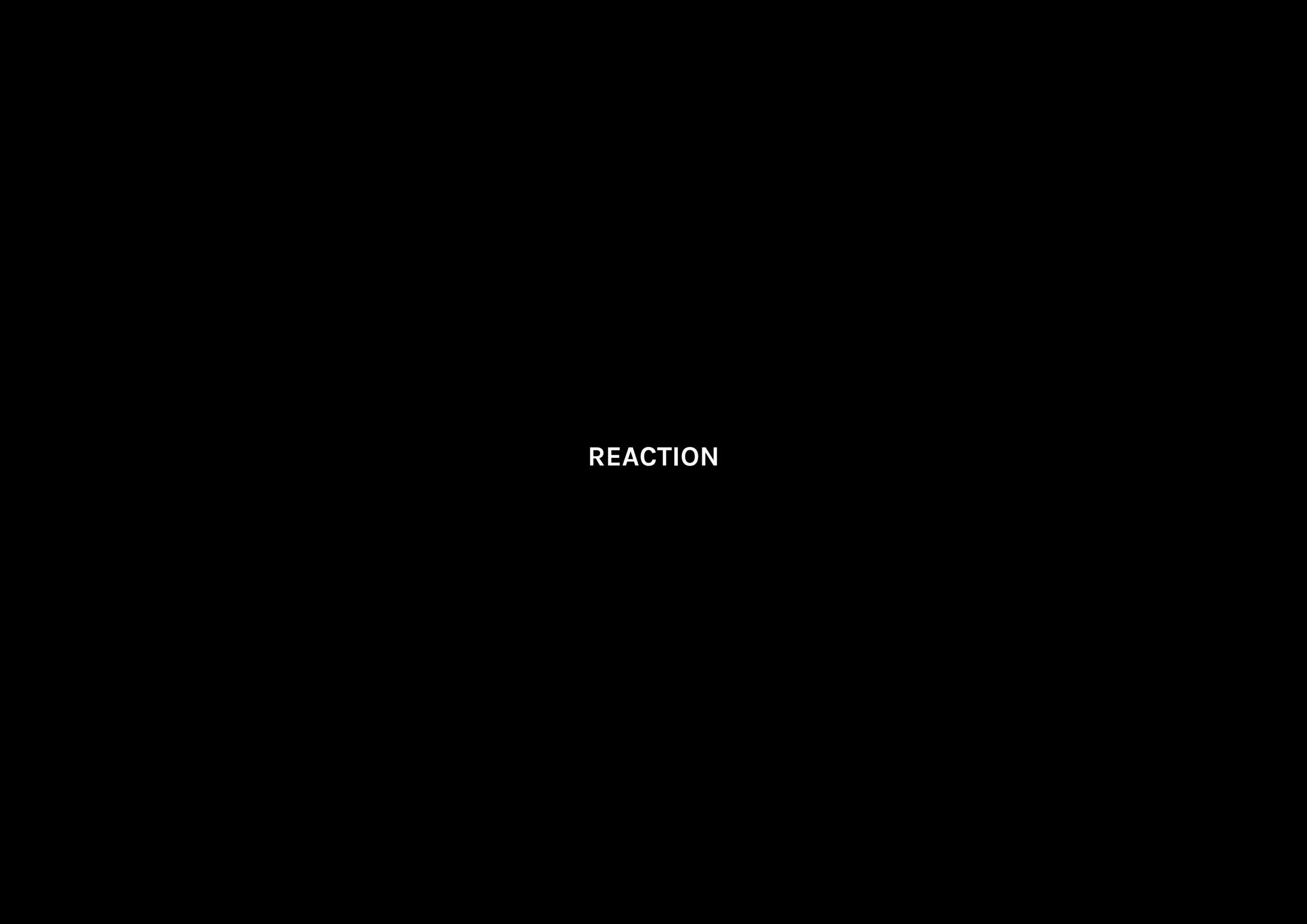


COMPANIES ARE MOVING OUT OF MIDTOWN AND INTO HUDSON YARDS

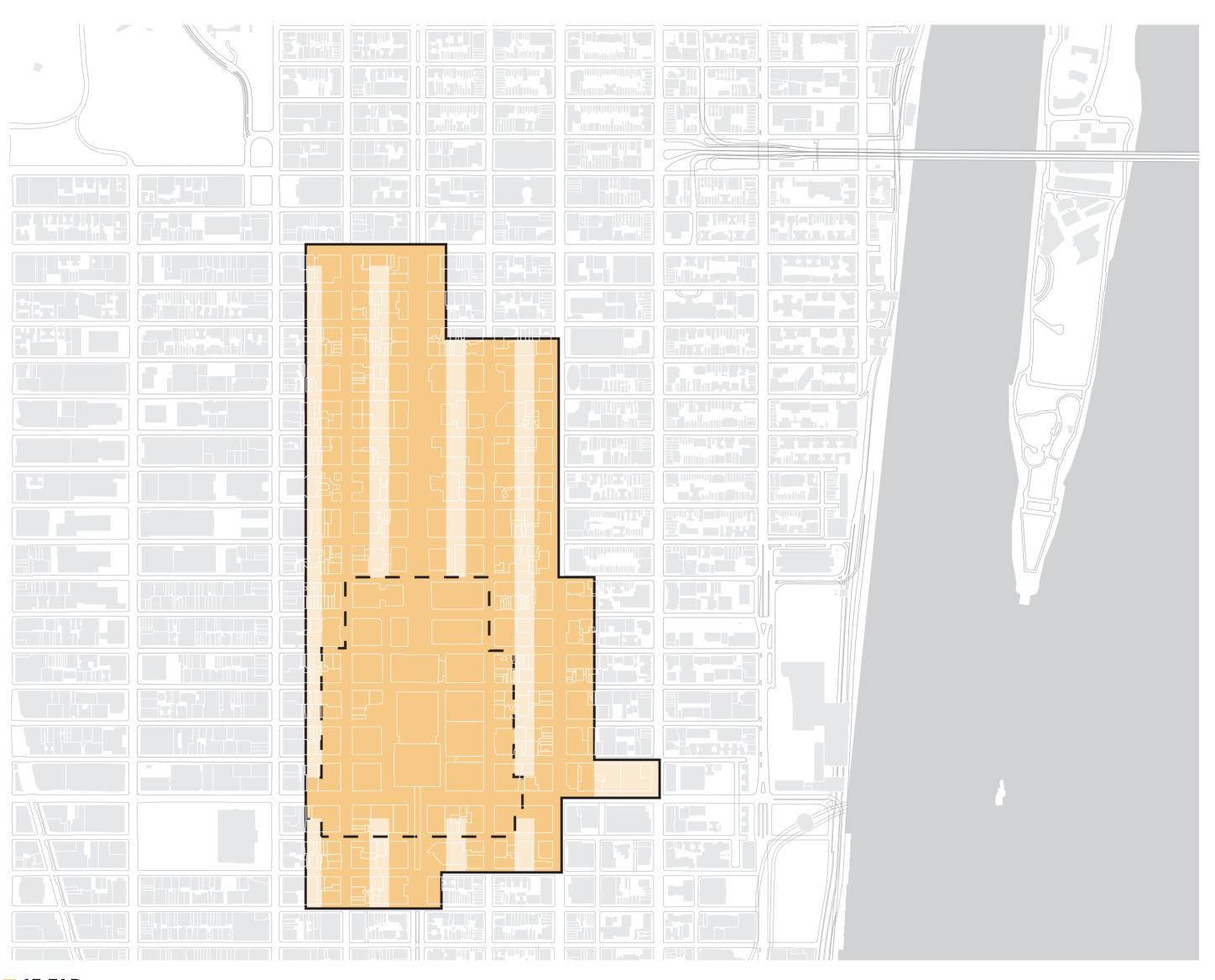


MIDTOWN TO HUDSON YARDS



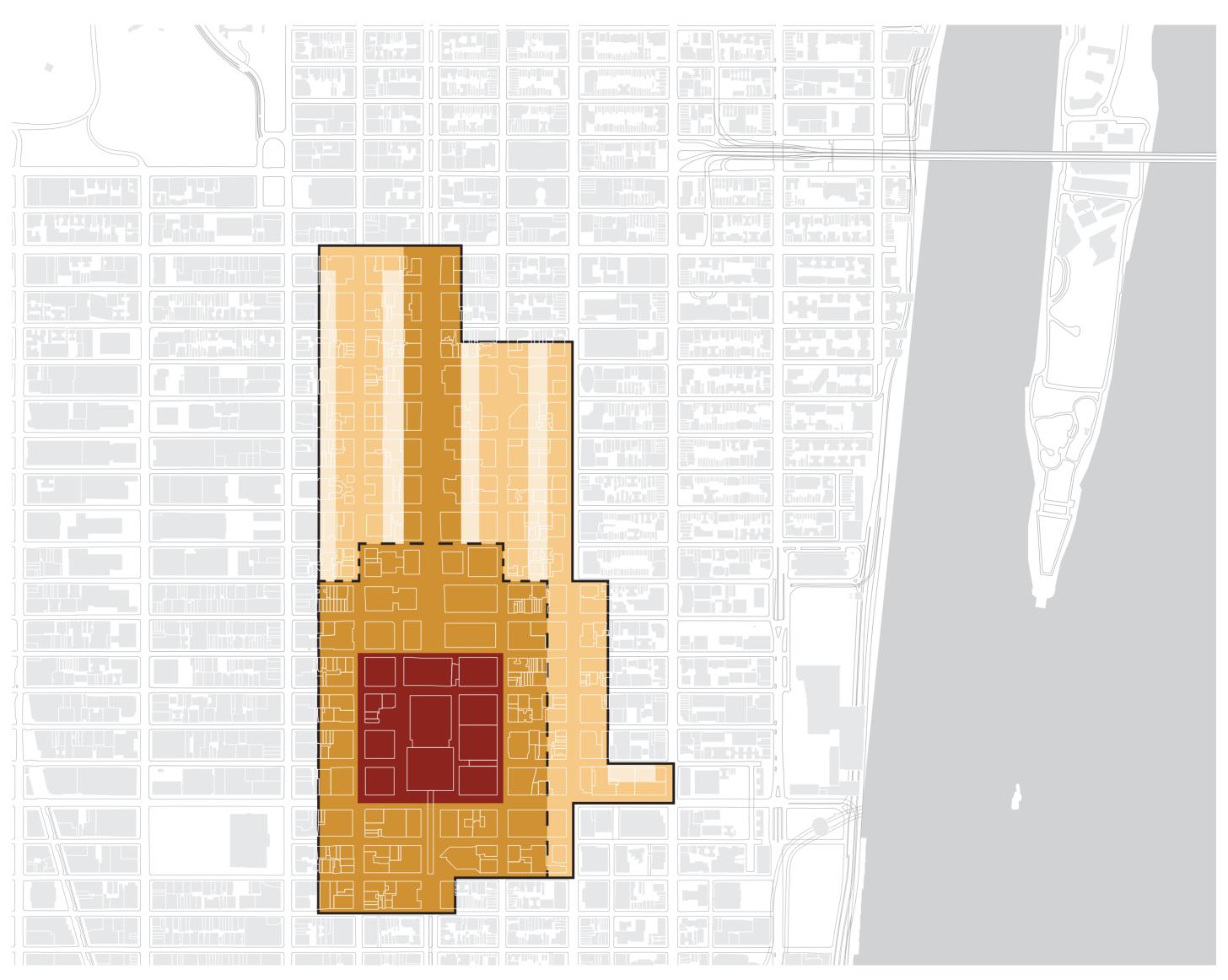


CURRENT ZONING



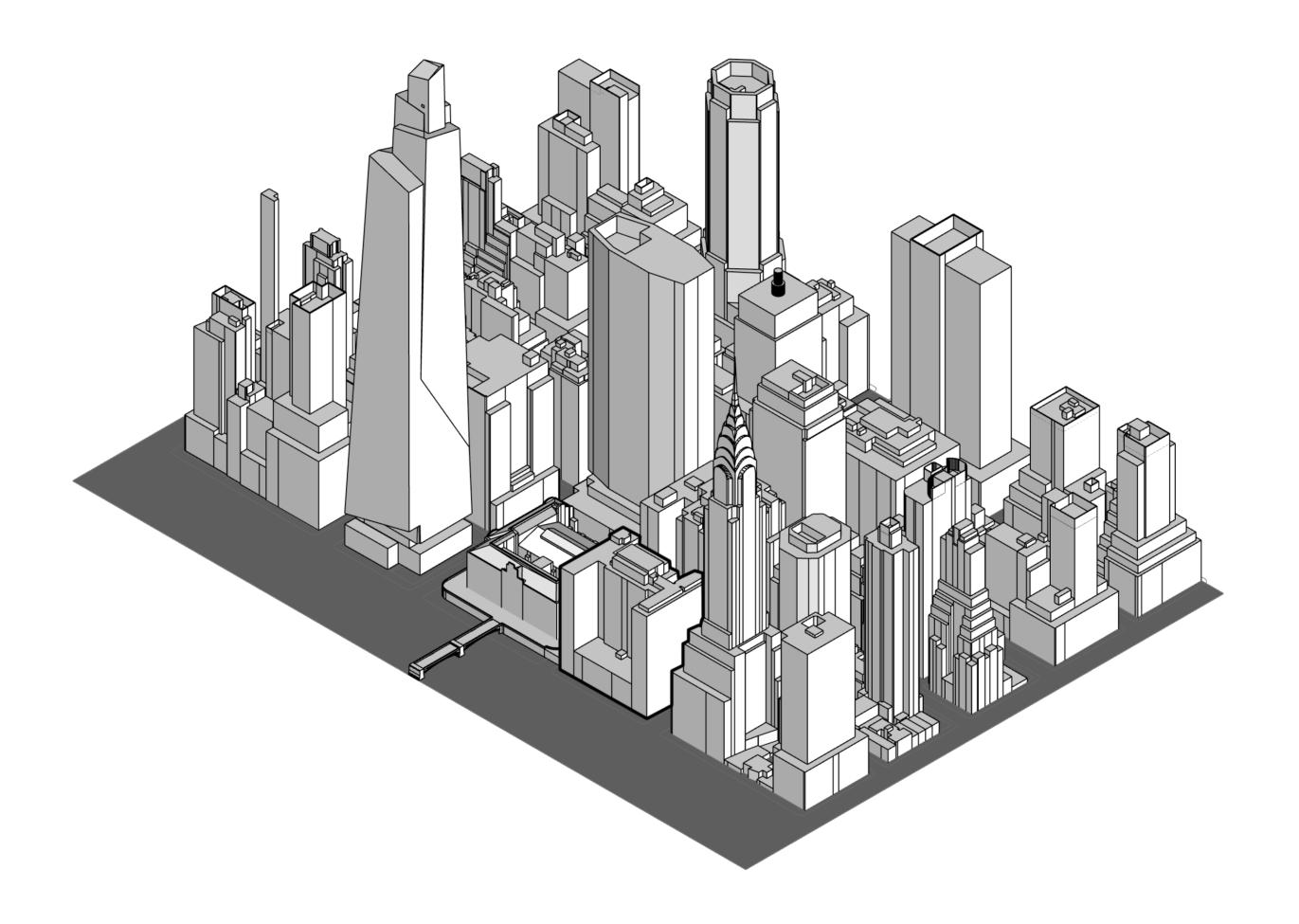
15 FAR12 FAR

2017 REZONING TO PROMOTE DEVELOPMENT

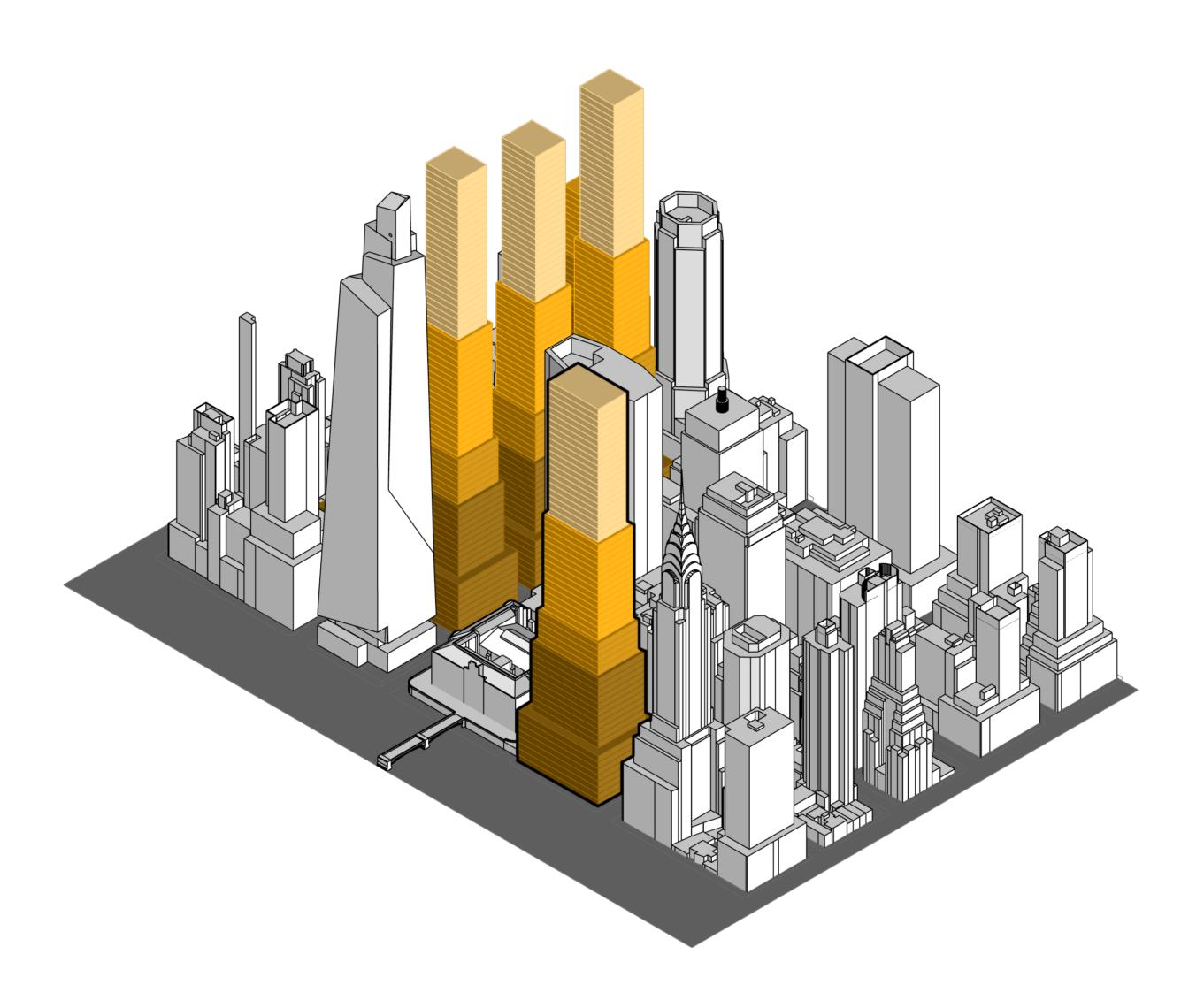


- 24 FAR (up from 15)
- **21.6 FAR (up from 15/12)**
- 18 FAR (up from 15)
- 14.4 FAR (up from 12)

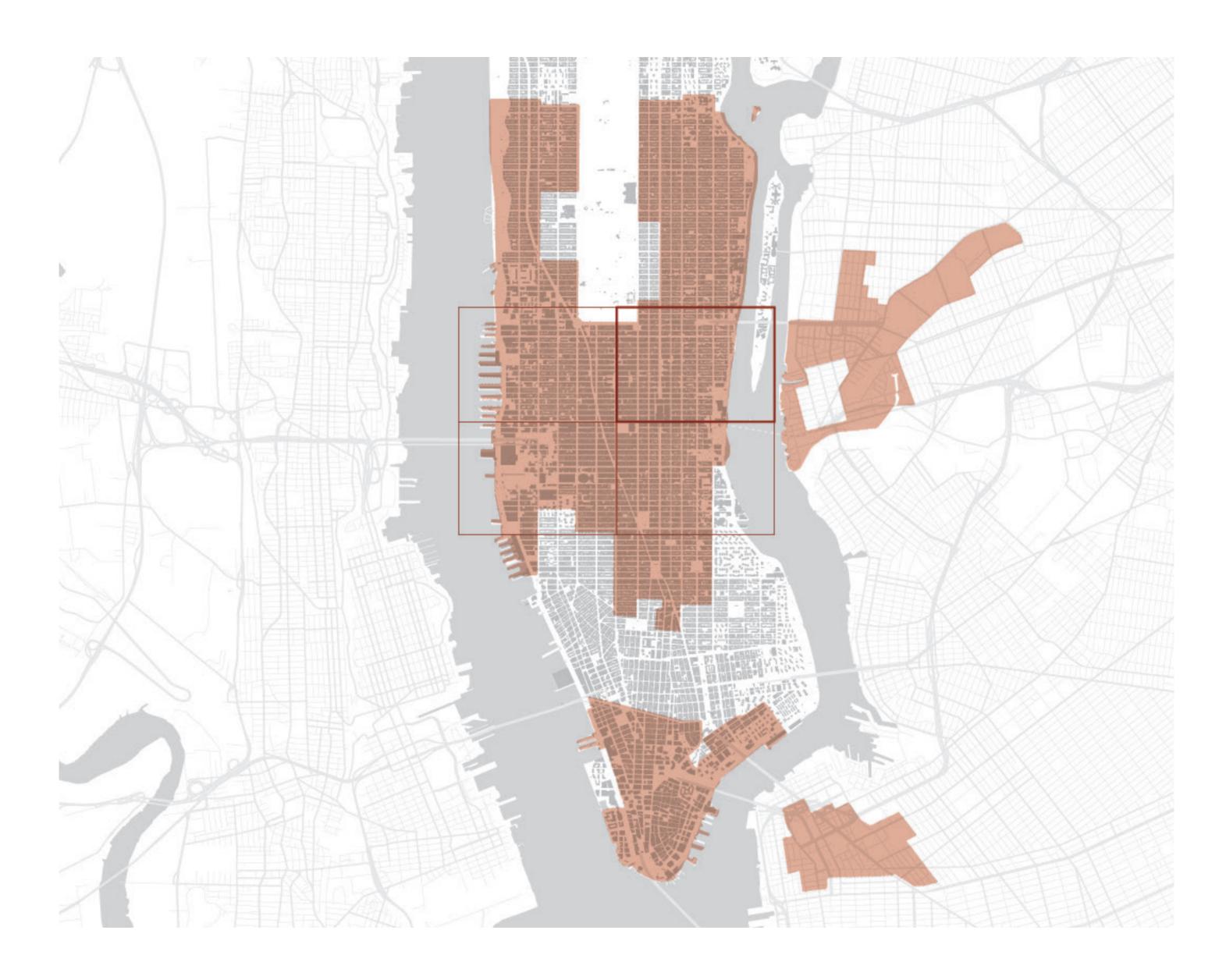
GRAND CENTRAL CORE CURRENTLY



POTENTIAL DEVELOPMENT 30 FAR



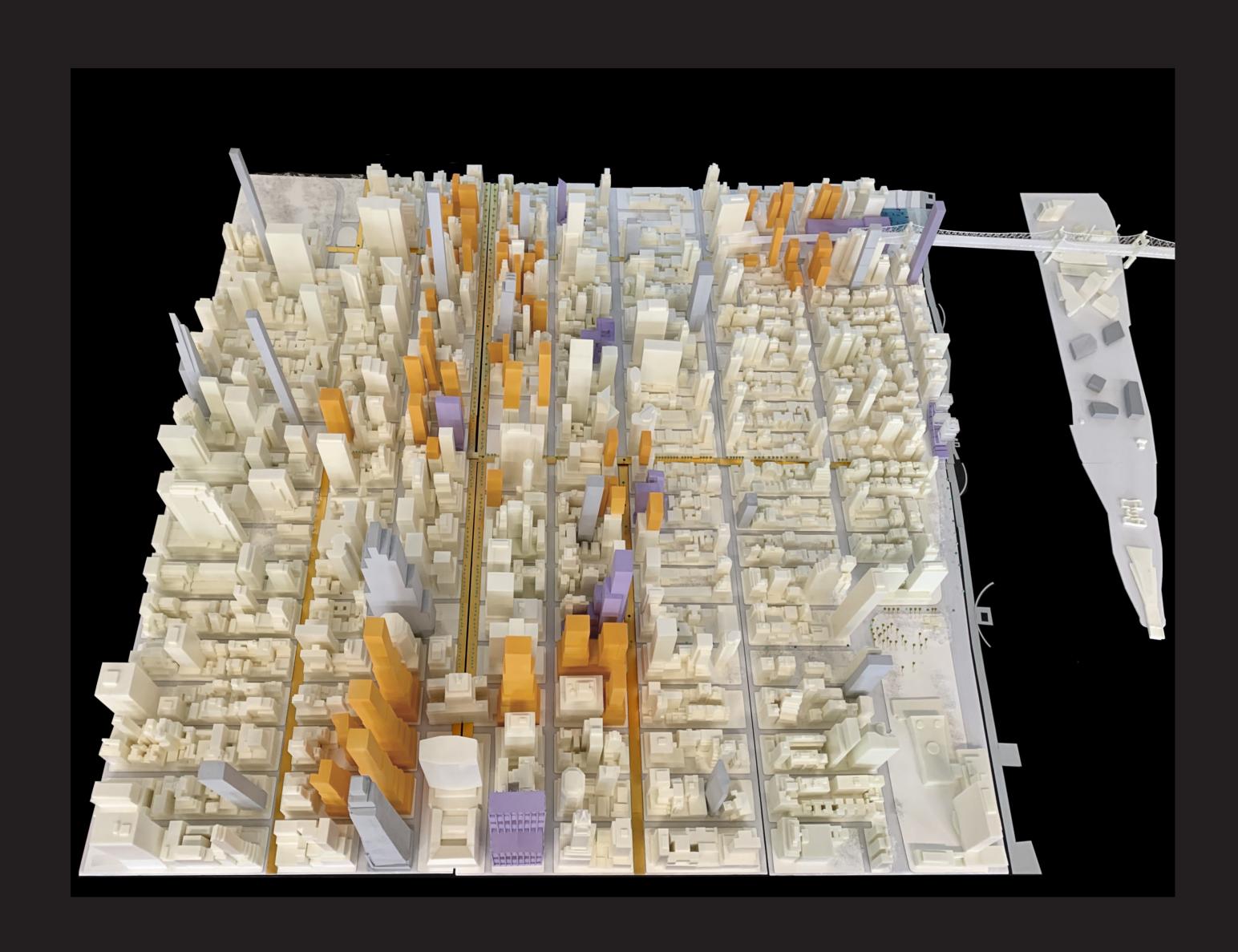
12 FAR CAP REMOVAL IN HIGH RISE AREAS



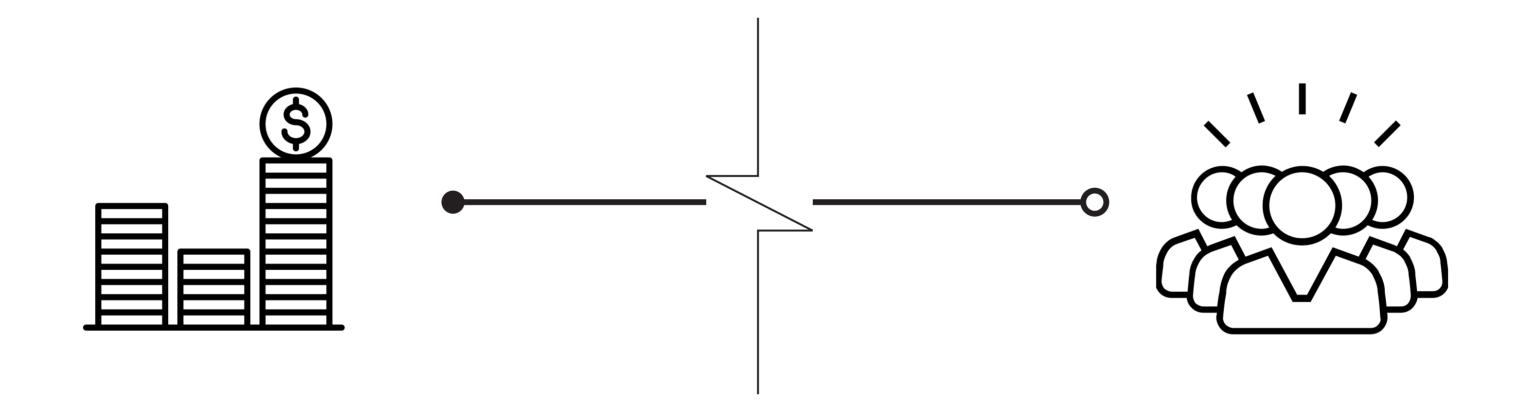
THE VALLEY OF GIANTS IS ABOUT TO CHANGE DRAMATICALLY



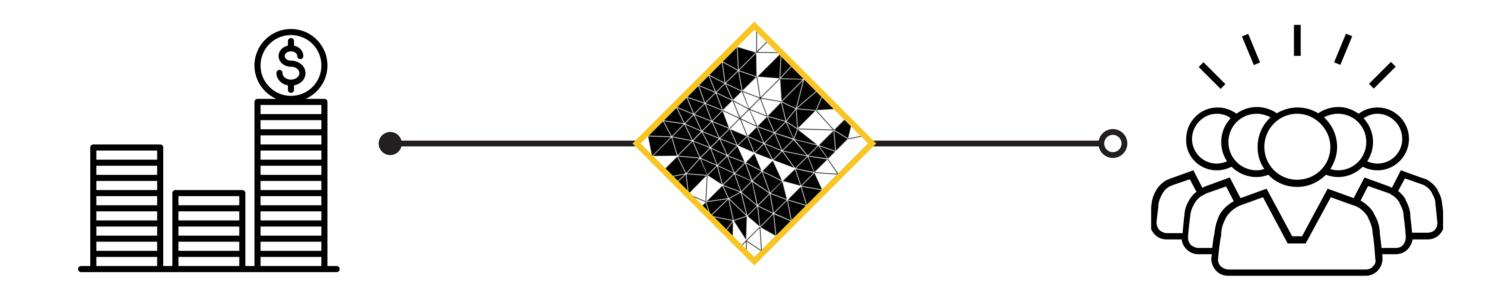
THE VALLEY OF GIANTS IS EXPECTED TO GROW



FINANCIAL FORCE AGAINST LOCAL COMMUNITIES



RESEARCH QUESTION



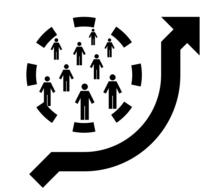
HOW CAN A PUBLIC FORUM IN MIDTOWN MEDIATE BETWEEN FINANCIAL FORCES AND MANHATTAN'S COMMUNITIES IN BUIDING THE FUTURE OF THE CITY?



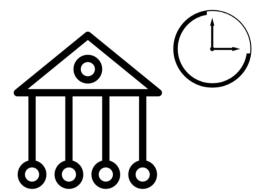
PROBLEM STATEMENT



Midtown is about to grow dramatically

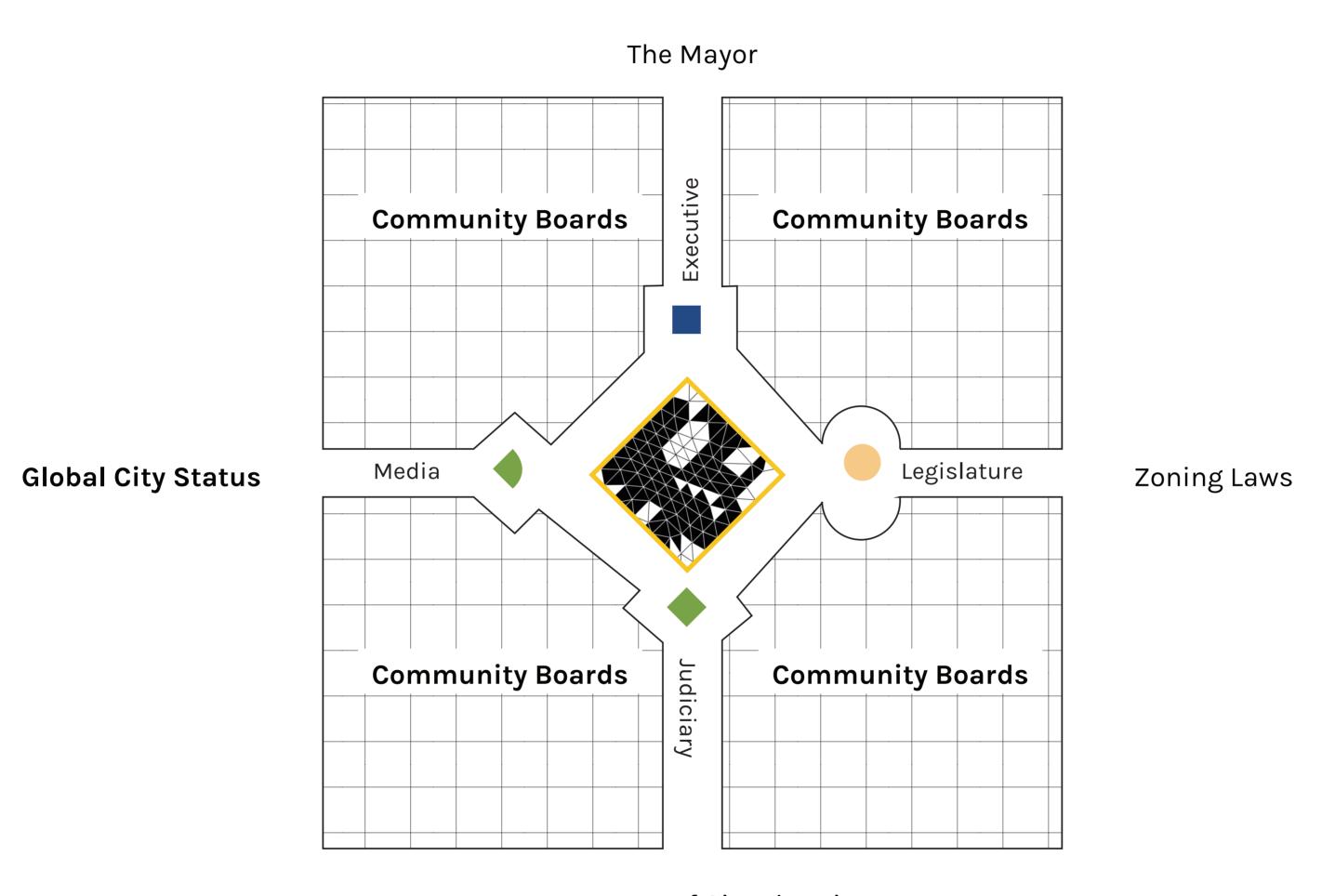


The as-of-right planning process bypasses public reviews, contributing to a shrinking democracy



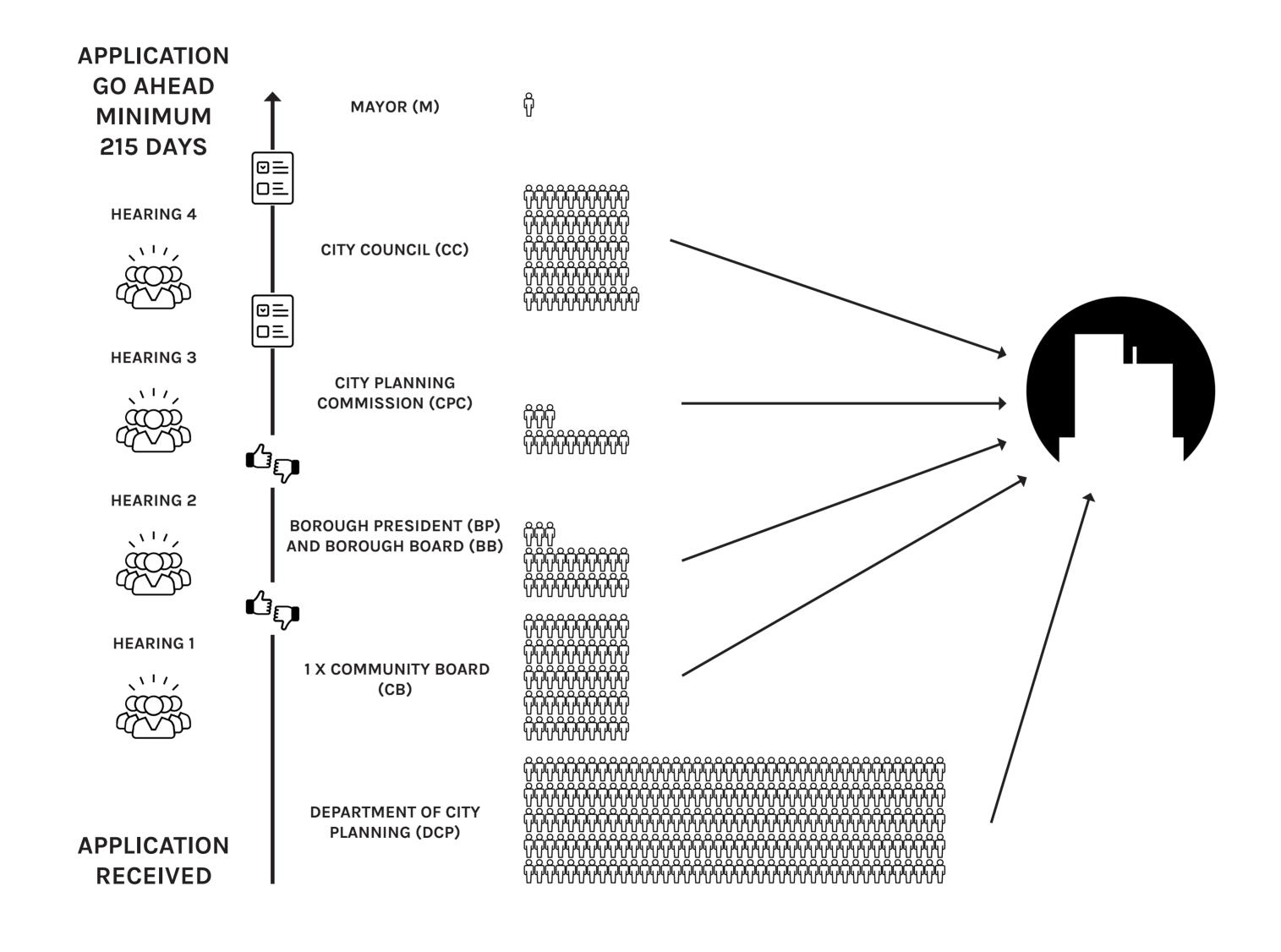
Public reviews
and bureaucracy
significantly
slow city growth,
investment and the
economy

FOSTERING DELIBERATION AND DEBATE

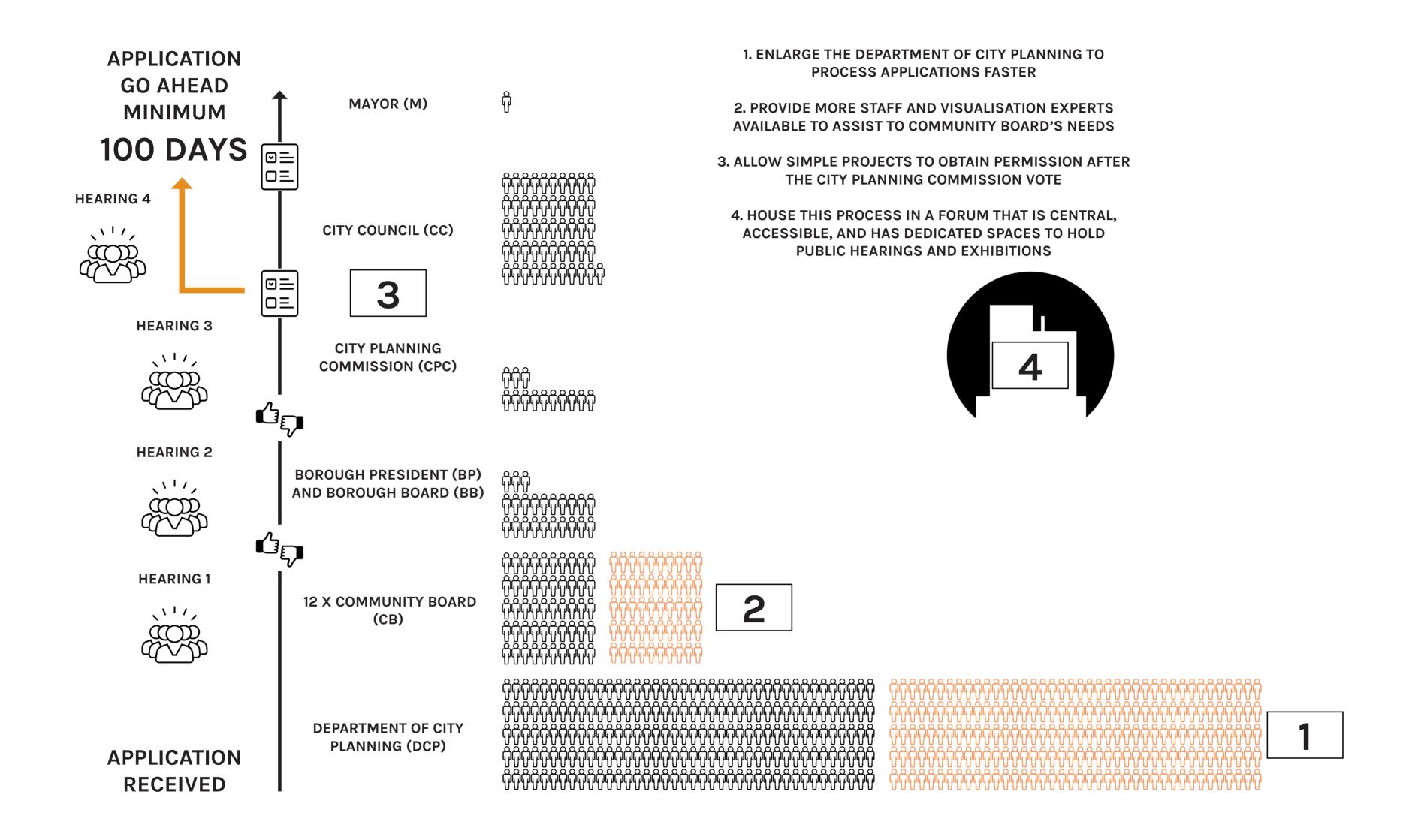


Department of City Planning

PROPOSAL - FAST TRACK THE PUBLIC REVIEW PROCESS

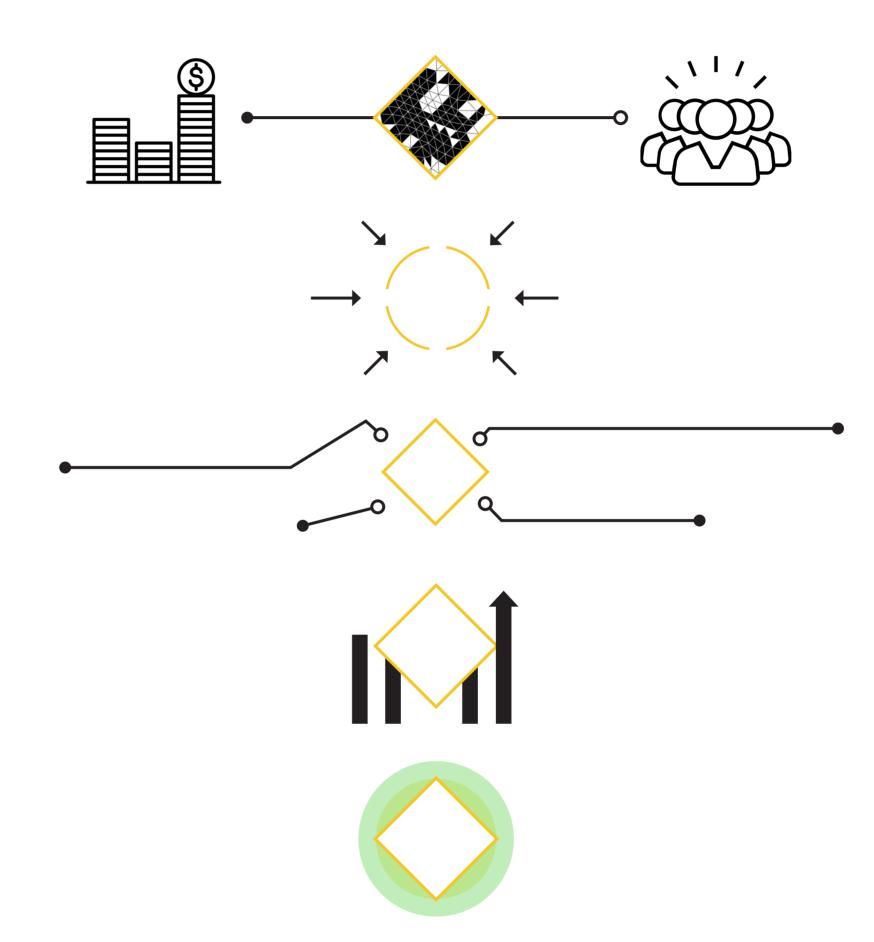


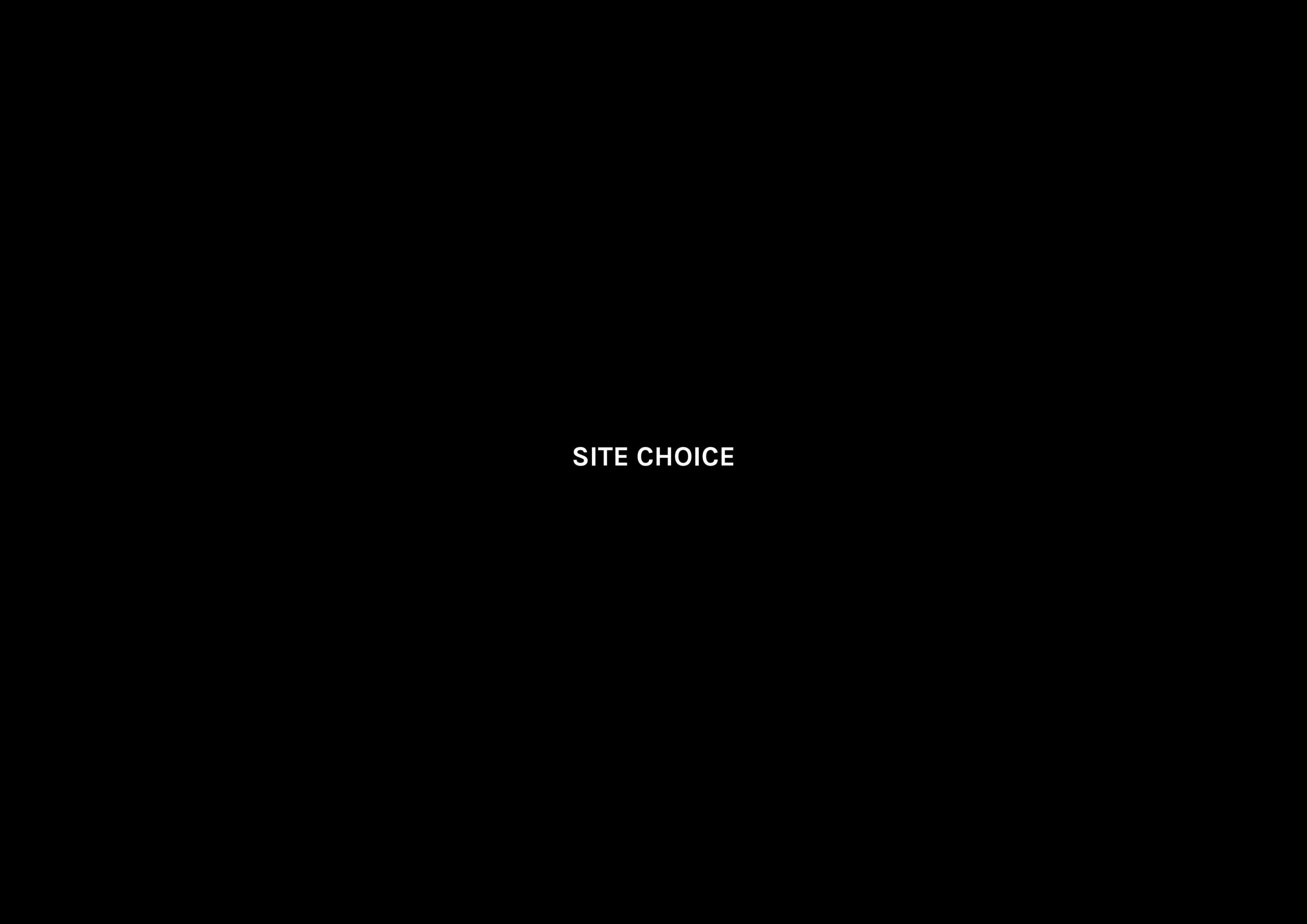
HOW TO FAST TRACK THE PUBLIC REVIEW PROCESS



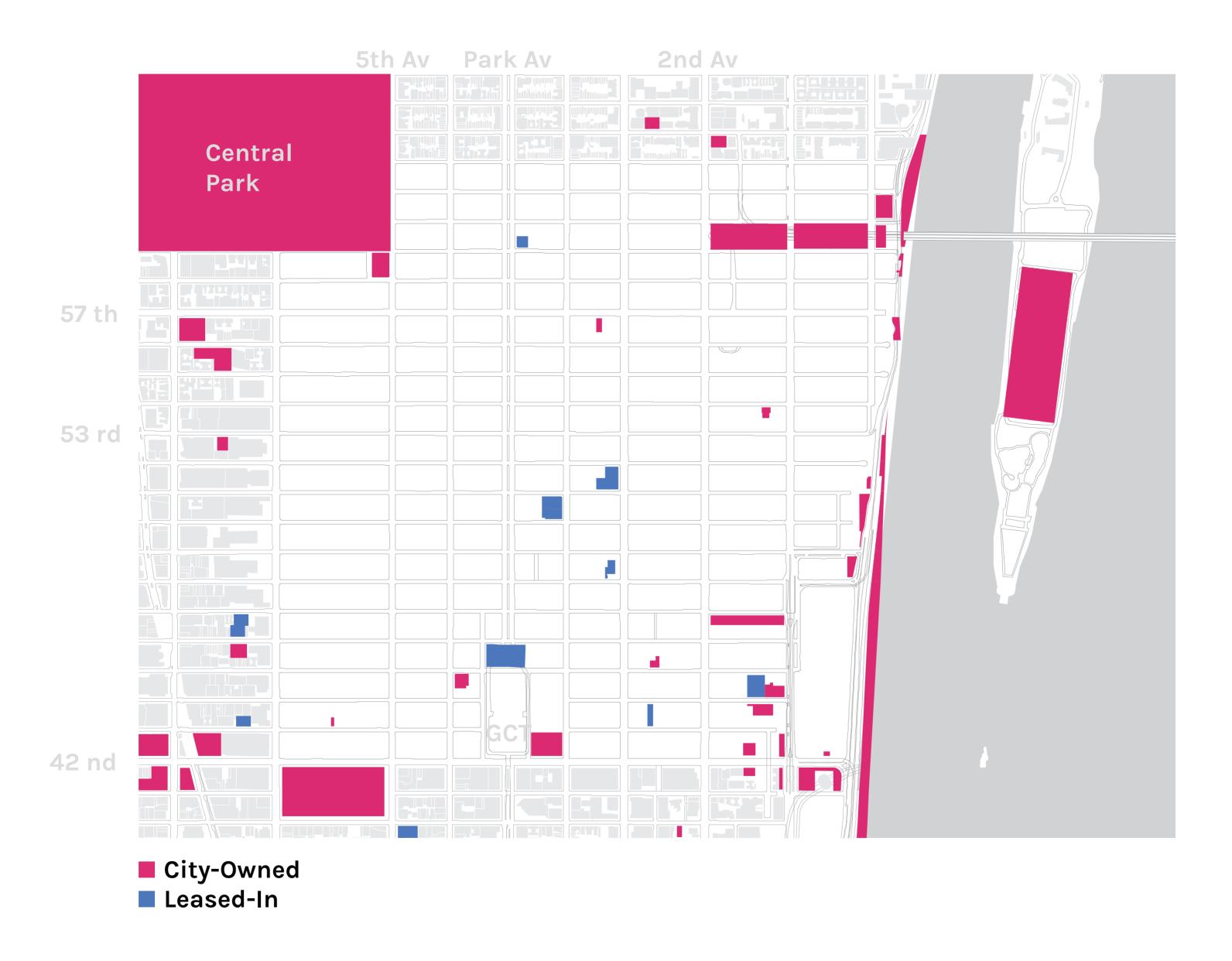
AMBITIONS

- 1. A public/private building that embodies and embraces the conflict between developers and local community
- 2. An inviting building to encourage participation
- 3. Easily accessible
- 4. Future oriented (Sustainable economy, growth, embracing midtown's giants)
- 5. Symbolic/democratic/sustainable/poetic

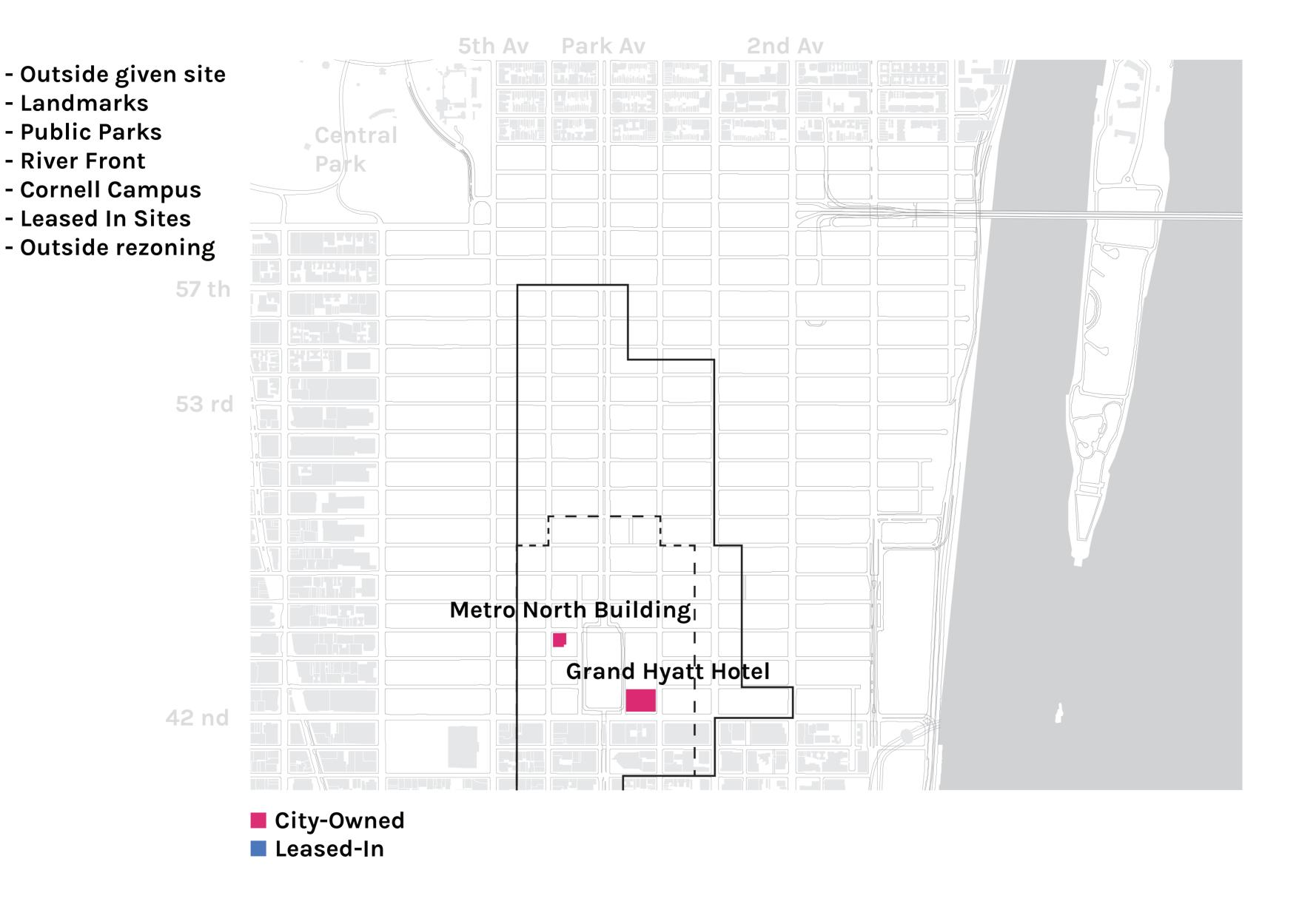




CITY-OWNED SITES



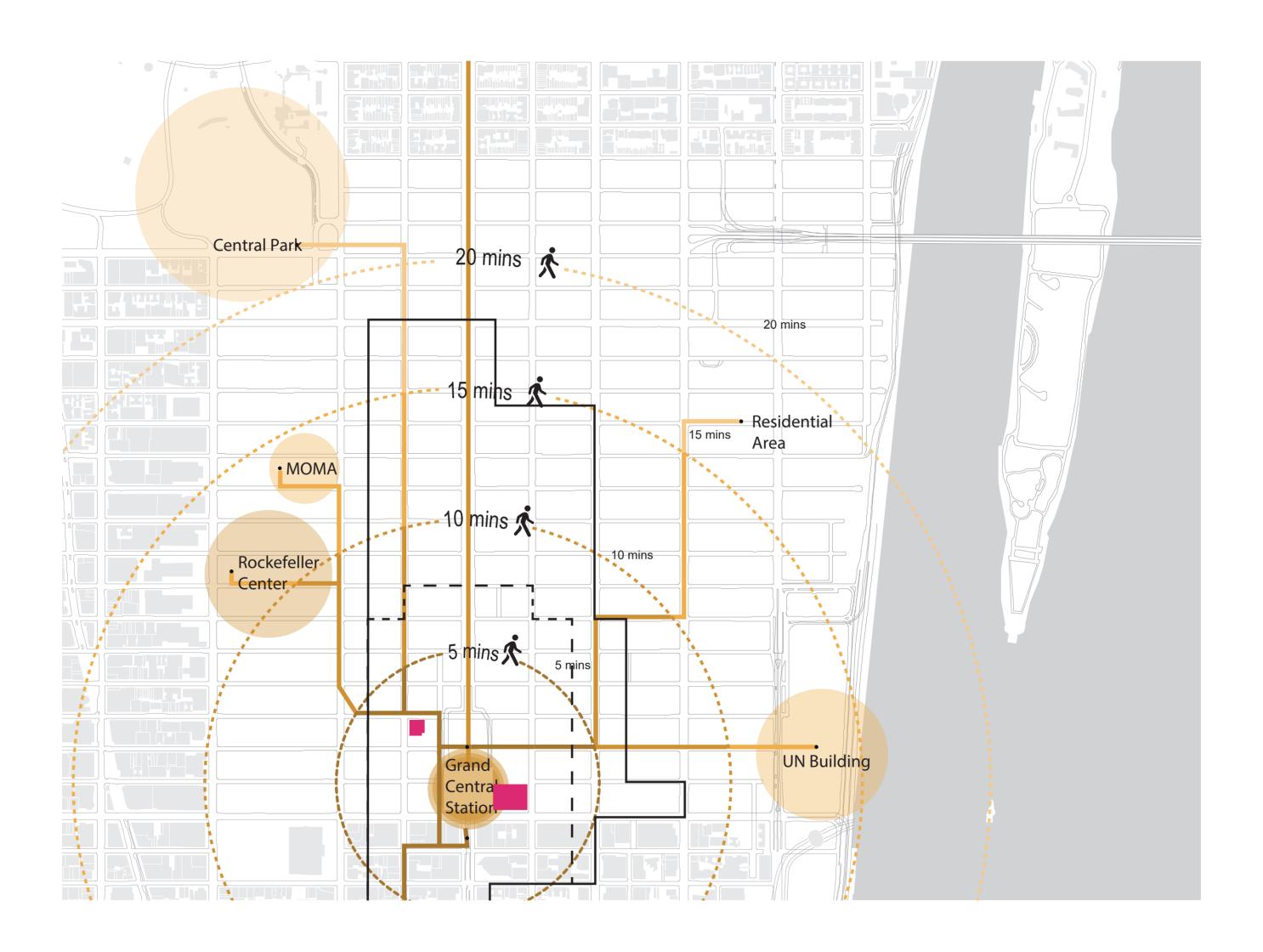
CITY-OWNED SITES



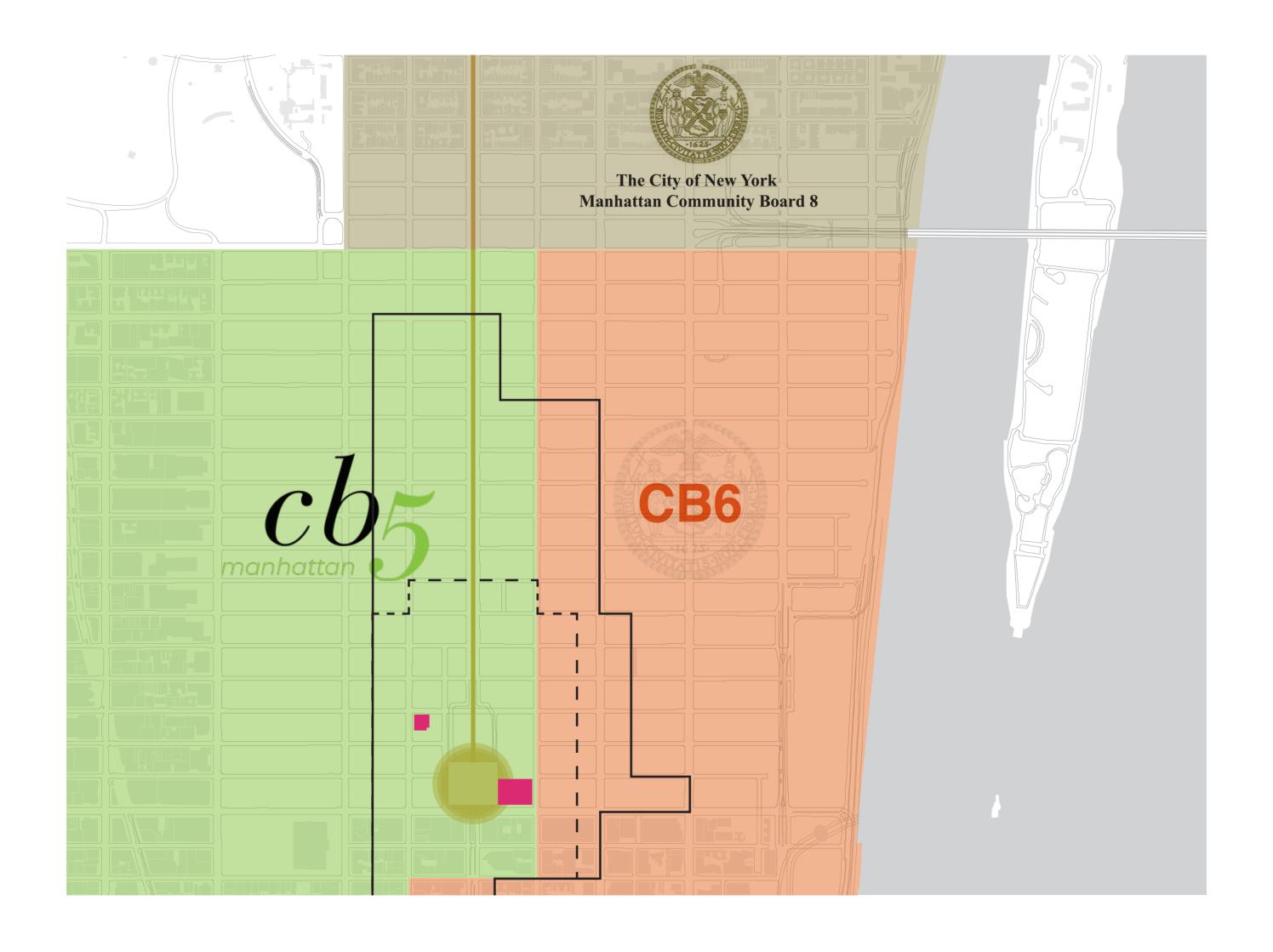
CENTRAL LOCATION ADJACENT TO GRAND CENTRAL STATION



EASILY ACCESSIBLE



BETWEEN TWO COMMUNITY DISTRICT BOUNDARIES



NEWS: GRAND HYATT TO BE DEMOLISHED

Donald Trump's first Manhattan hotel to be torn down

- Grand Hyatt, next to Grand Central, to face wrecking ball
- Trump bought what was Commodore hotel in 1970s



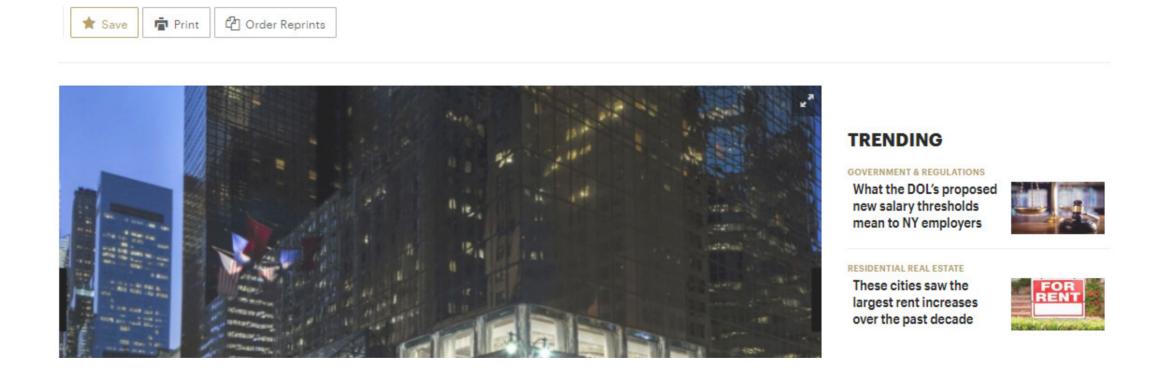
▲ Donald Trump is no longer connected to the hotel. He sold his stake in 1996. Photograph: Richard Drew/AP

The building with which **Donald Trump** made his name in Manhattan real estate is facing the wrecking ball.

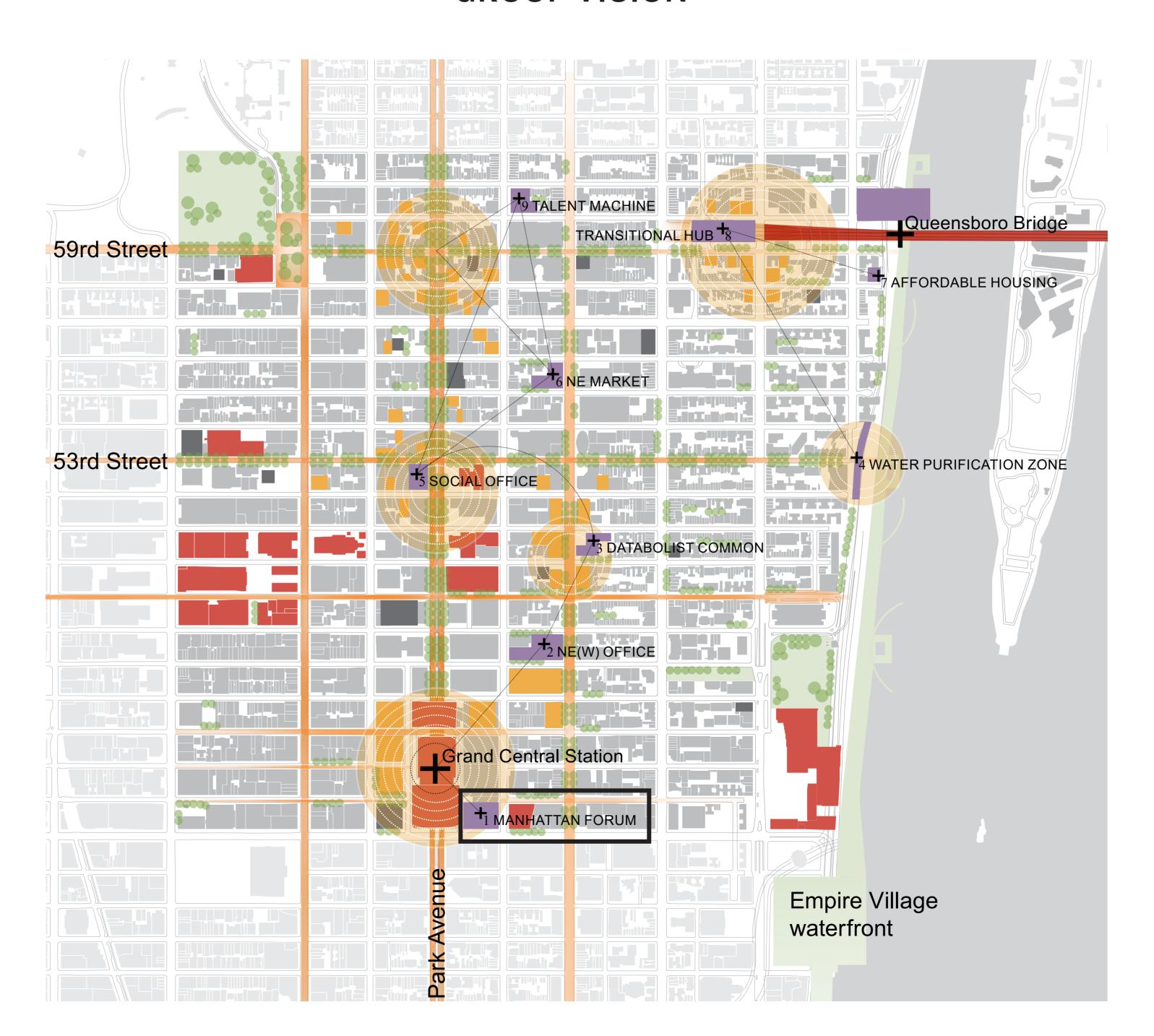
New York City's Grand Hyatt to be Demolished and Replaced With Office Building



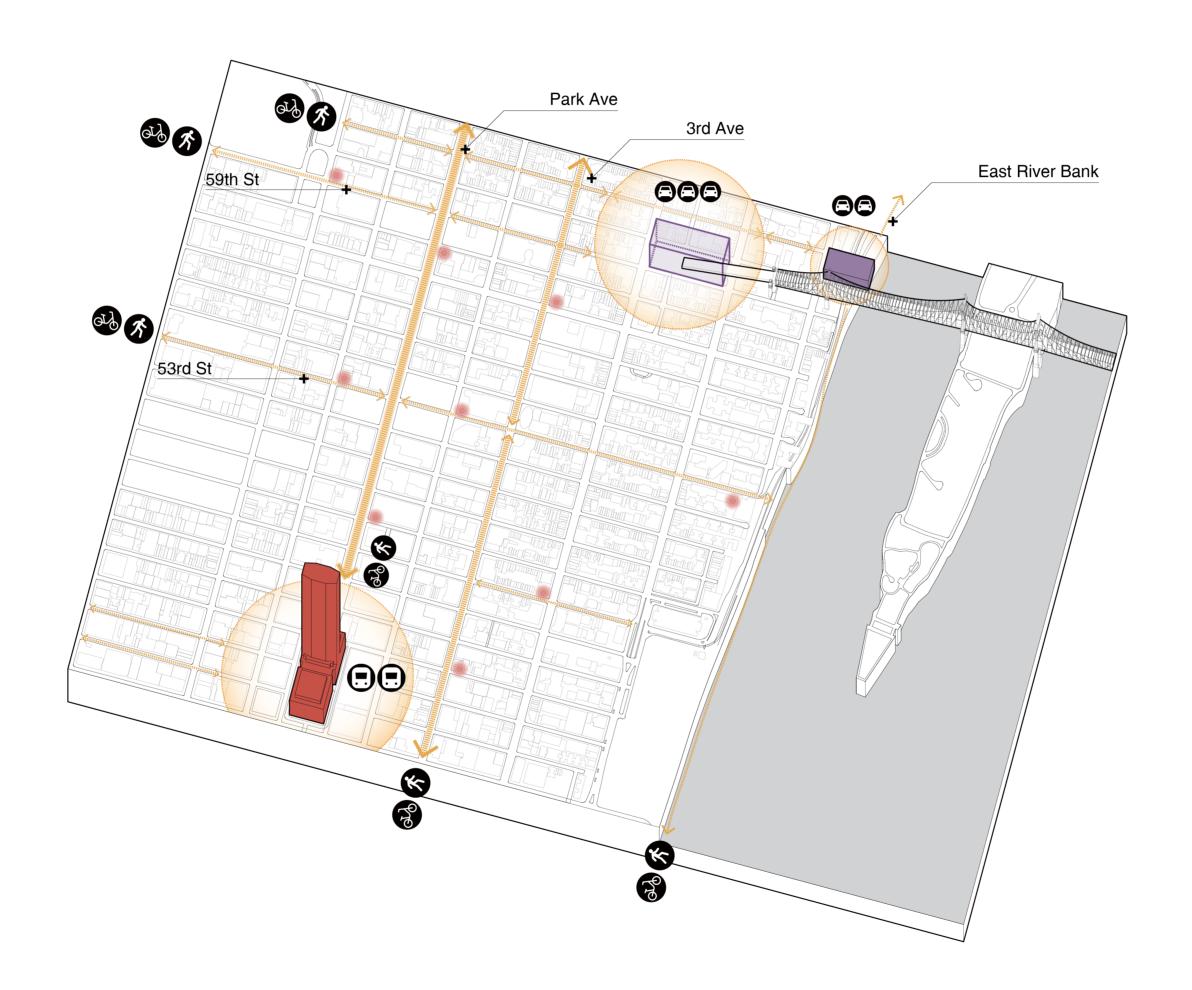
Developers plan to demolish New York's Grand Hyatt hotel



GROUP VISION



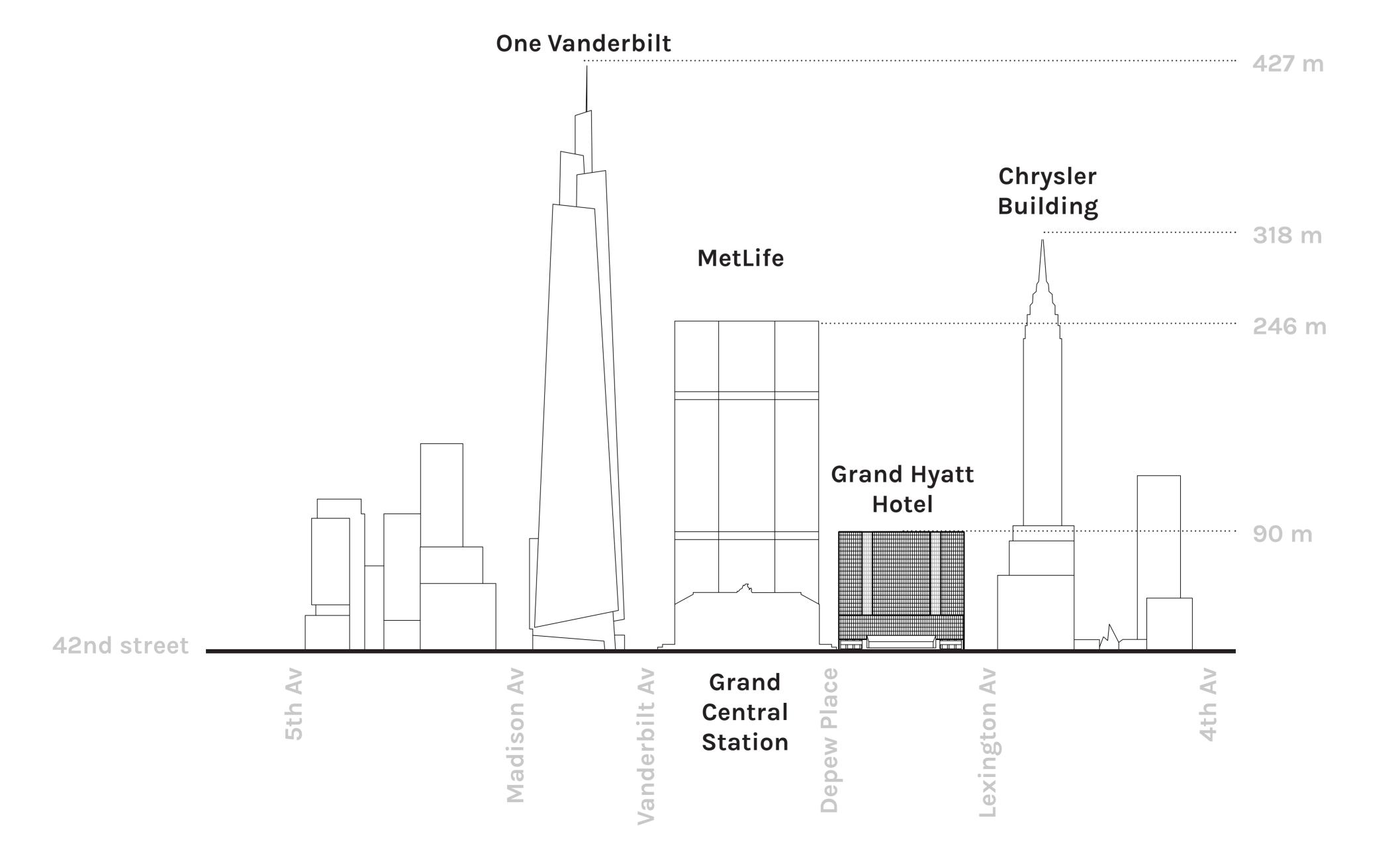
MOBILITY STRATEGY INFLUENCE



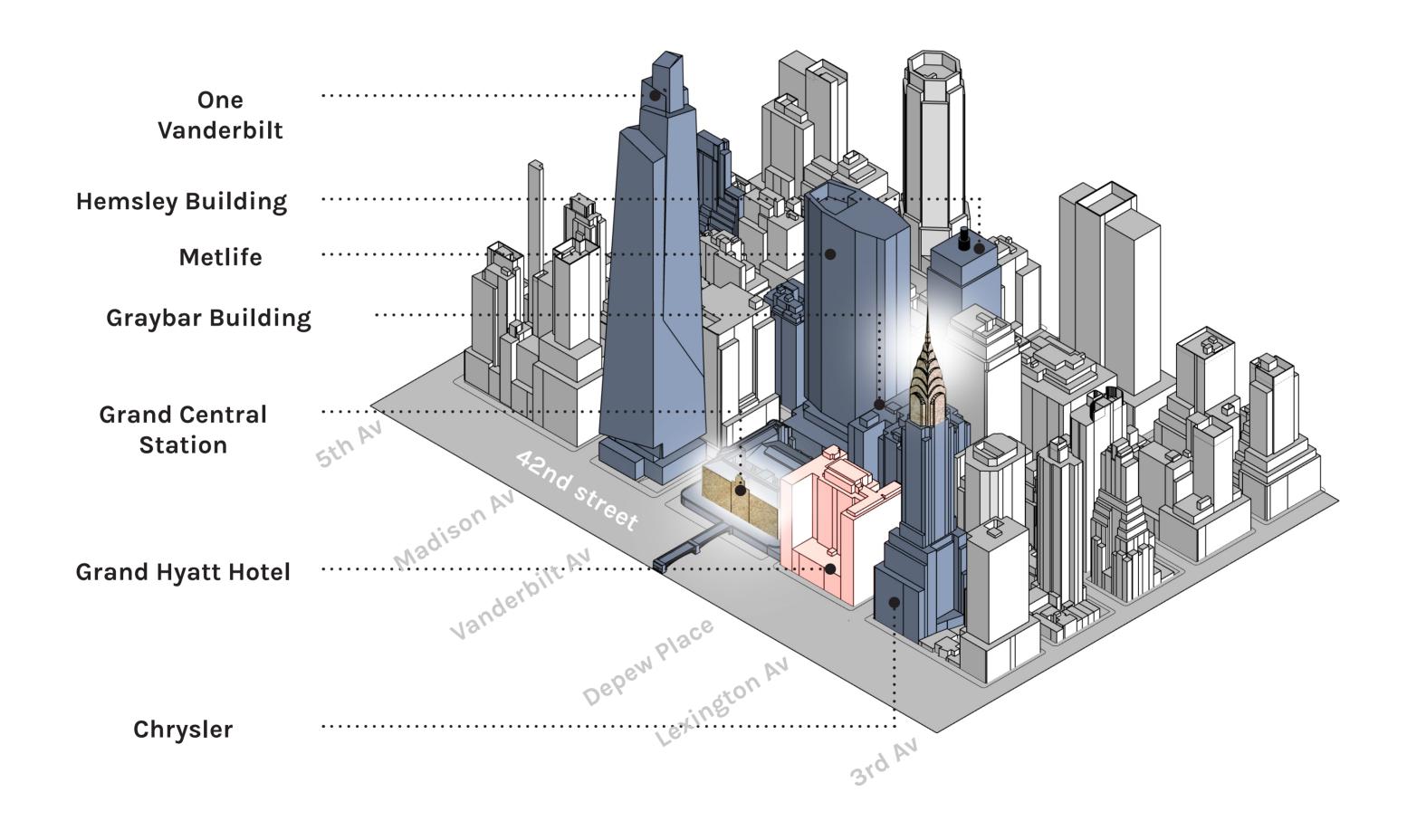
LOCATION PLAN



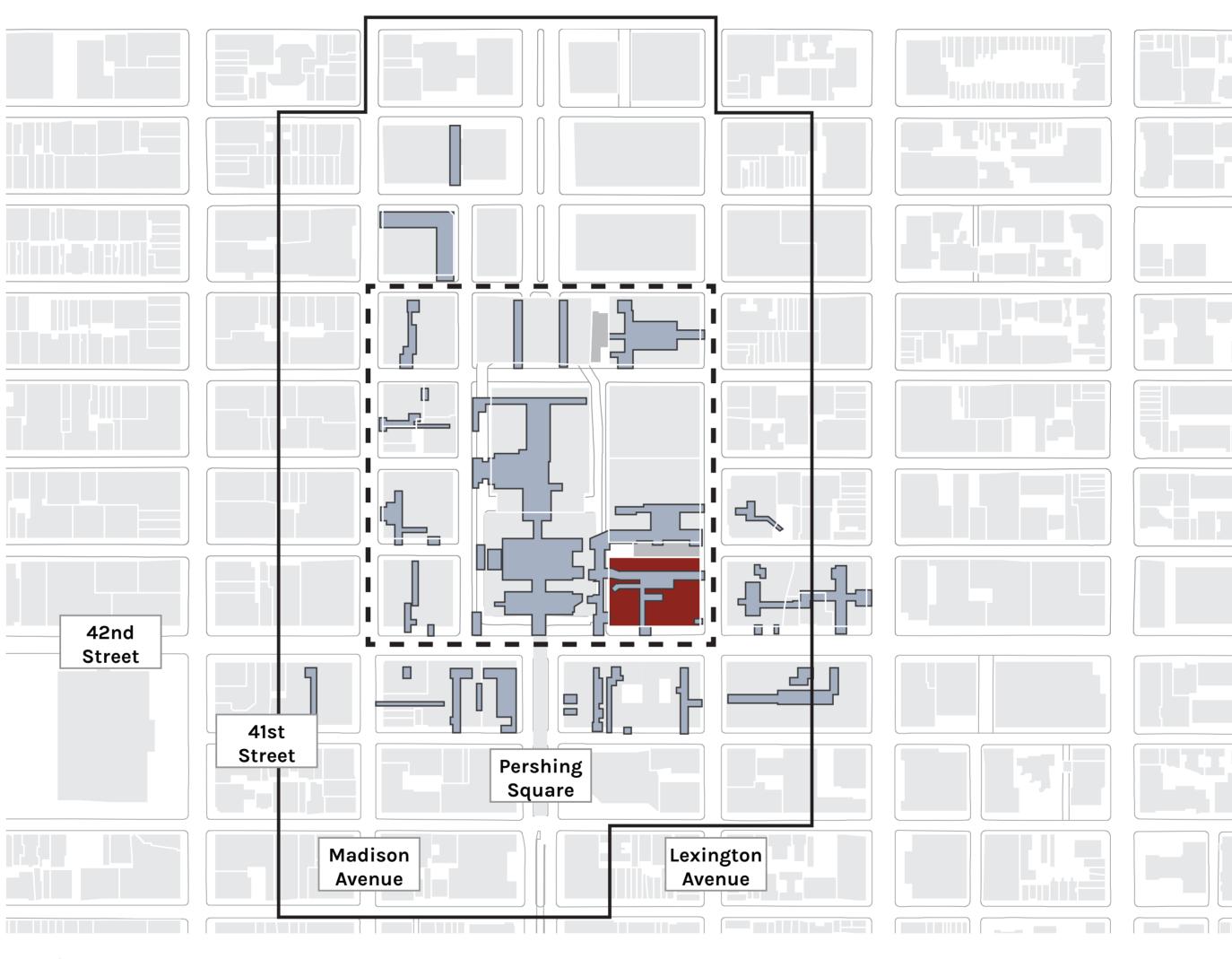
SITE LOCATION



SITE LOCATION LANDMARKS AND ICONIC VIEWS



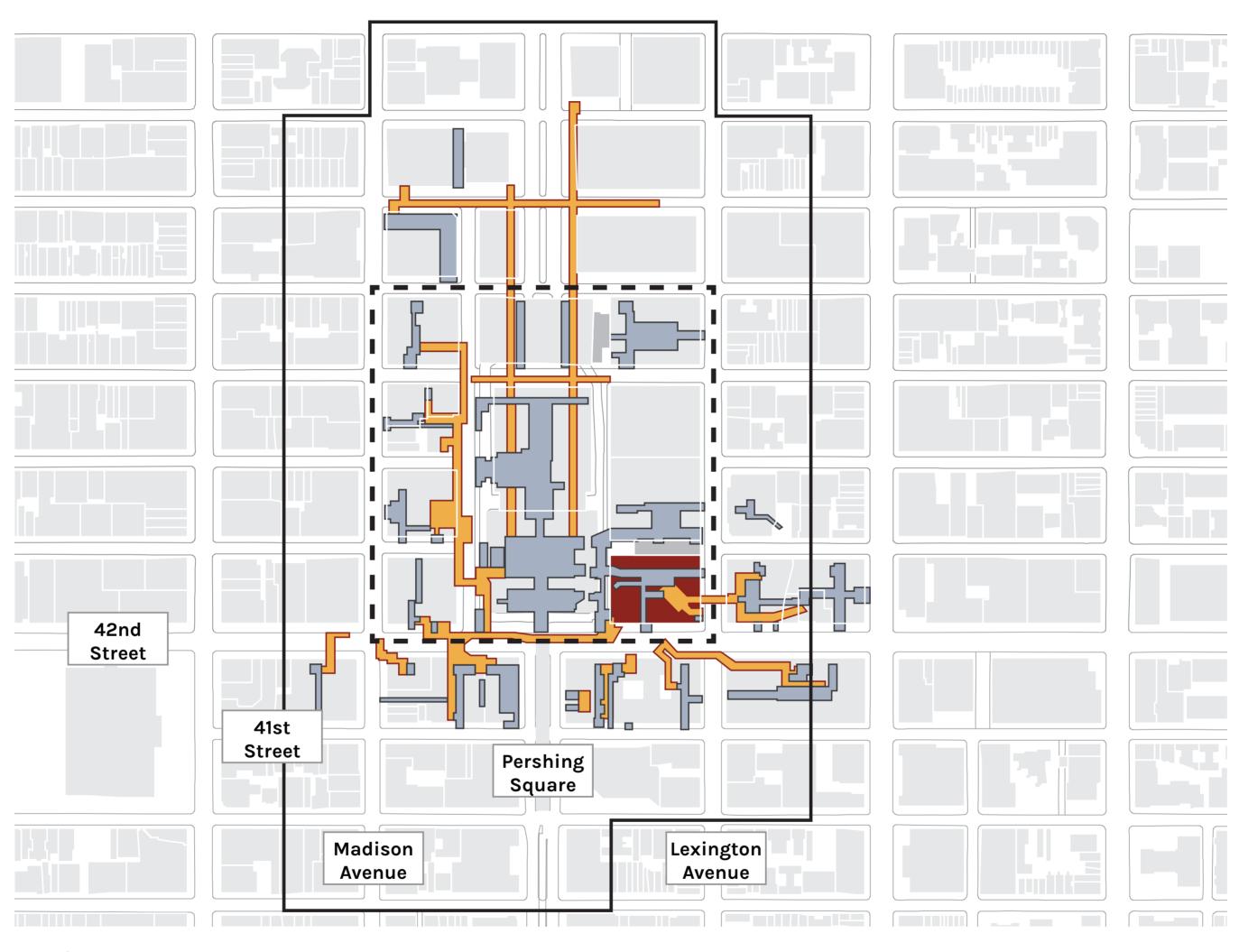
GROUND LEVEL CONNECTIONS



Site

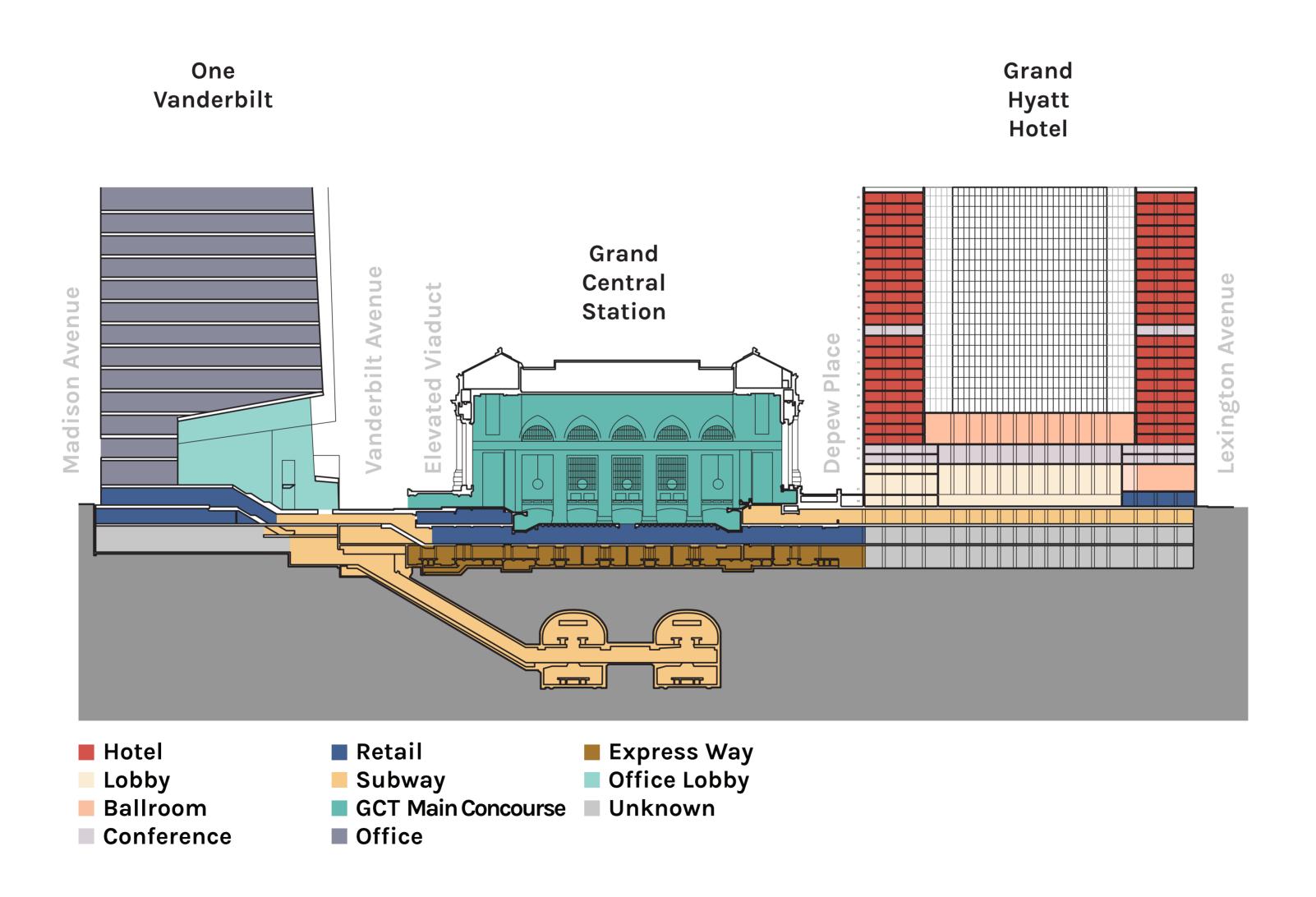
Ground level connections

BELOW GROUND LEVEL CONNECTIONS

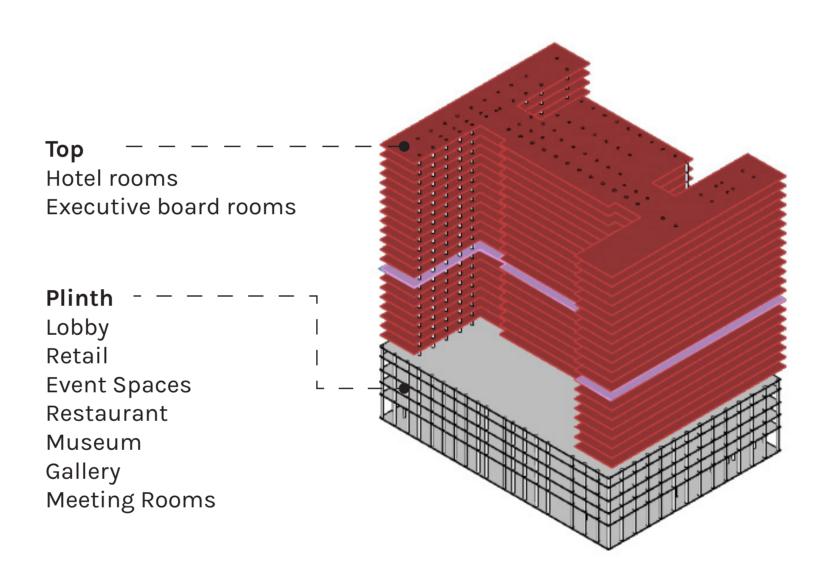


- Site
- Ground level connections
- Below ground connections

INTERCONNECTED FUNCTIONS



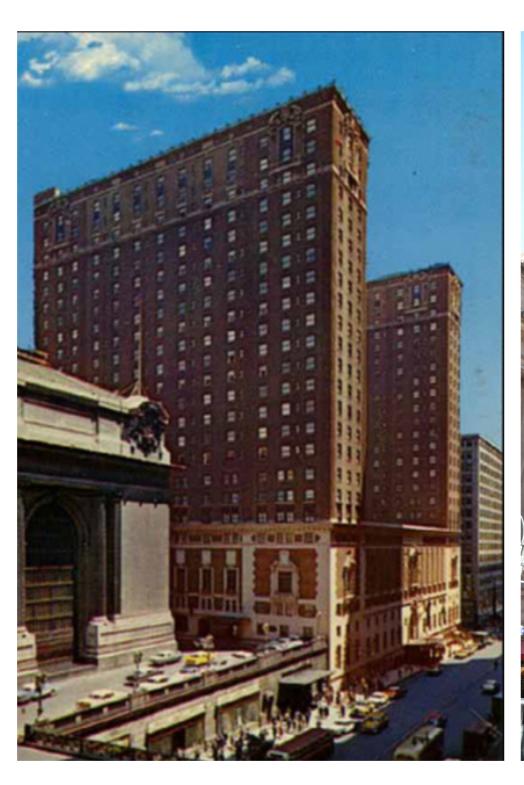
EXISTING HOTEL ORGANISATION



1976 DONALD TRUMP'S REFURBISHMENT

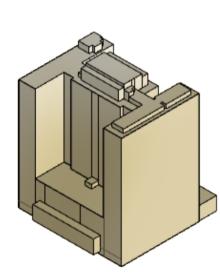


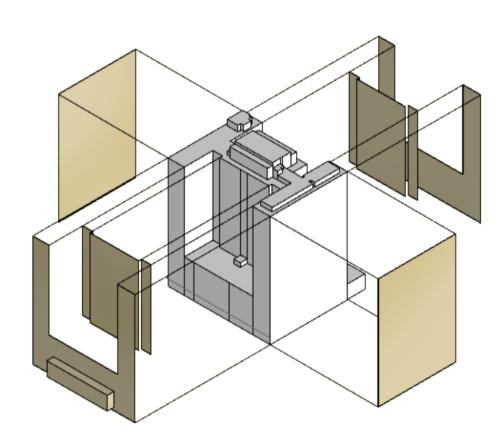
GRAND HYATT BEFORE AND AFTER DONALD TRUMP'S RENOVATION

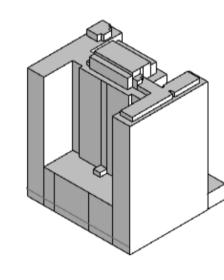




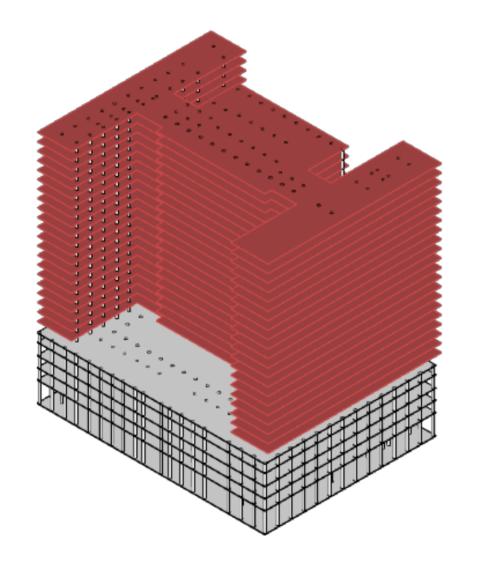
ORIGINAL FACADE REMAINS UNDERNEATH

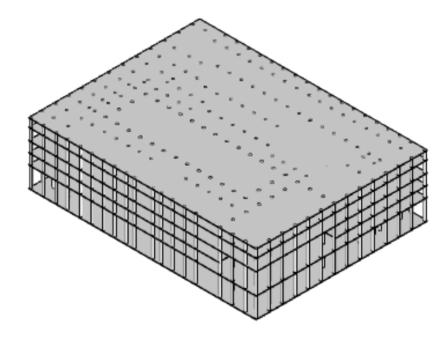






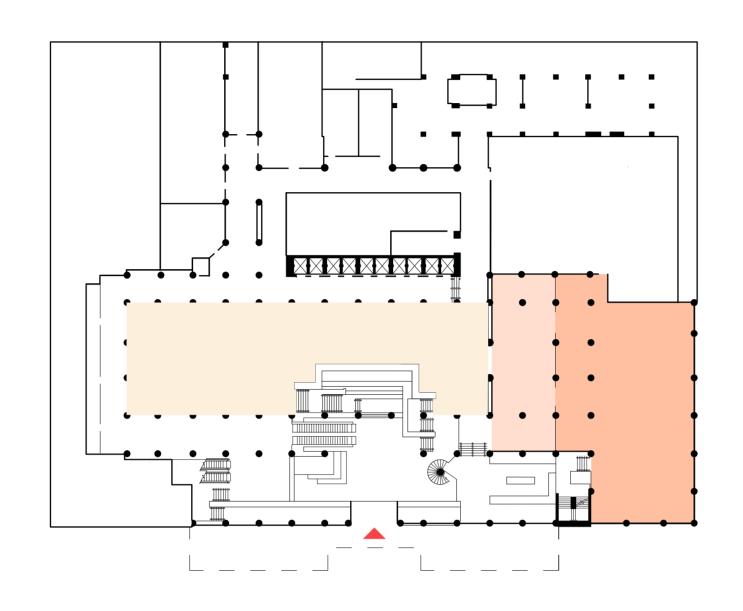
PLINTH CAN BE RETAINED



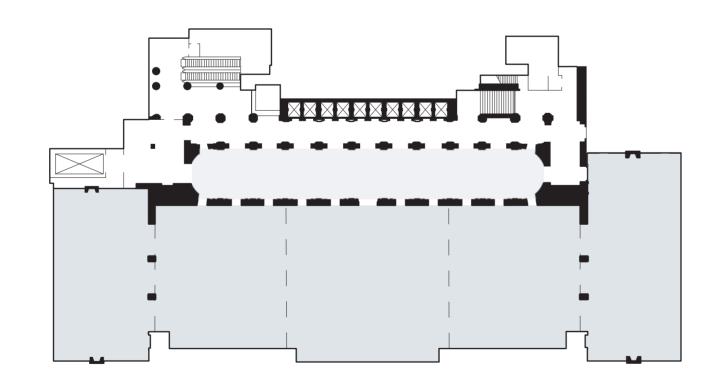


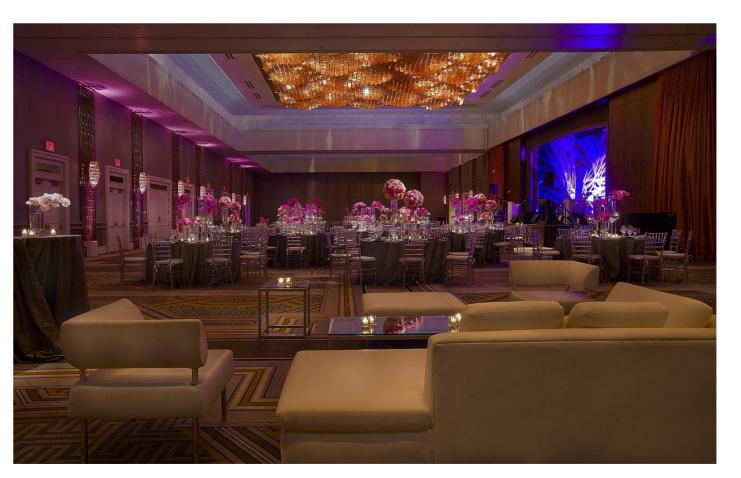
Demolish the top, retain the base

EVENTS SPACES WITH HIGH CEILINGS









PROPOSAL

DEMOCRATIC SPACES

Hotel

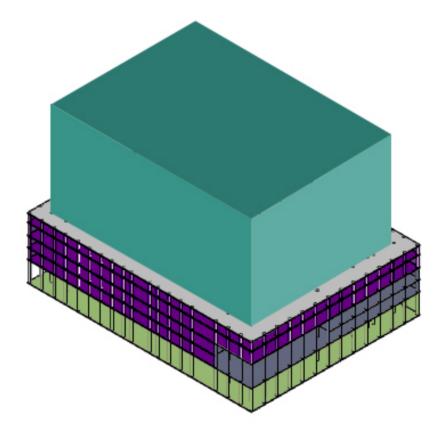
New construction

Municipality

Community Board

Reuse Grand Hyatt plinth

Public Space

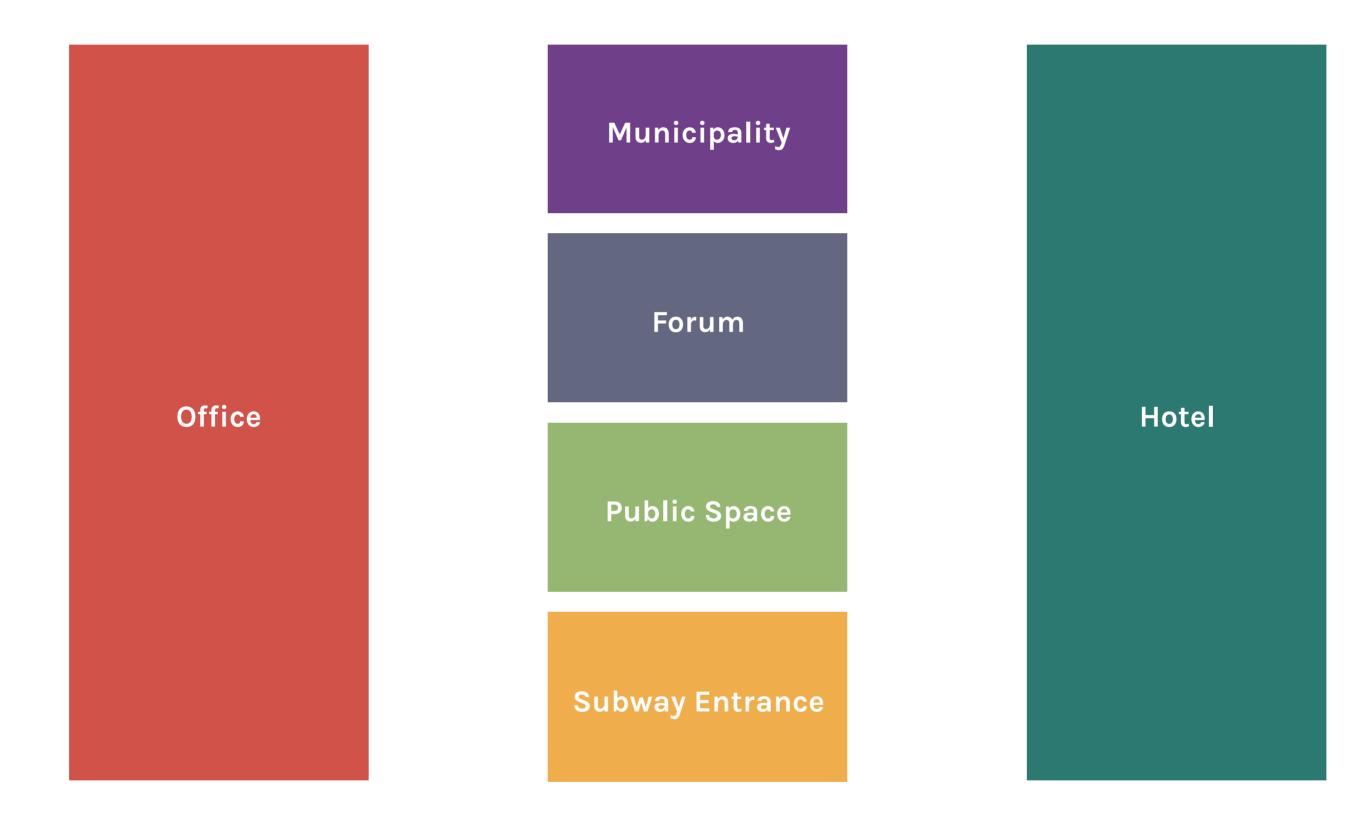


DEMOCRATIC SPACES WITH PUBLIC AND PRIVATE PROGRAMS

Office **New construction** Hotel Municipality **Reuse Grand** Forum **Hyatt plinth** Public Space Subway

Entrance

FUNCTIONS



CLIENTS

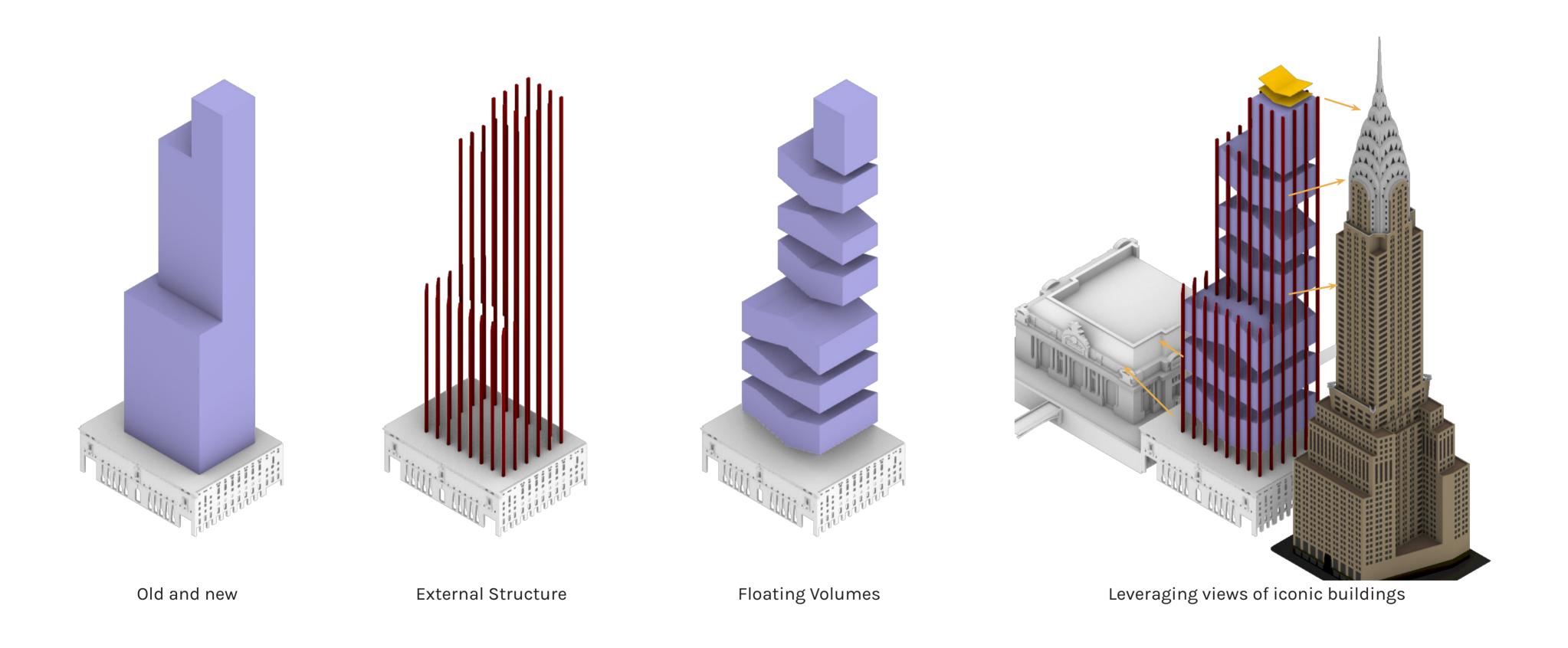






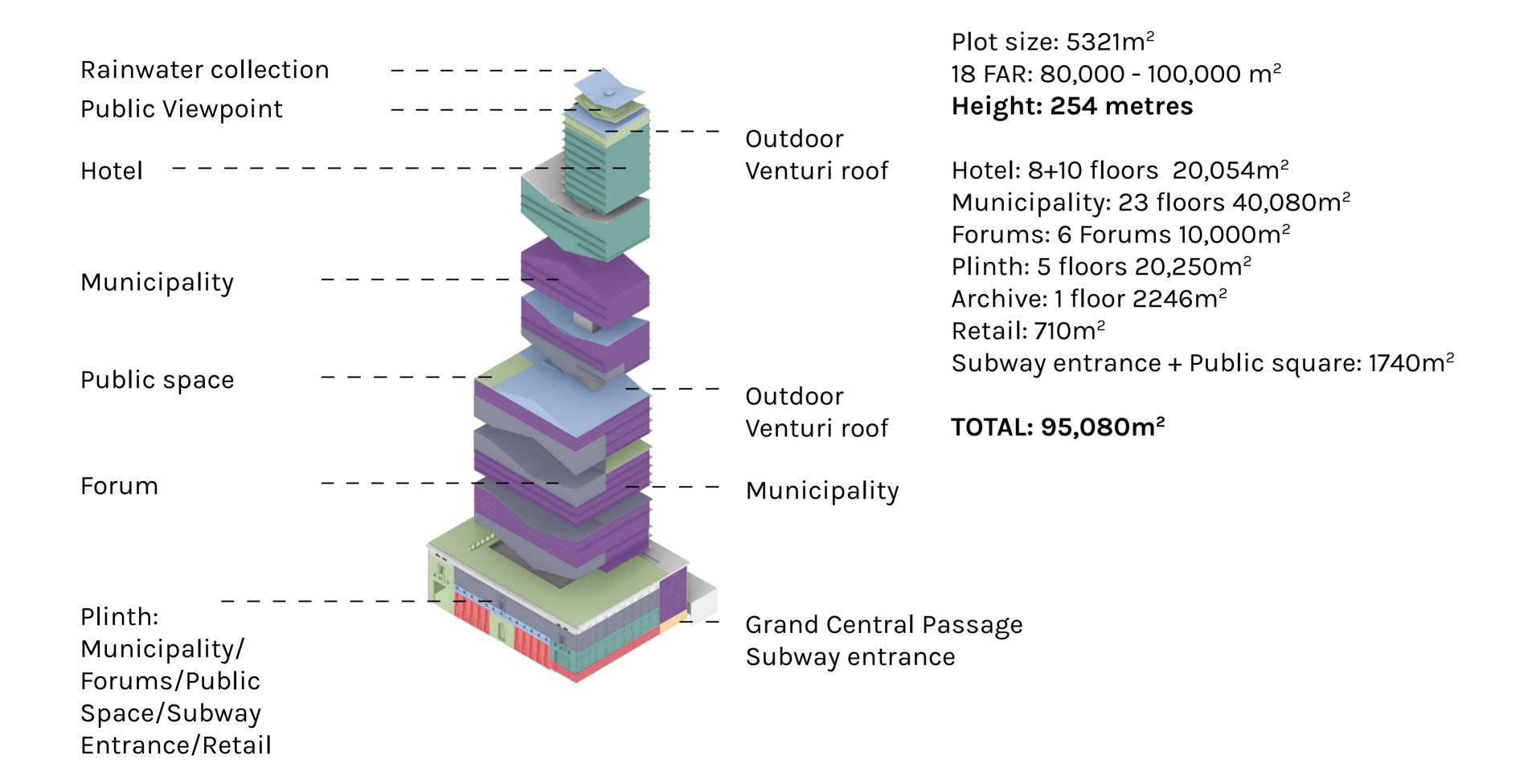
Private Public Hotel

SPATIAL CONCEPT



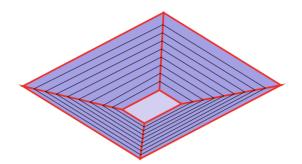
PROGRAM ARRANGEMENT (18 FAR)

Multi-use building with public, retail and hotel functions

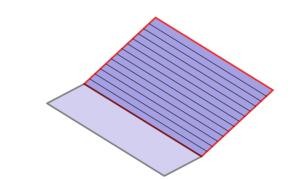


FORMAL CONCEPT

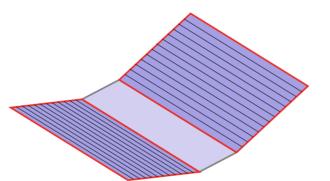
Using one form for several typologies of forum spaces



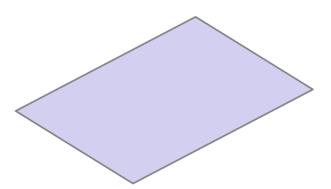
1. The centrally oriented forum



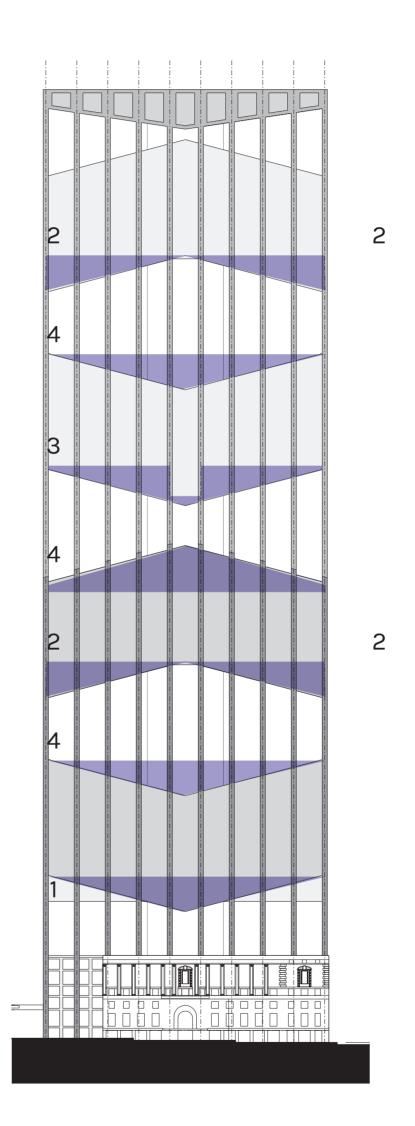
2. One sided forum



3. Opposing sides forum

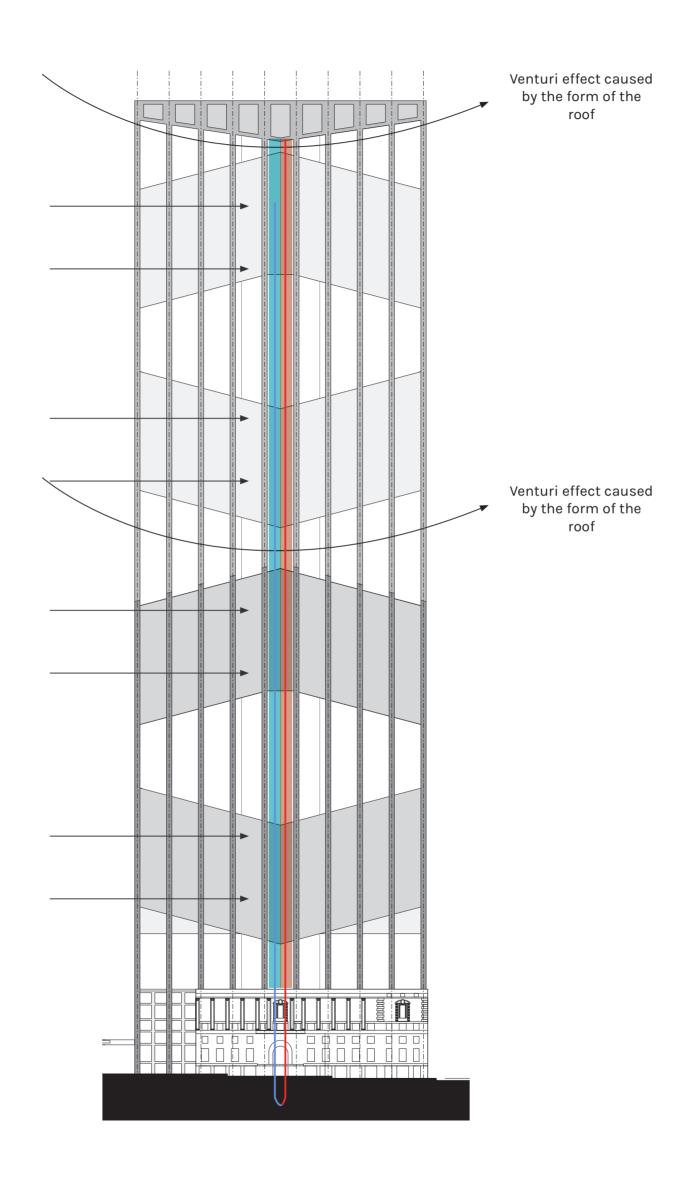


4. Outdoor forum



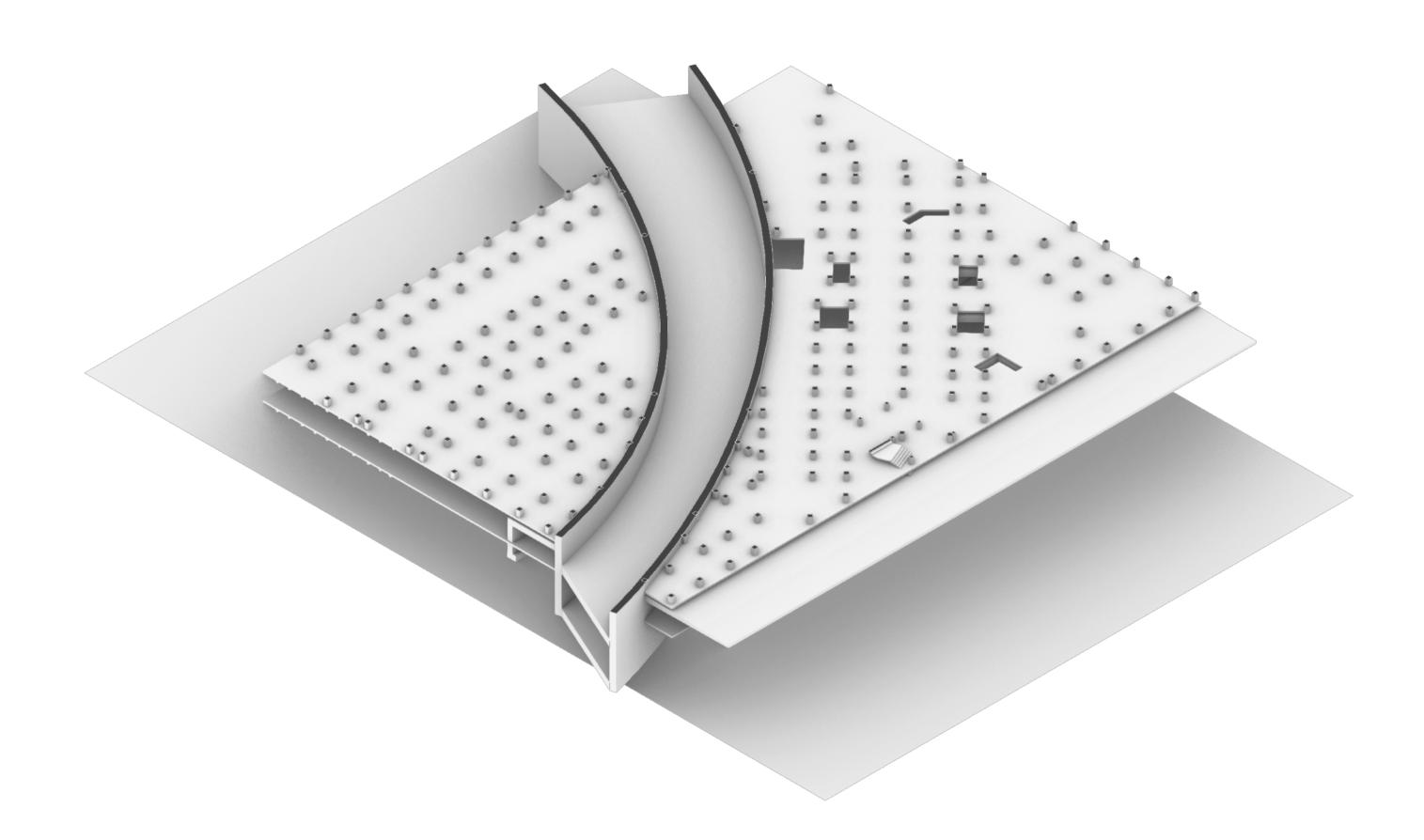
INTEGRATING FORM WITH NATURAL VENTILATION

Applying Earth Wind Fire concepts developed by Ben Bronsema

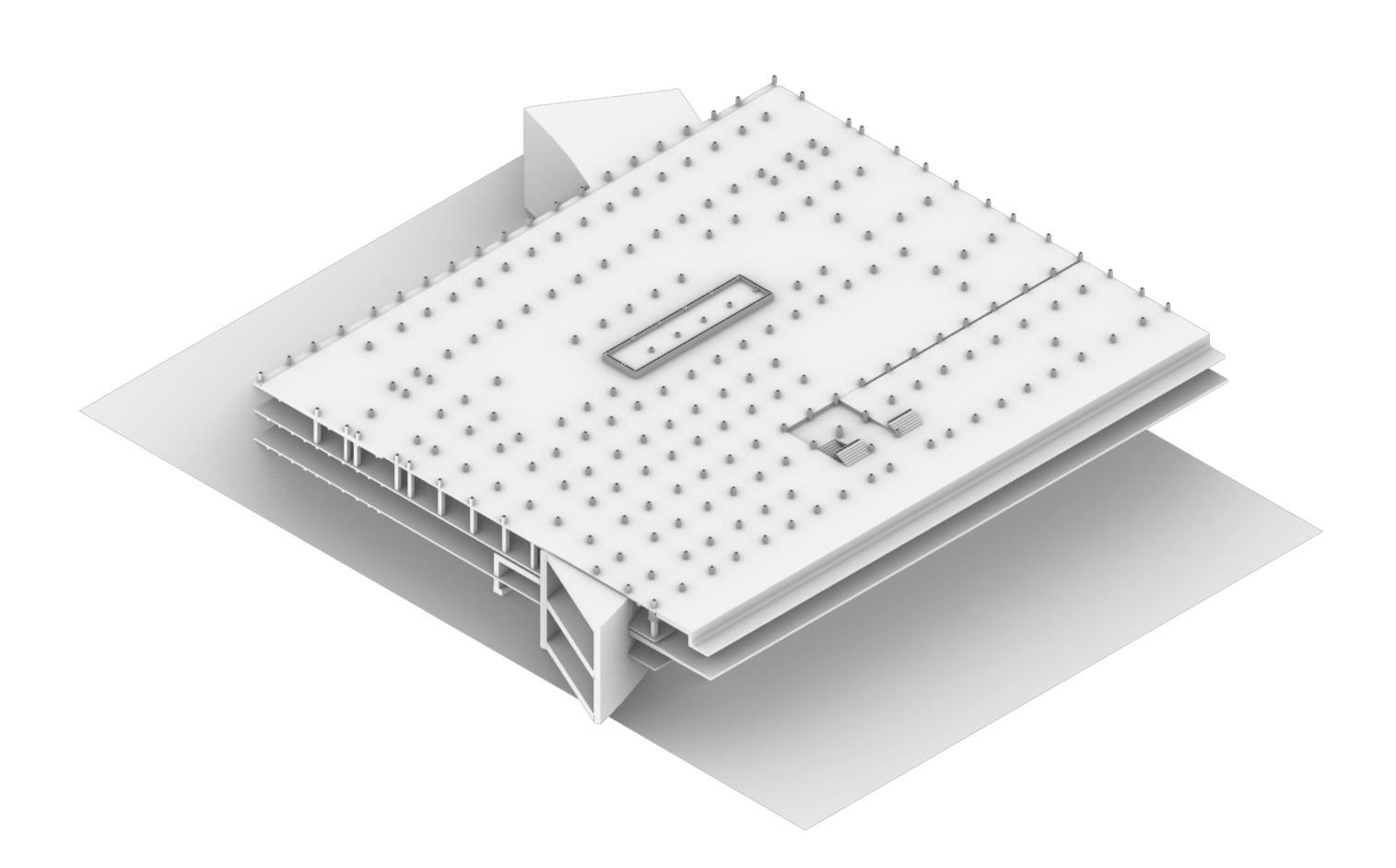


EXISTING BUILDING ANALYSIS

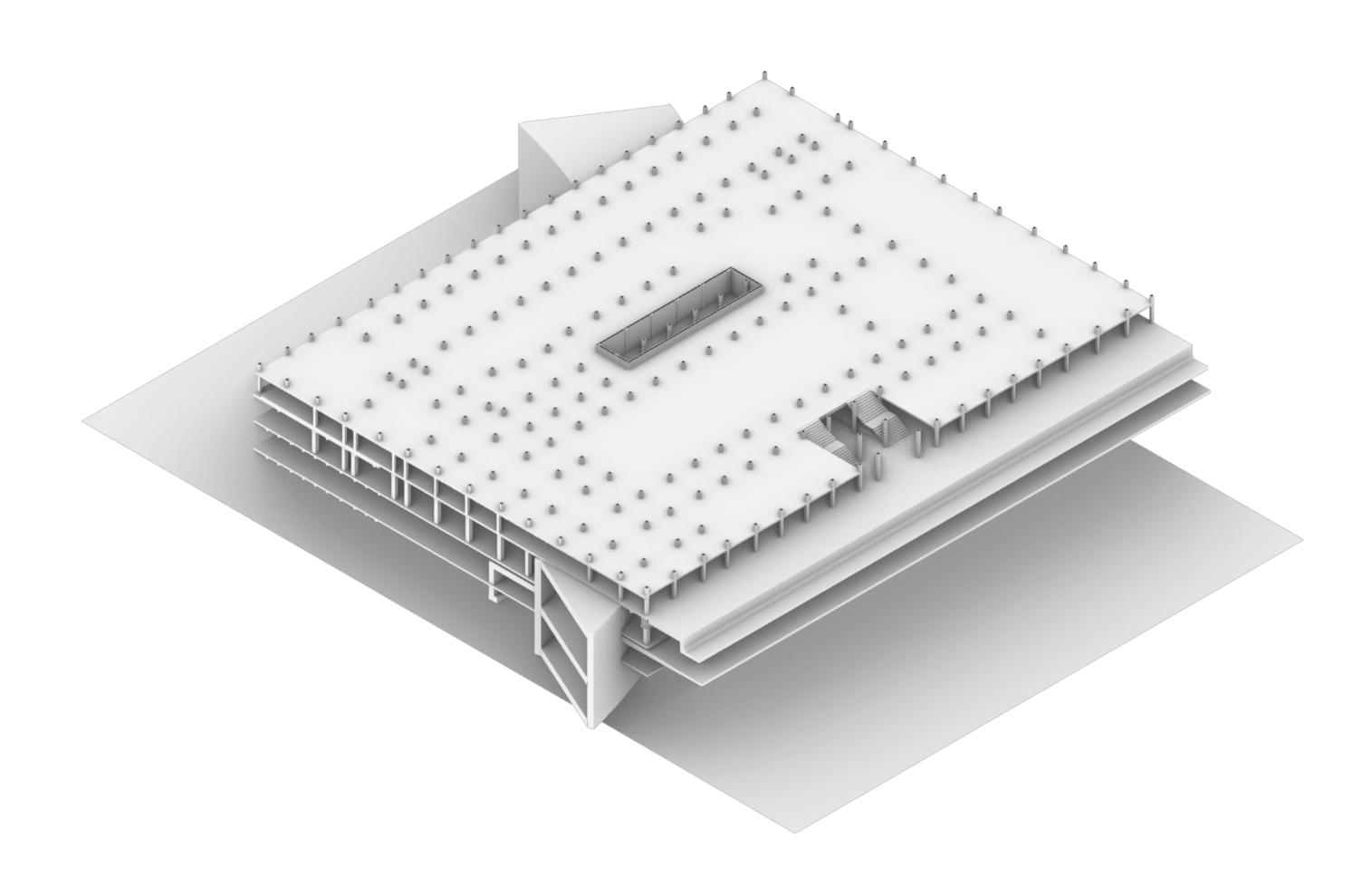
EXISTING BUILDING BASEMENT



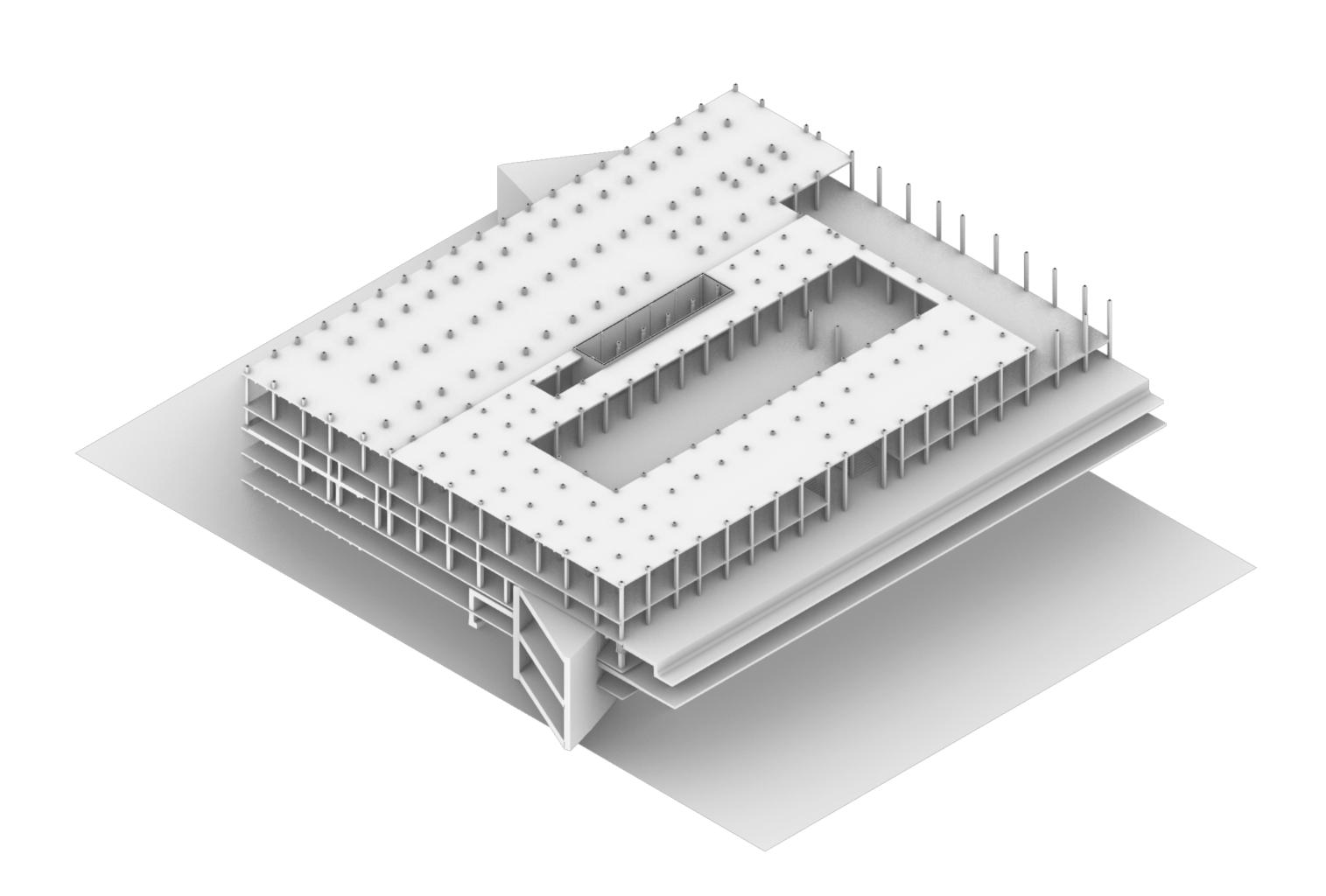
EXISTING BUILDING GROUND



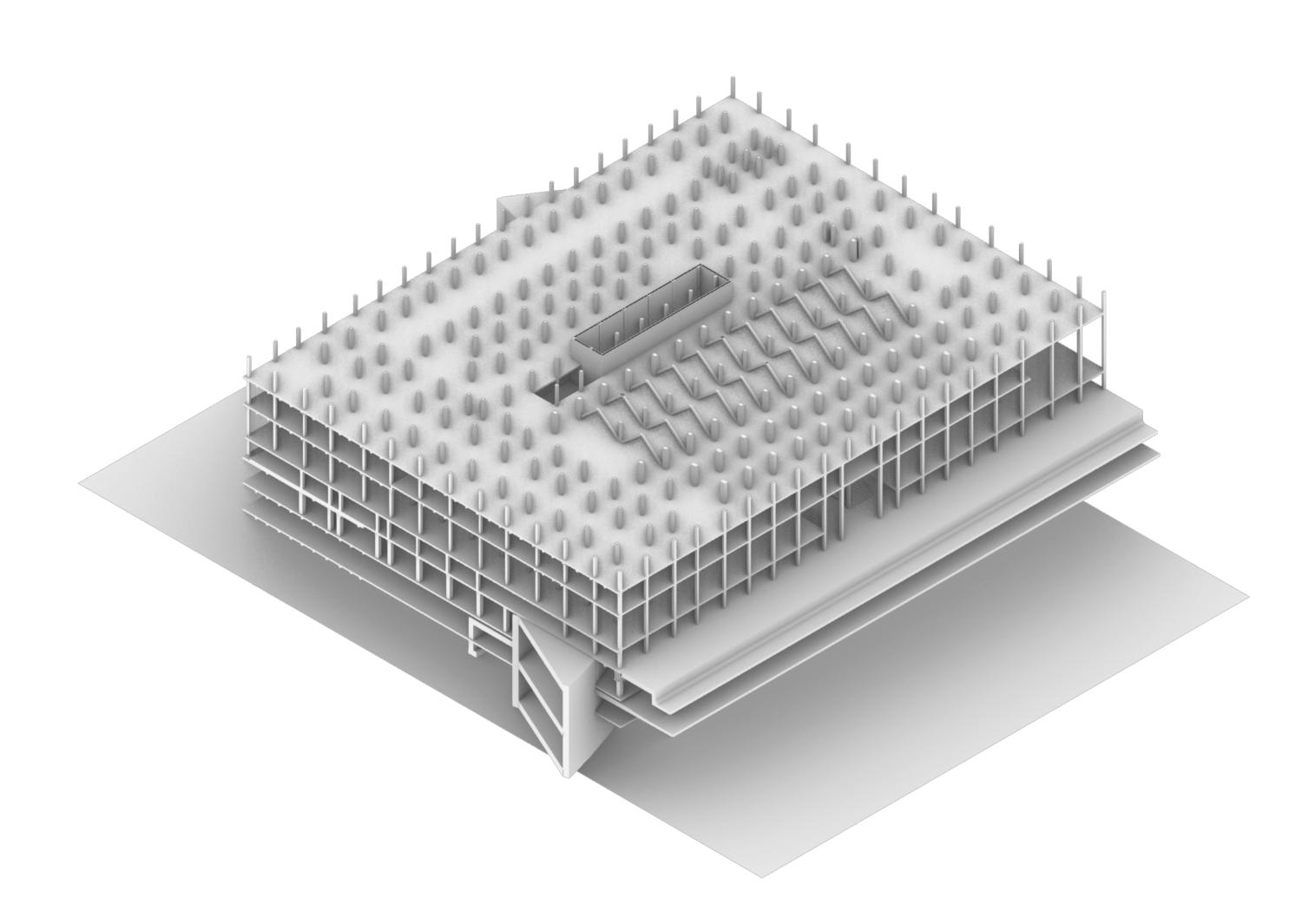
EXISTING BUILDING UPPER GROUND



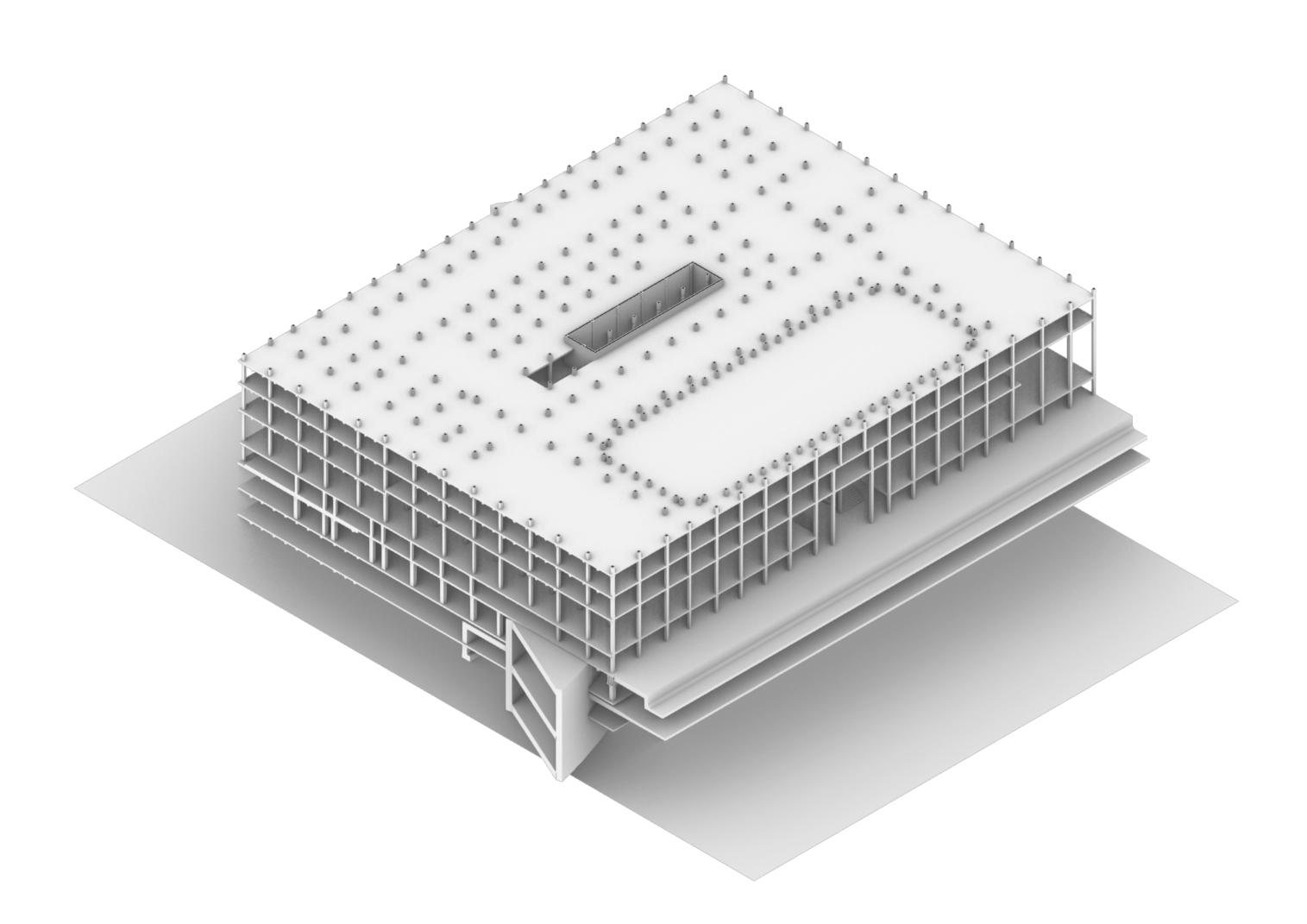
EXISTING BUILDING MEZZANINE



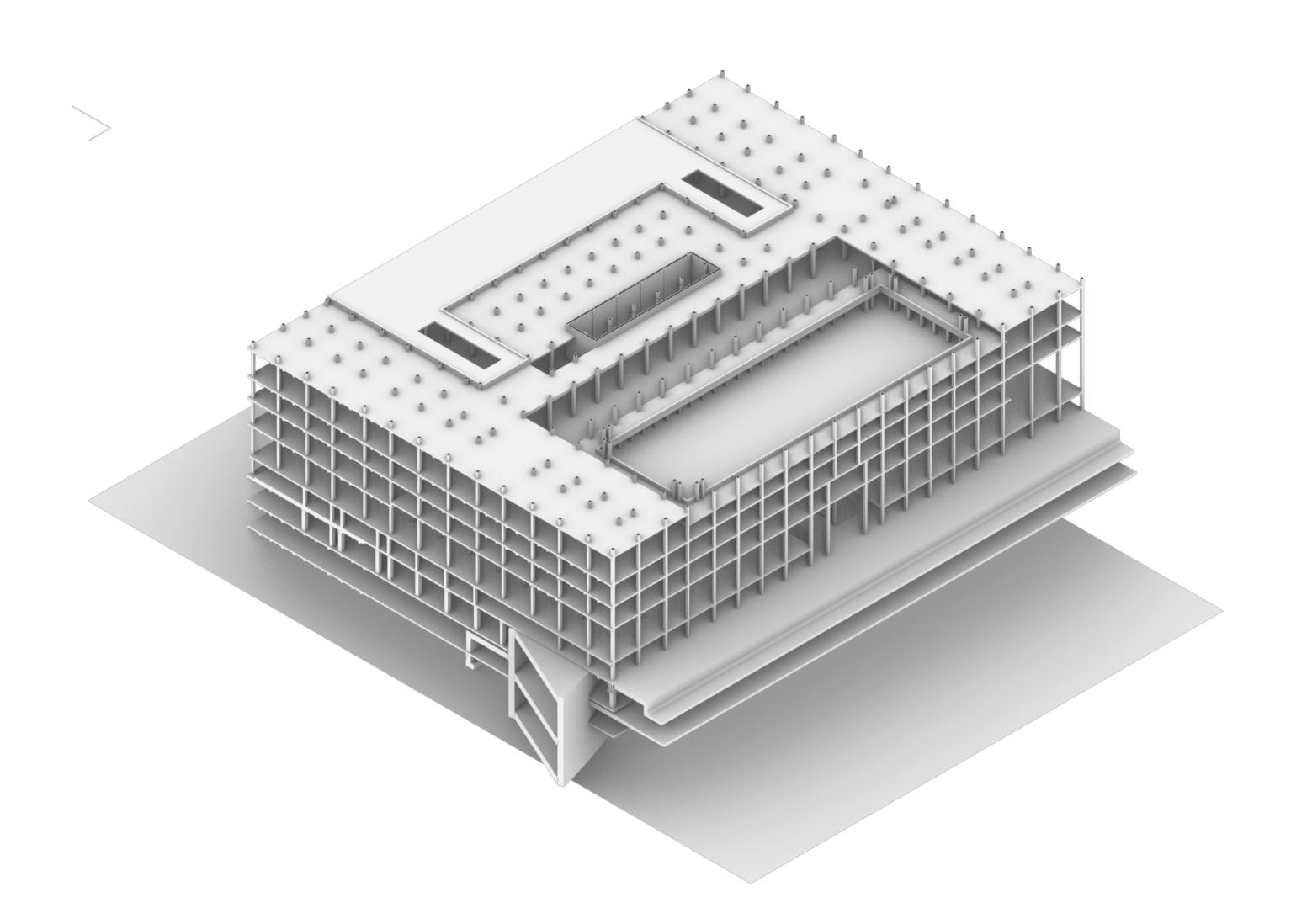
EXISTING BUILDING TRUSS LEVEL



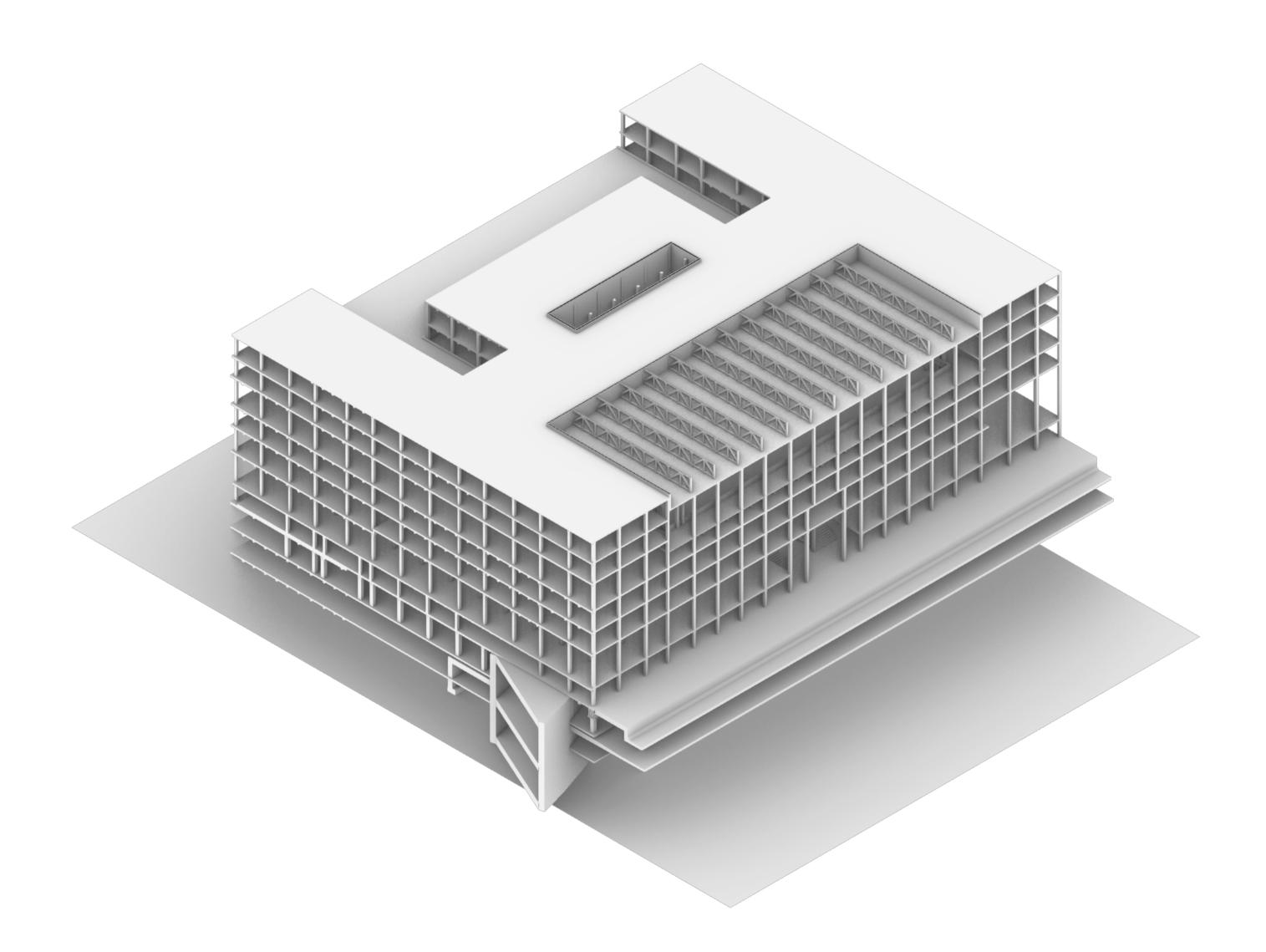
EXISTING BUILDING BALLROOM LEVEL



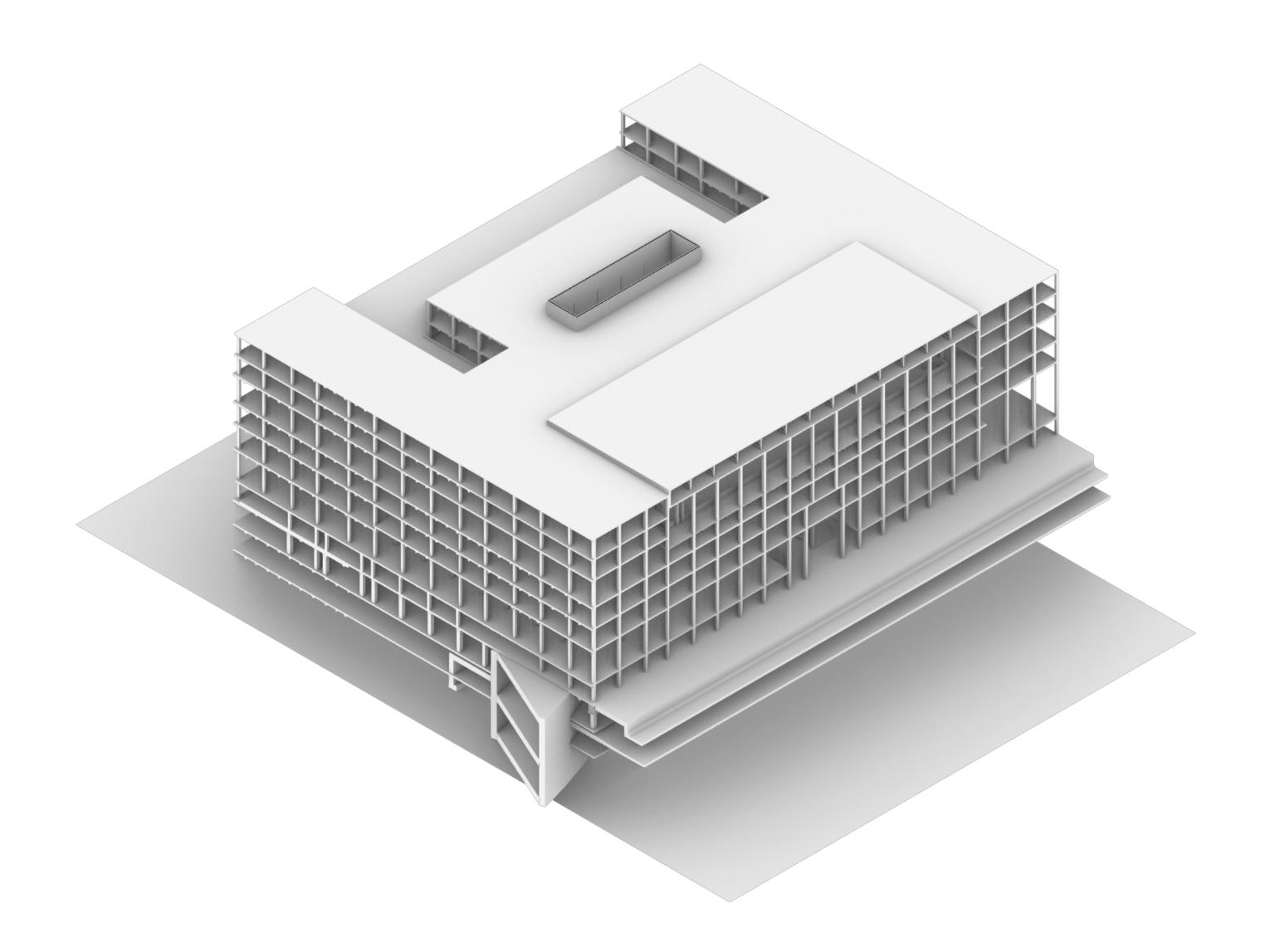
EXISTING BUILDING UPPER GRAND BALLROOM LEVEL



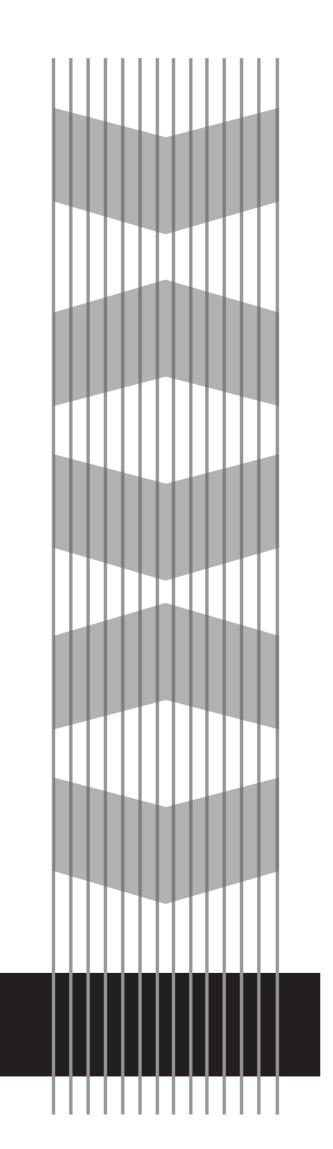
EXISTING BUILDING UPPER GRAND BALLROOM LEVEL



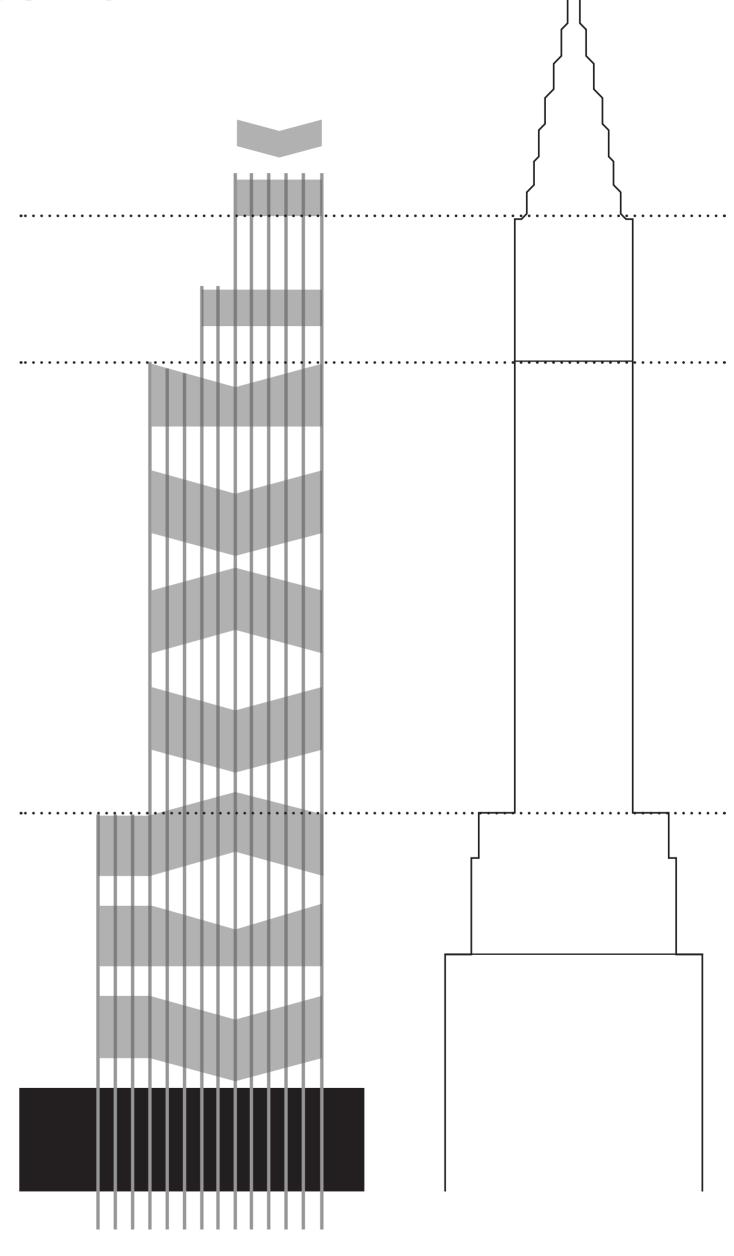
EXISTING BUILDING UPPER GRAND BALLROOM LEVEL



STRUCTURE AND MASSING

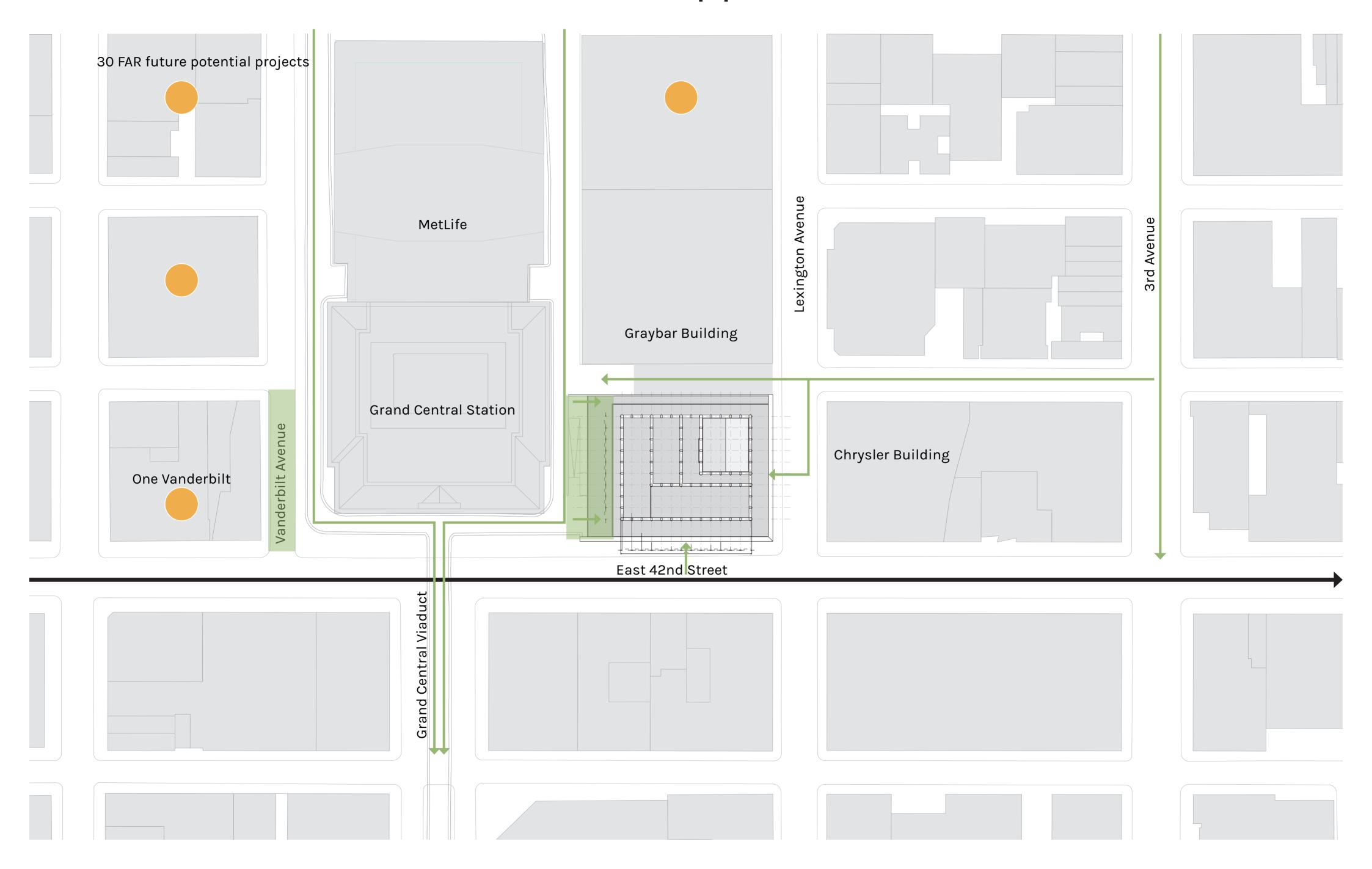


New columns pierce through old structure, supporting internal volumes

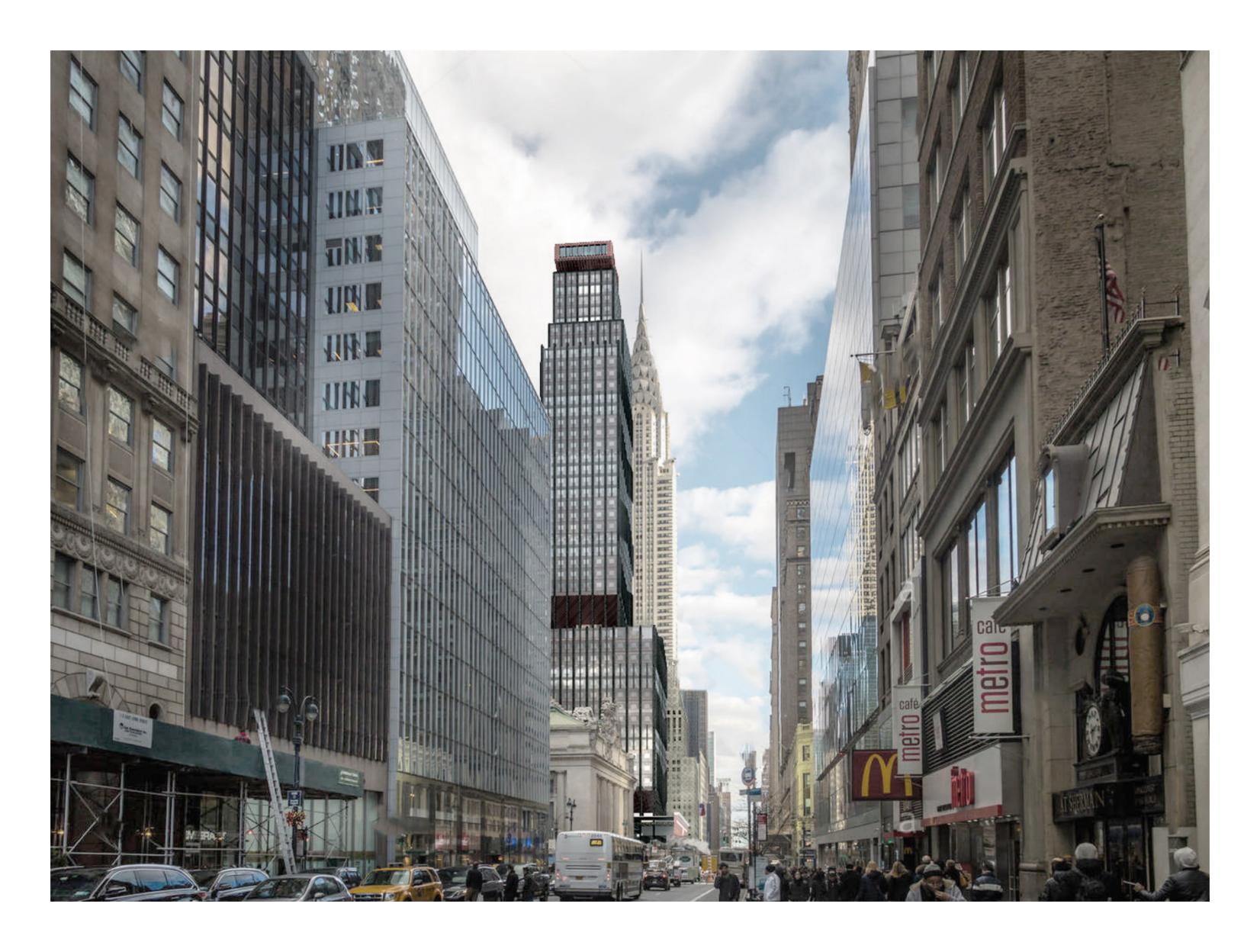


Set backs and modulations respond to Manhattan's character and immediate neighbours

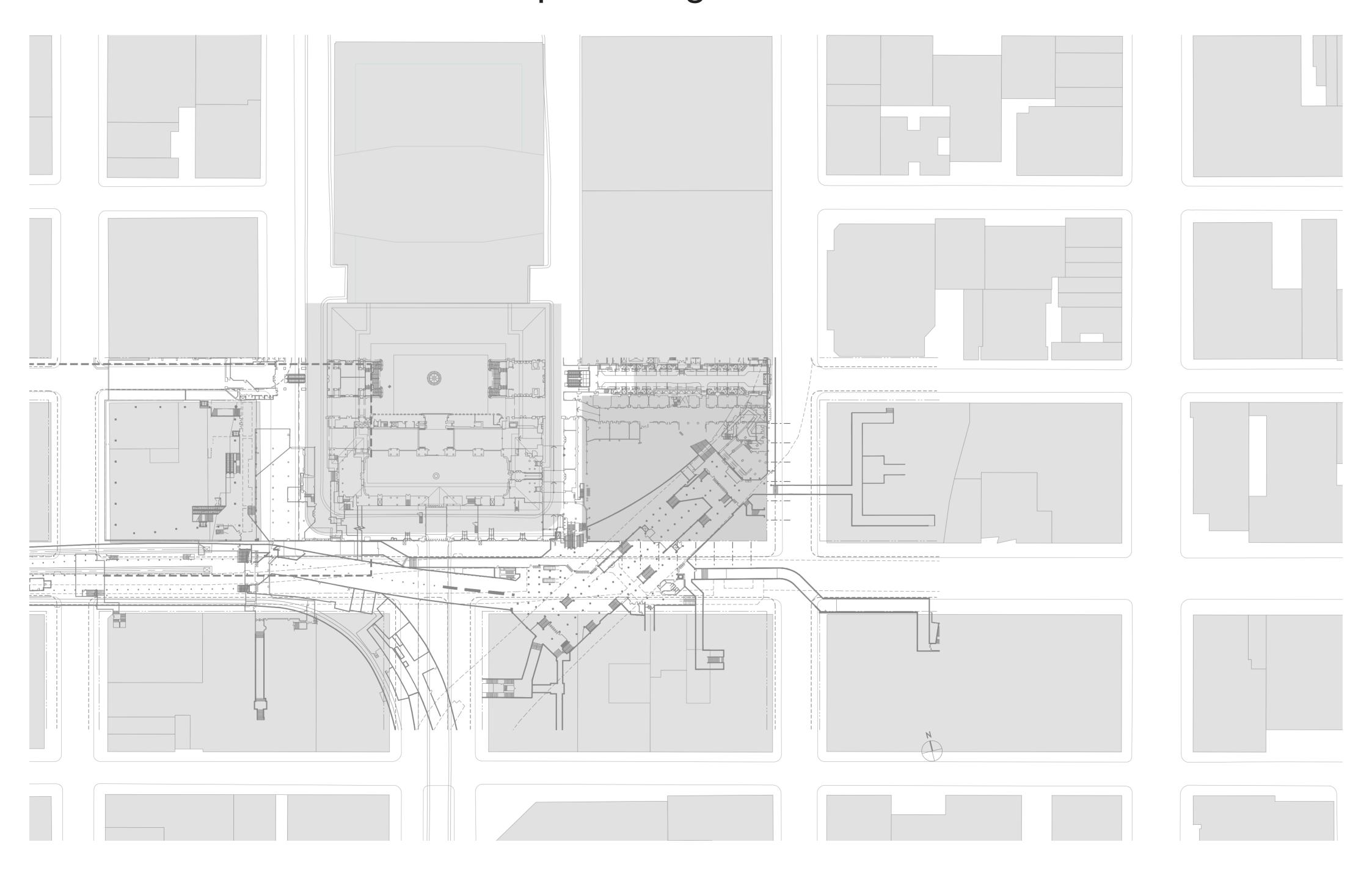
Roof top plan



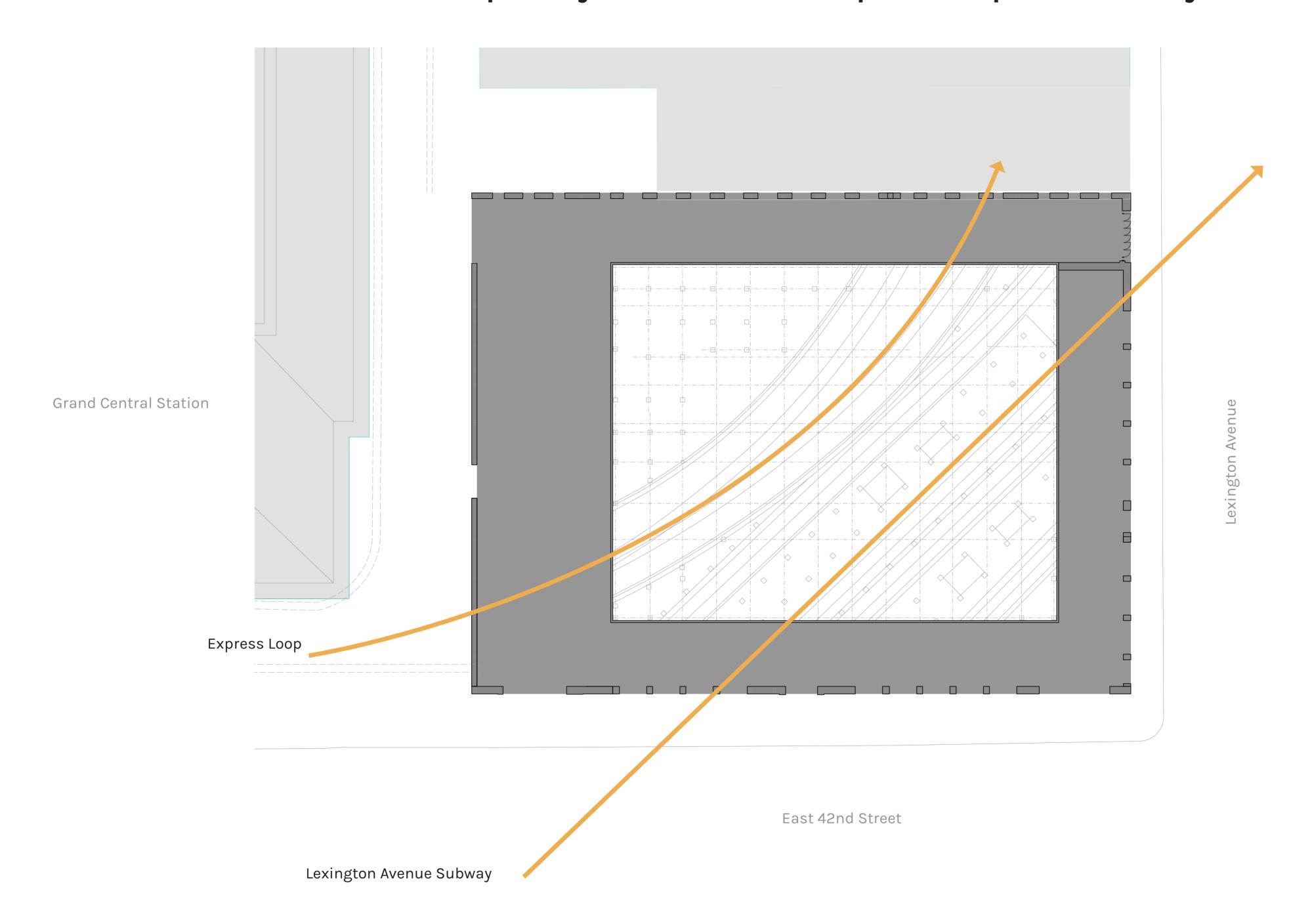
Set-backs preserve views of Chrysler building



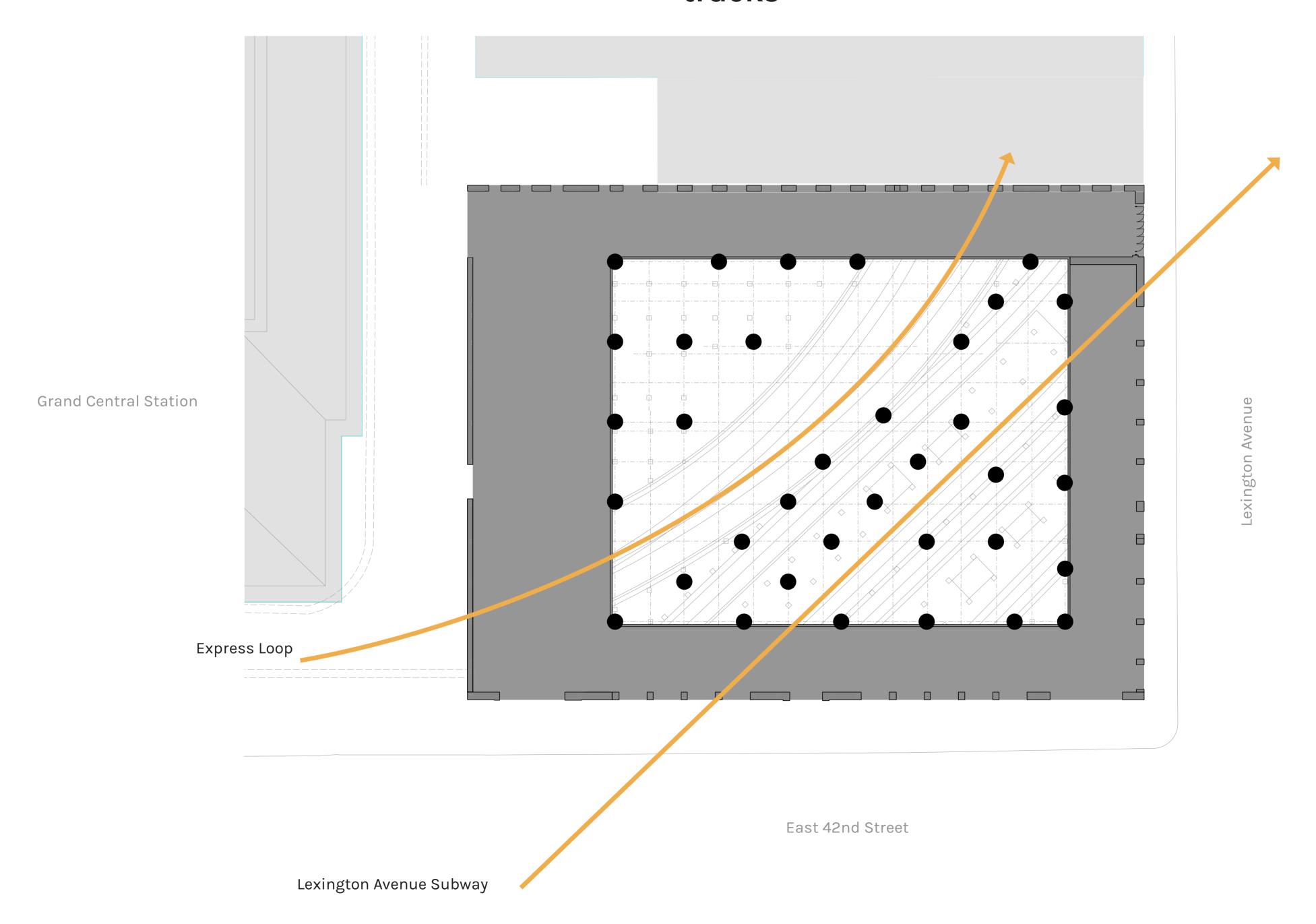
Complex Underground network



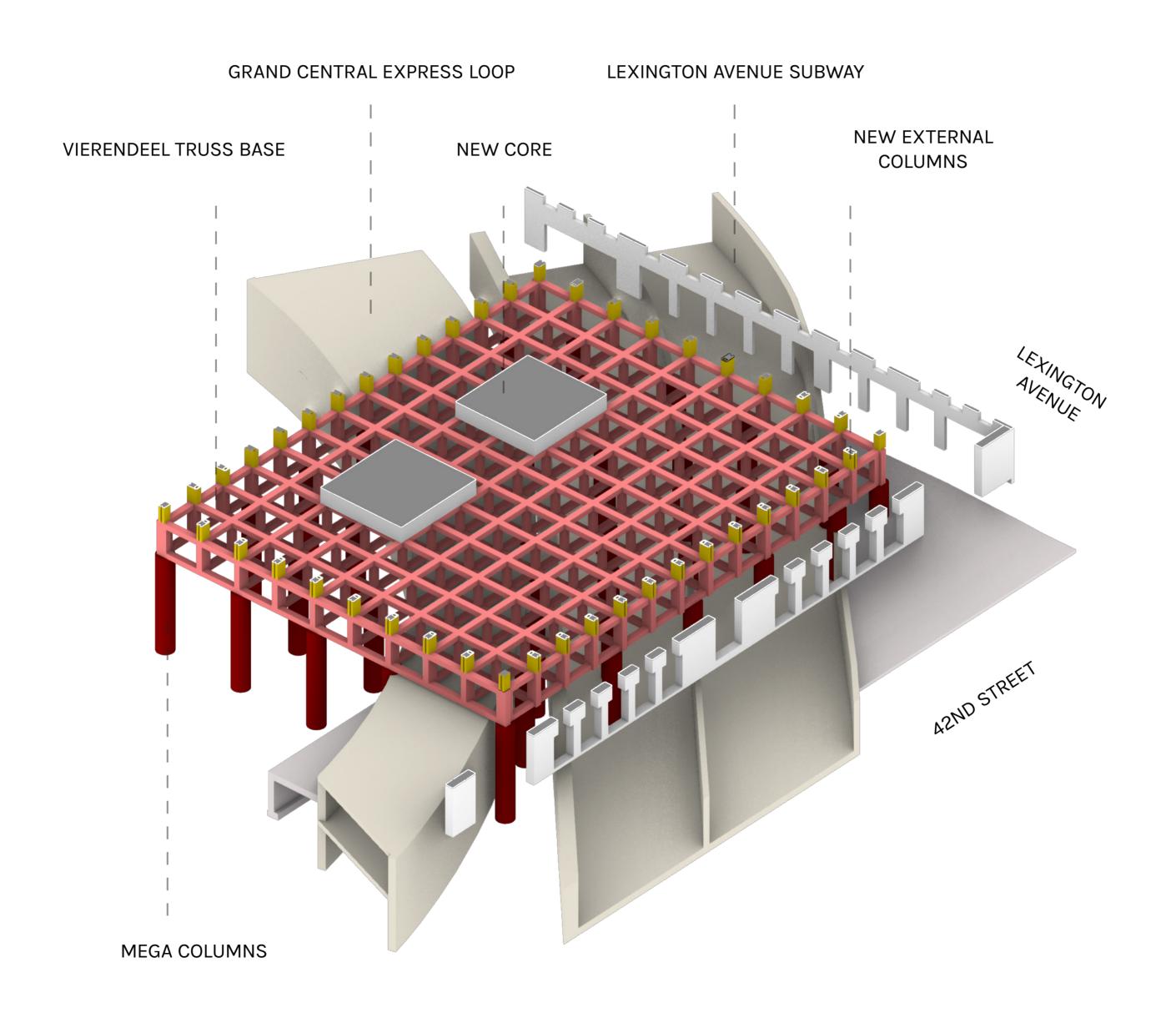
Basement occupied by Grand Central Express loop and Subway



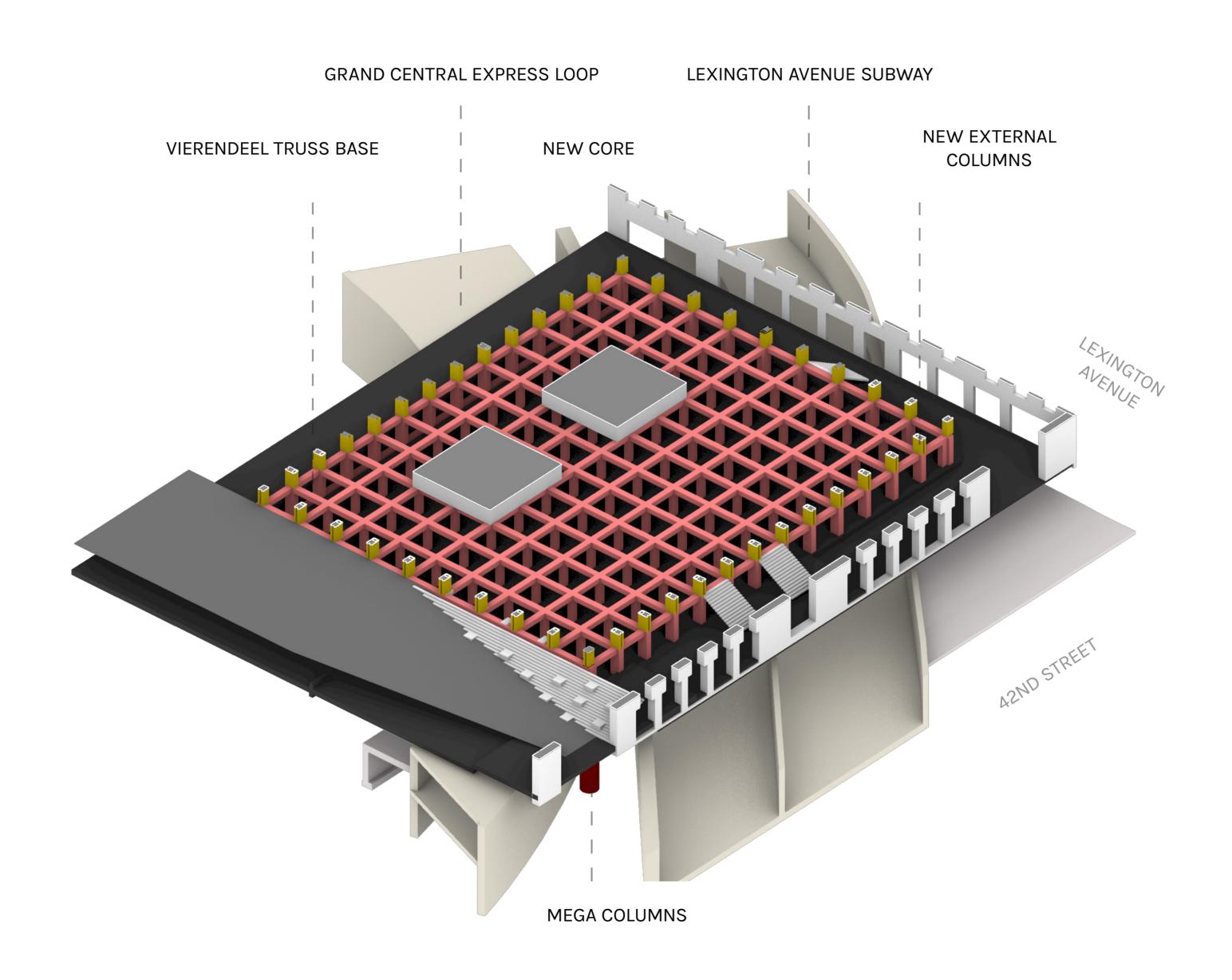
Mega Columns used for new foundations positioned to avoid train tracks



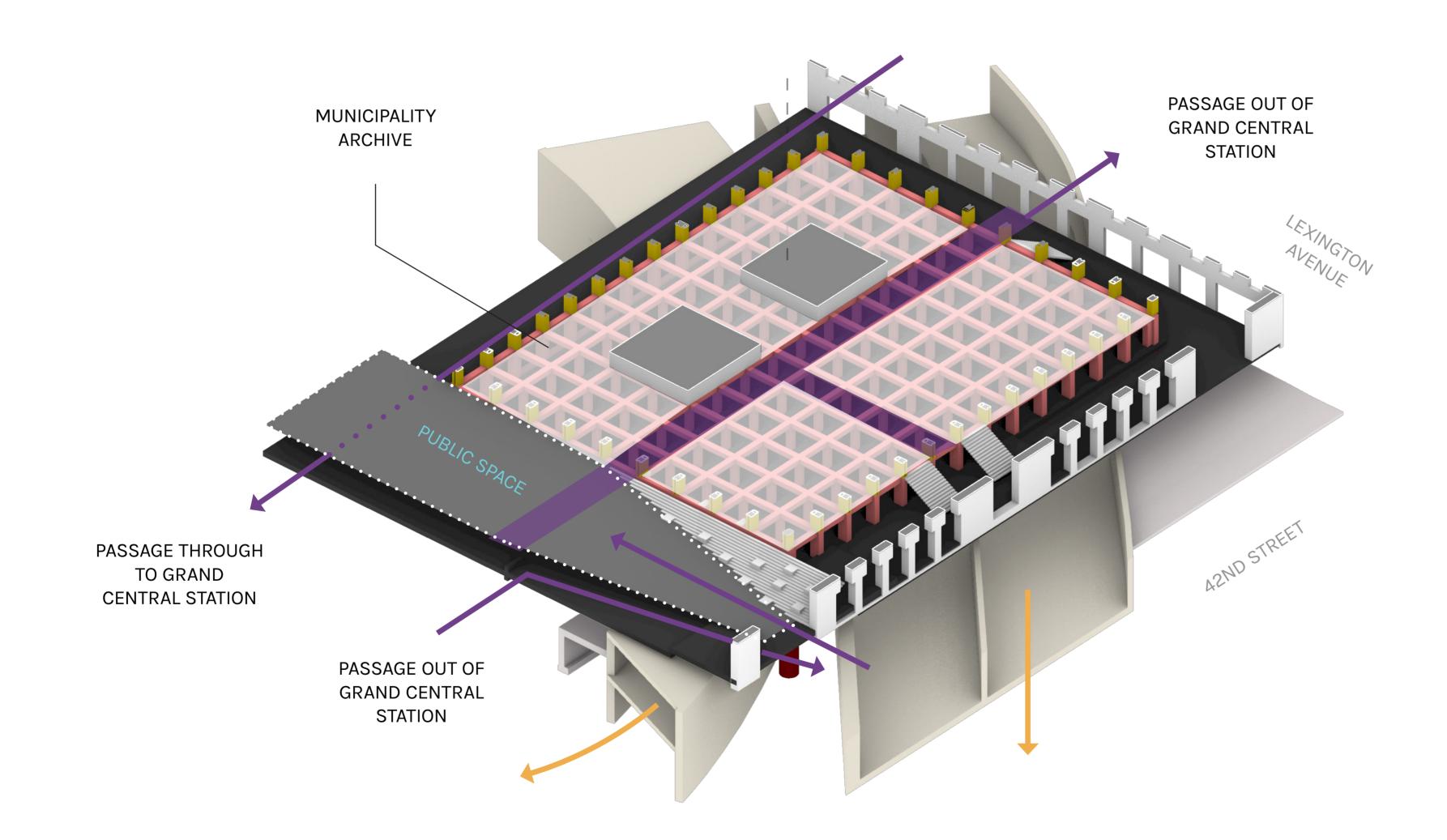
GROUND FLOOR VIERENDEEL STRUCTURE



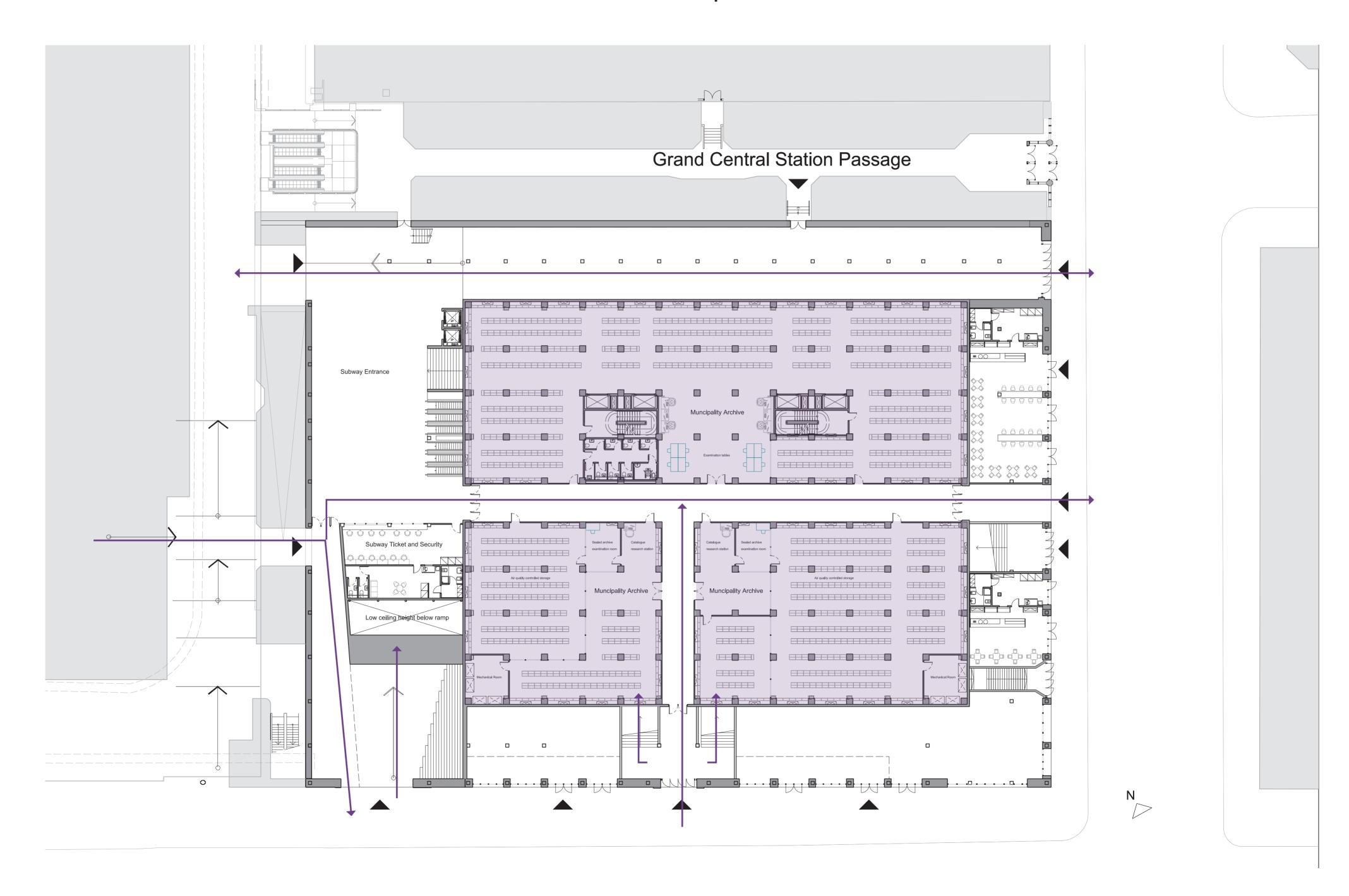
GROUND FLOOR VIERENDEEL STRUCTURE



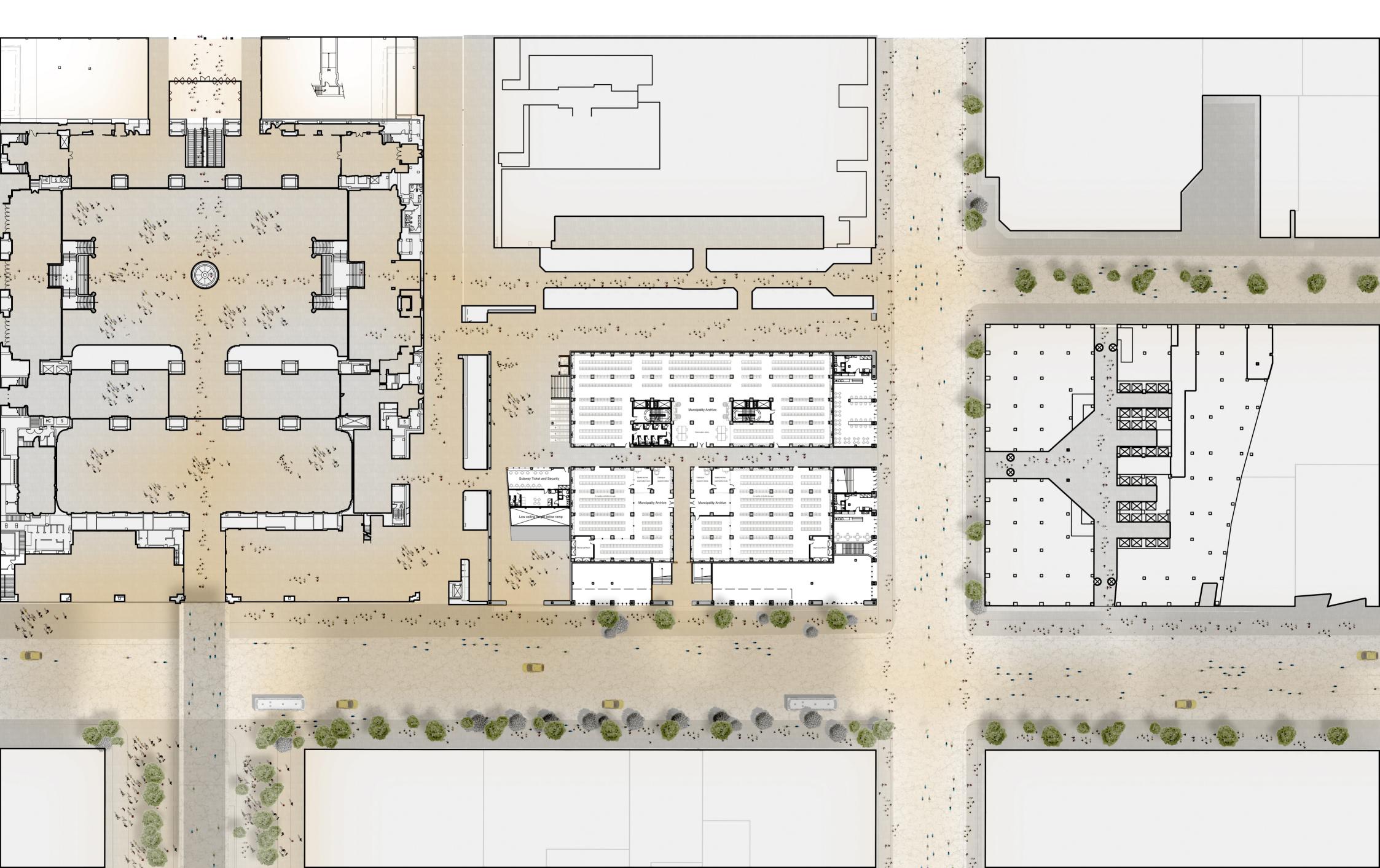
GROUND FLOOR VIERENDEEL STRUCTURE



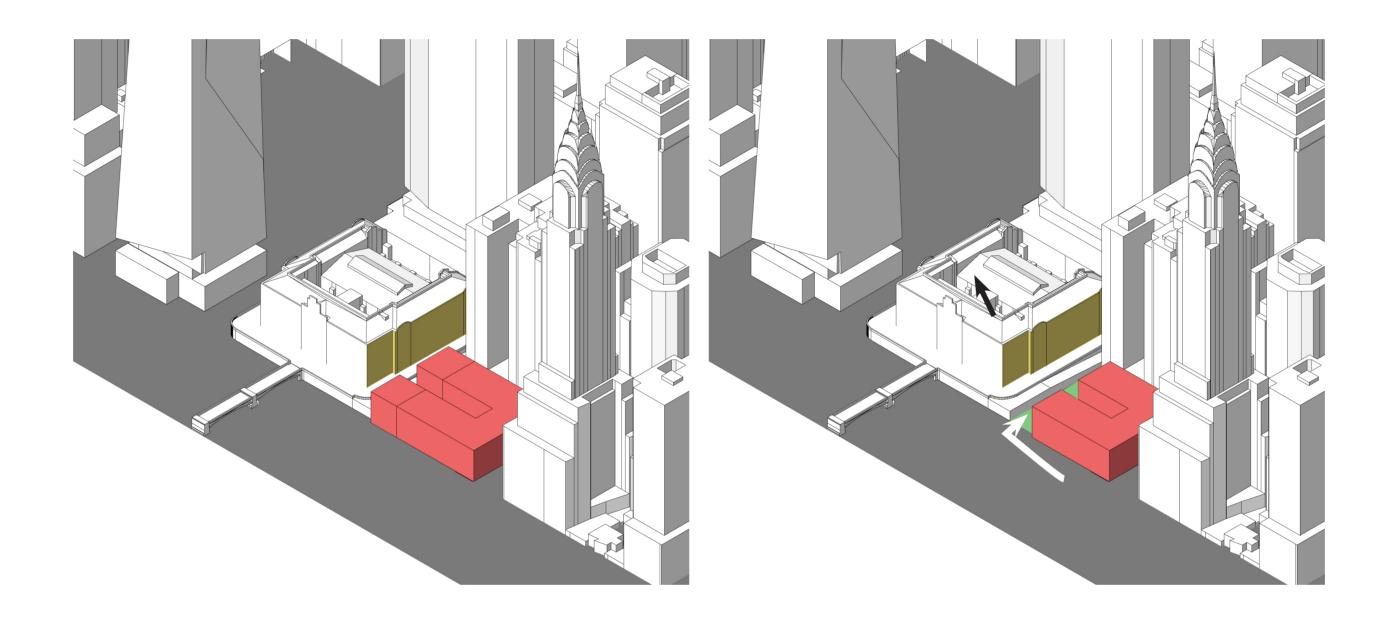
Ground floor plan

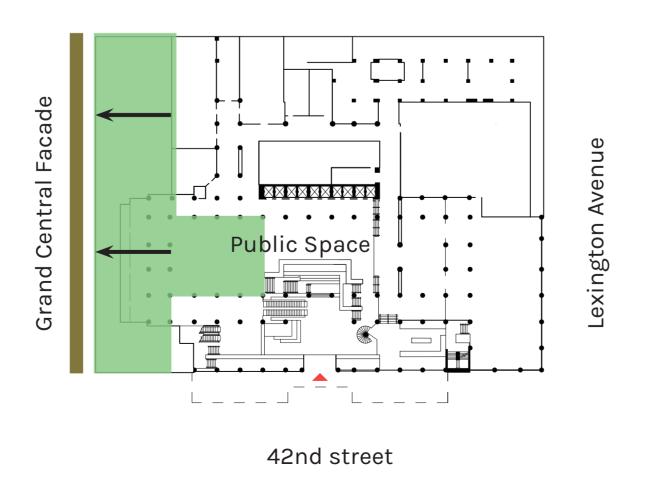


1:500 URBAN IMPLEMENTATION

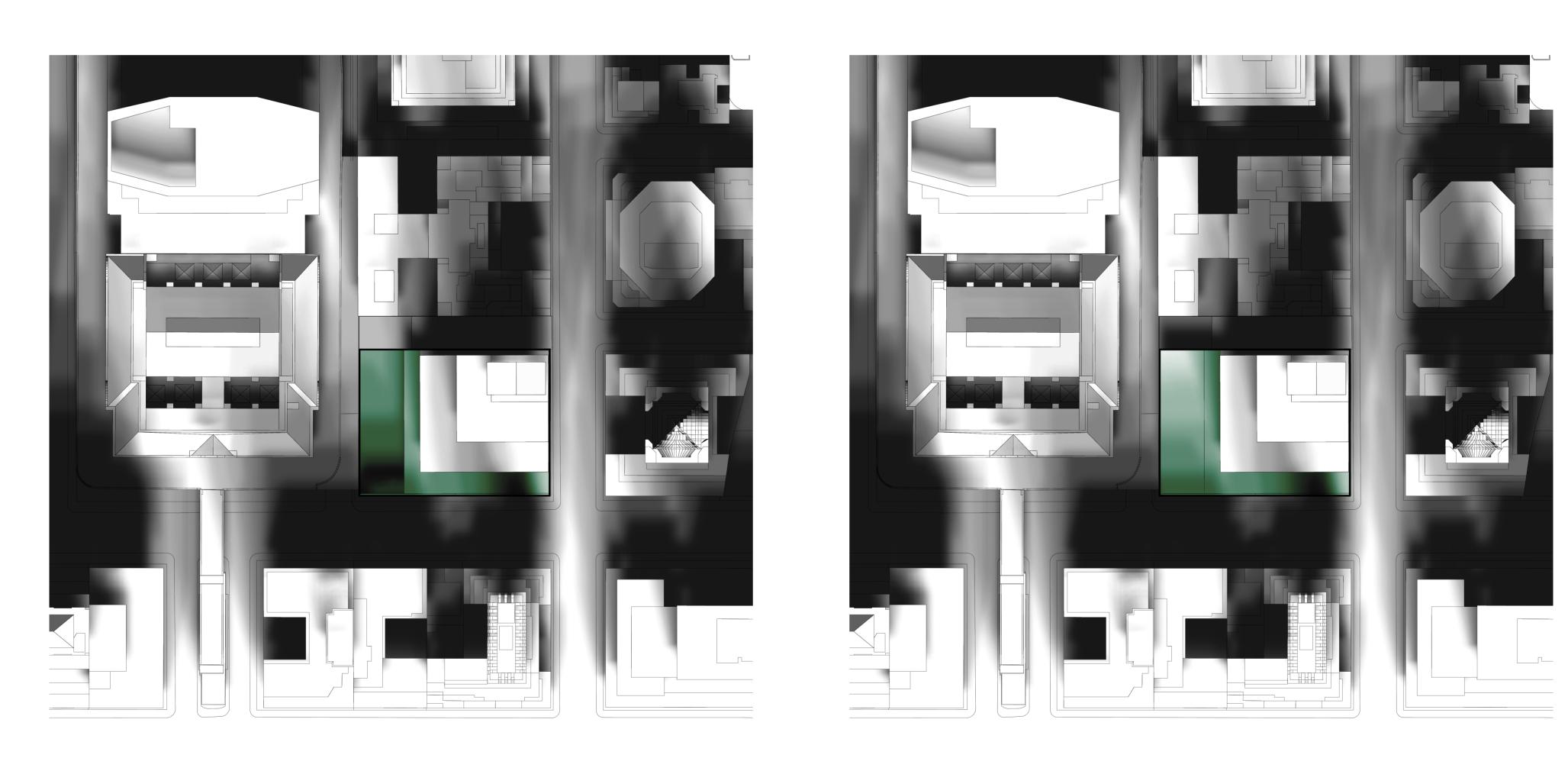


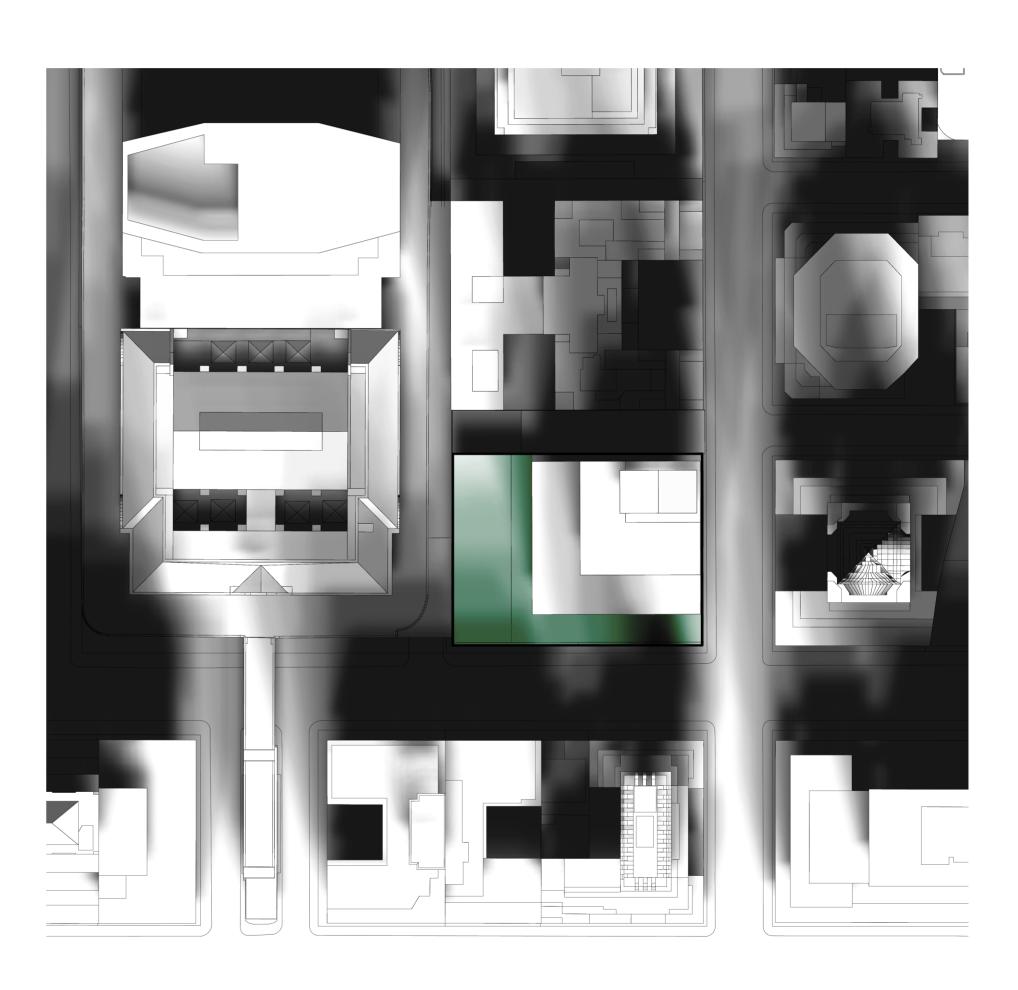
PUBLIC SPACE POTENTIAL REVEAL GRAND CENTRAL'S HIDDEN FACADE



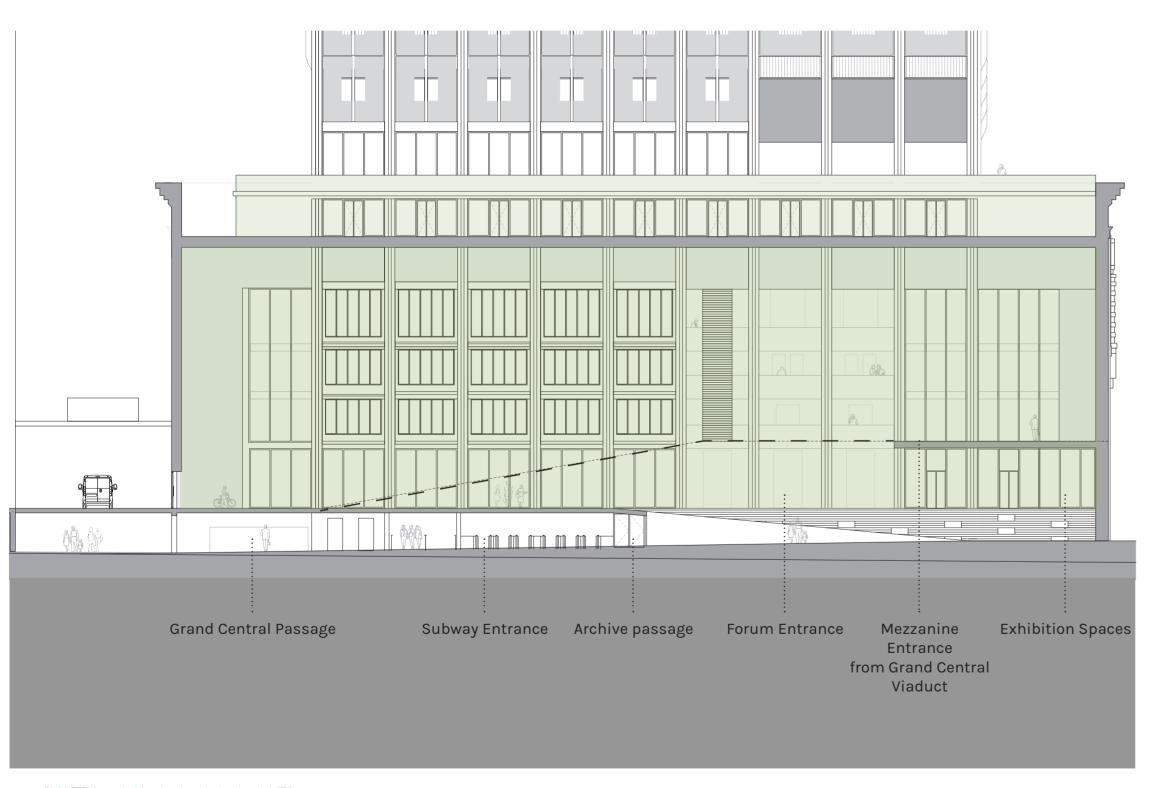


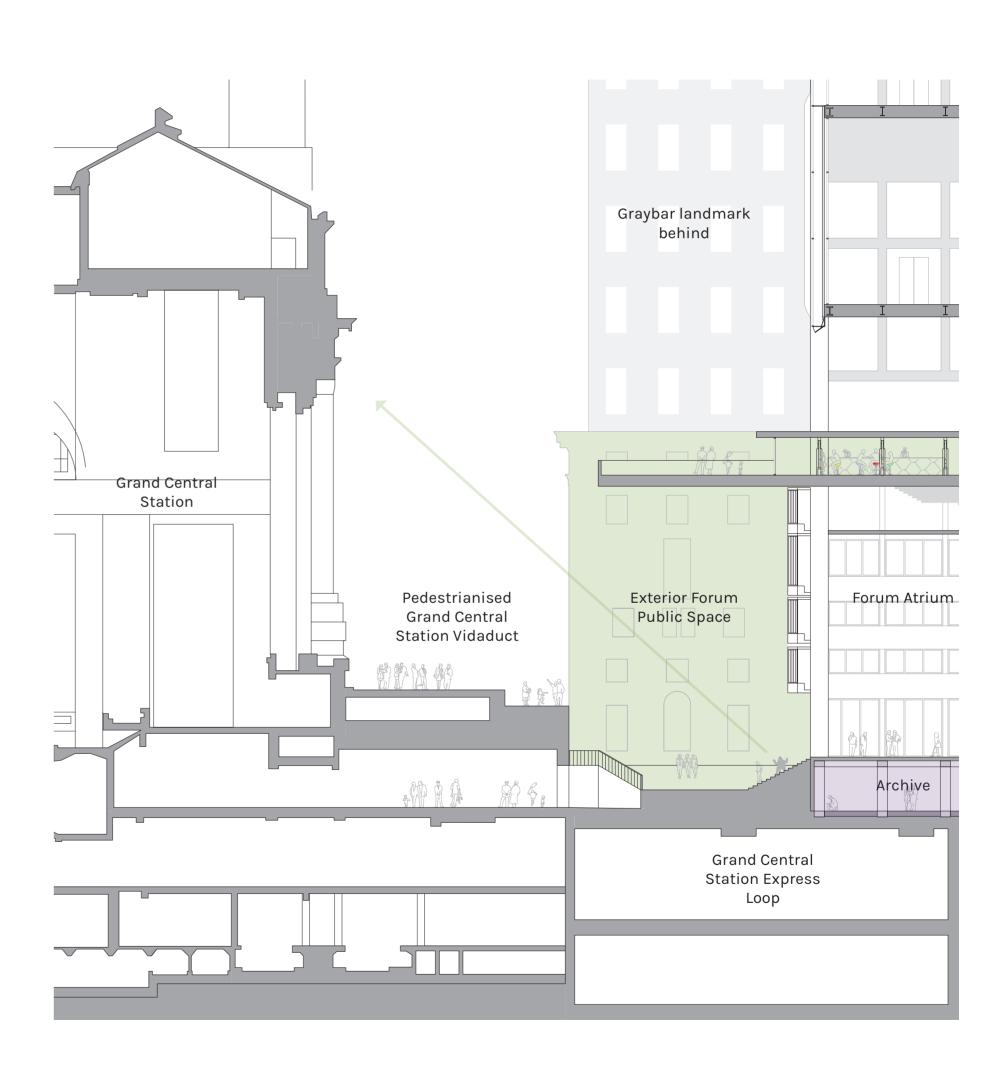
SUN ANALYSIS SUNKEN PLAZA VS ELEVATED PLAZA (21st of the month at 13h - all year)

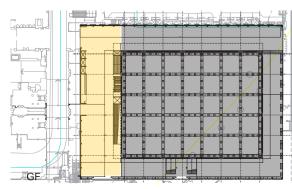




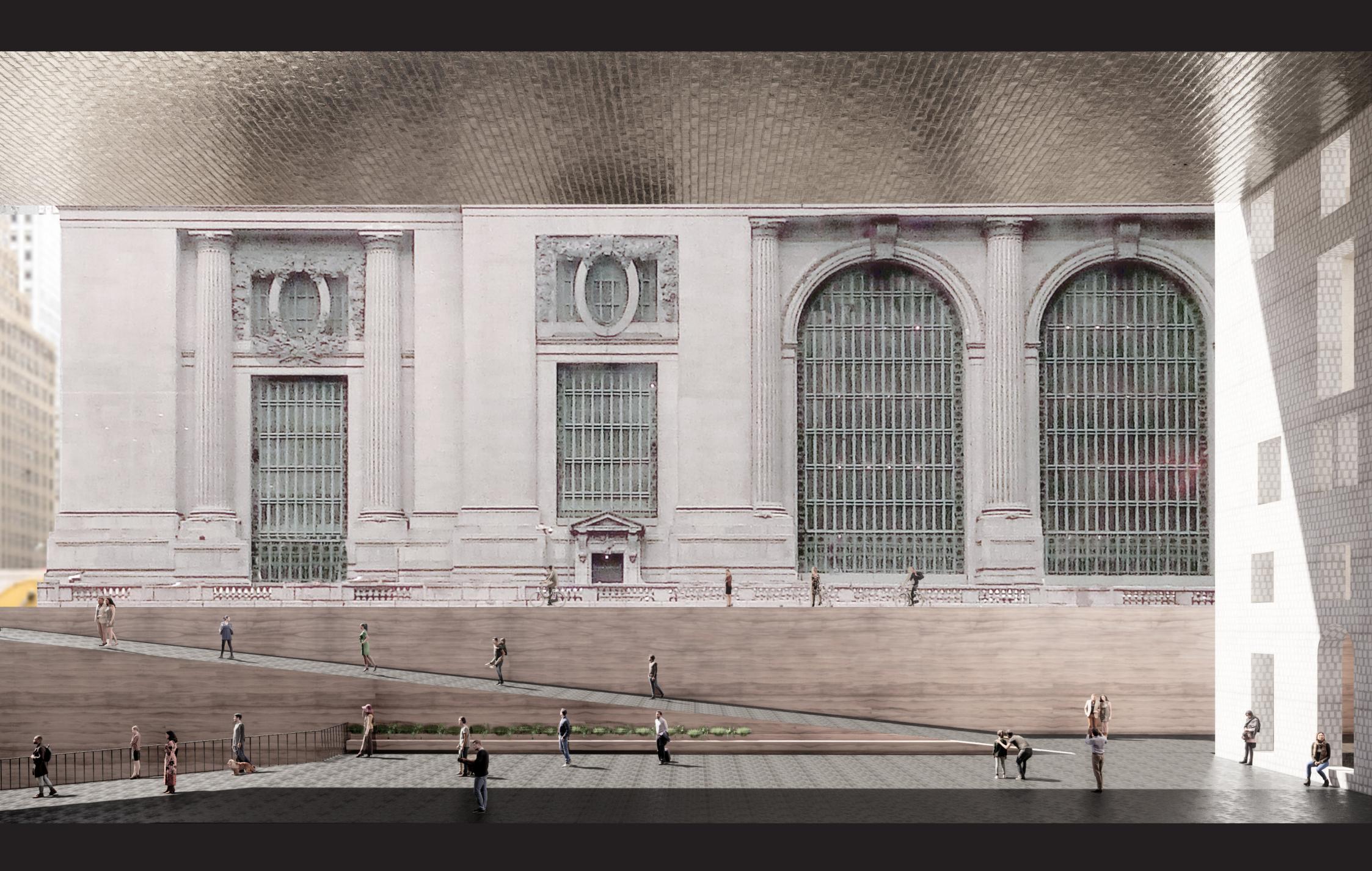
PUBLIC SPACE SECTION



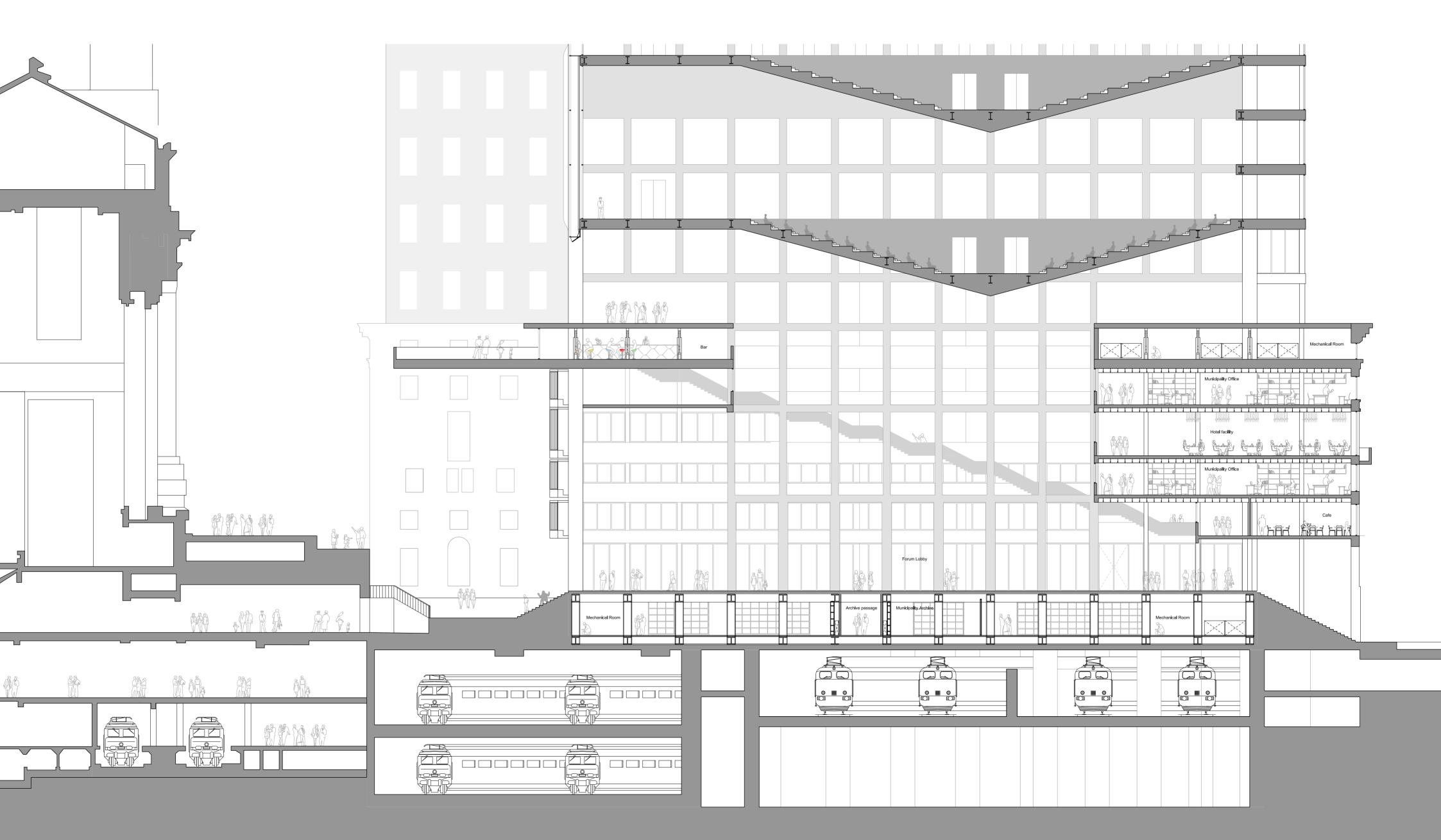






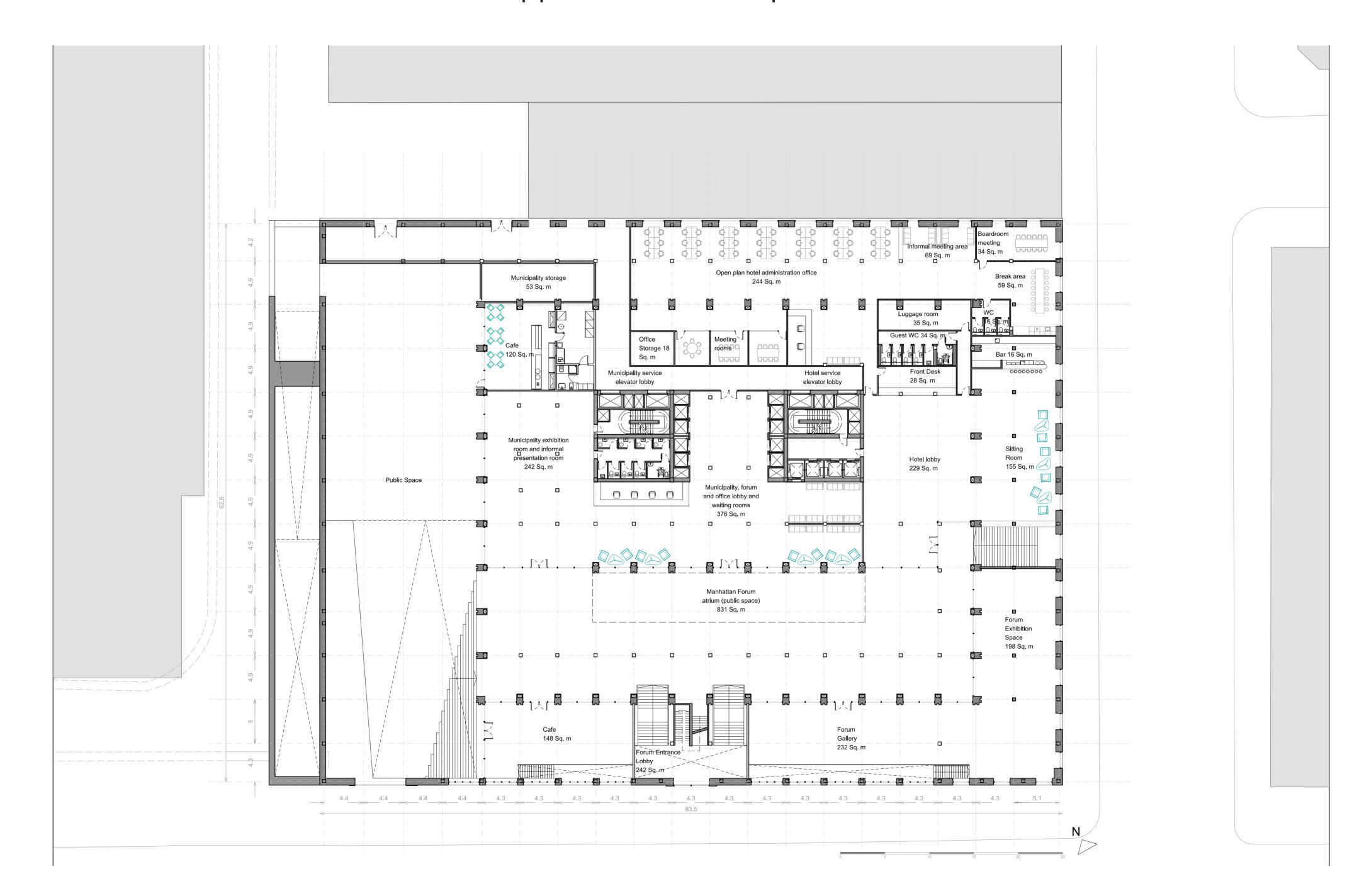


ATRIUM

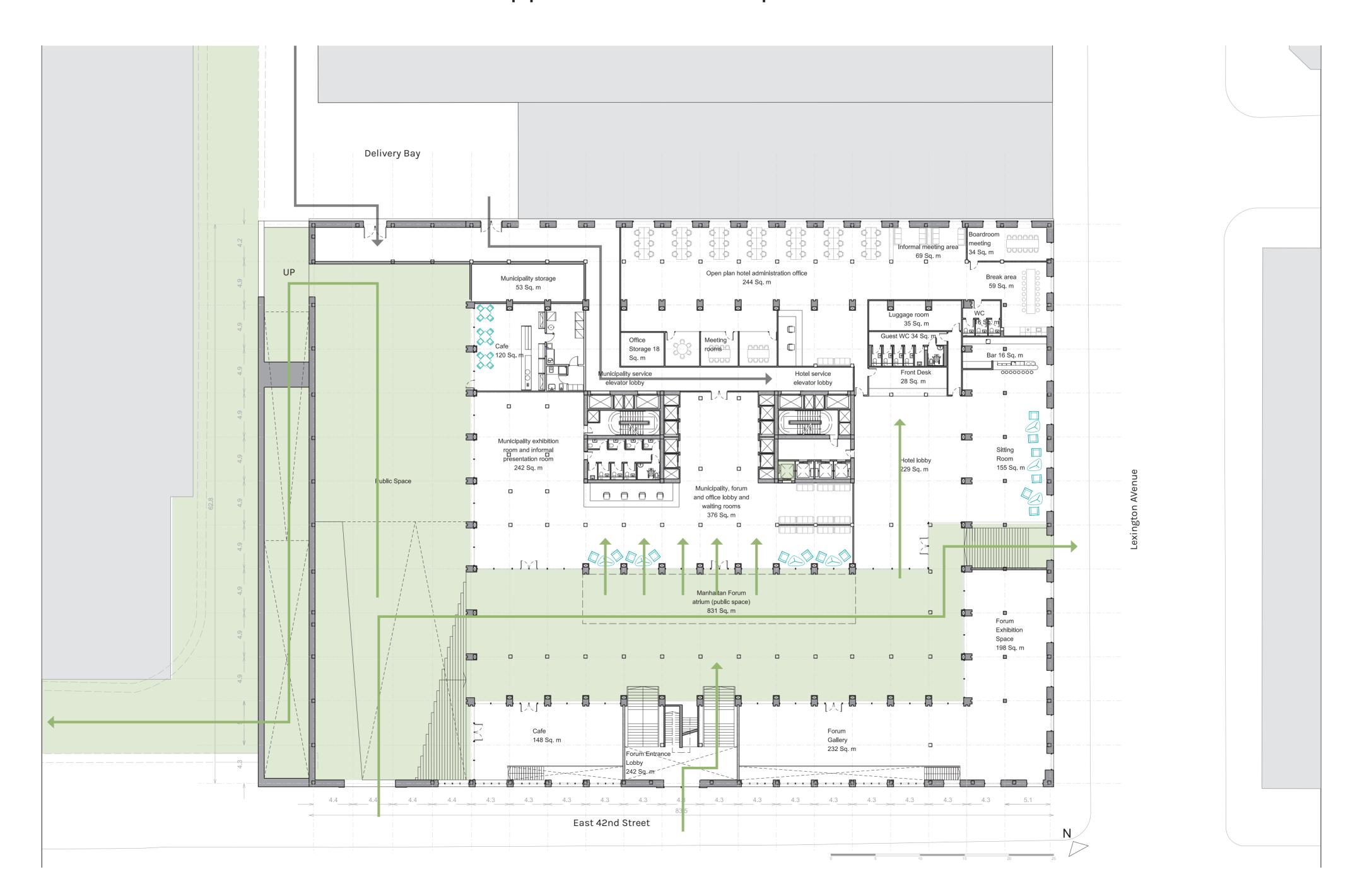




Upper Ground floor plan

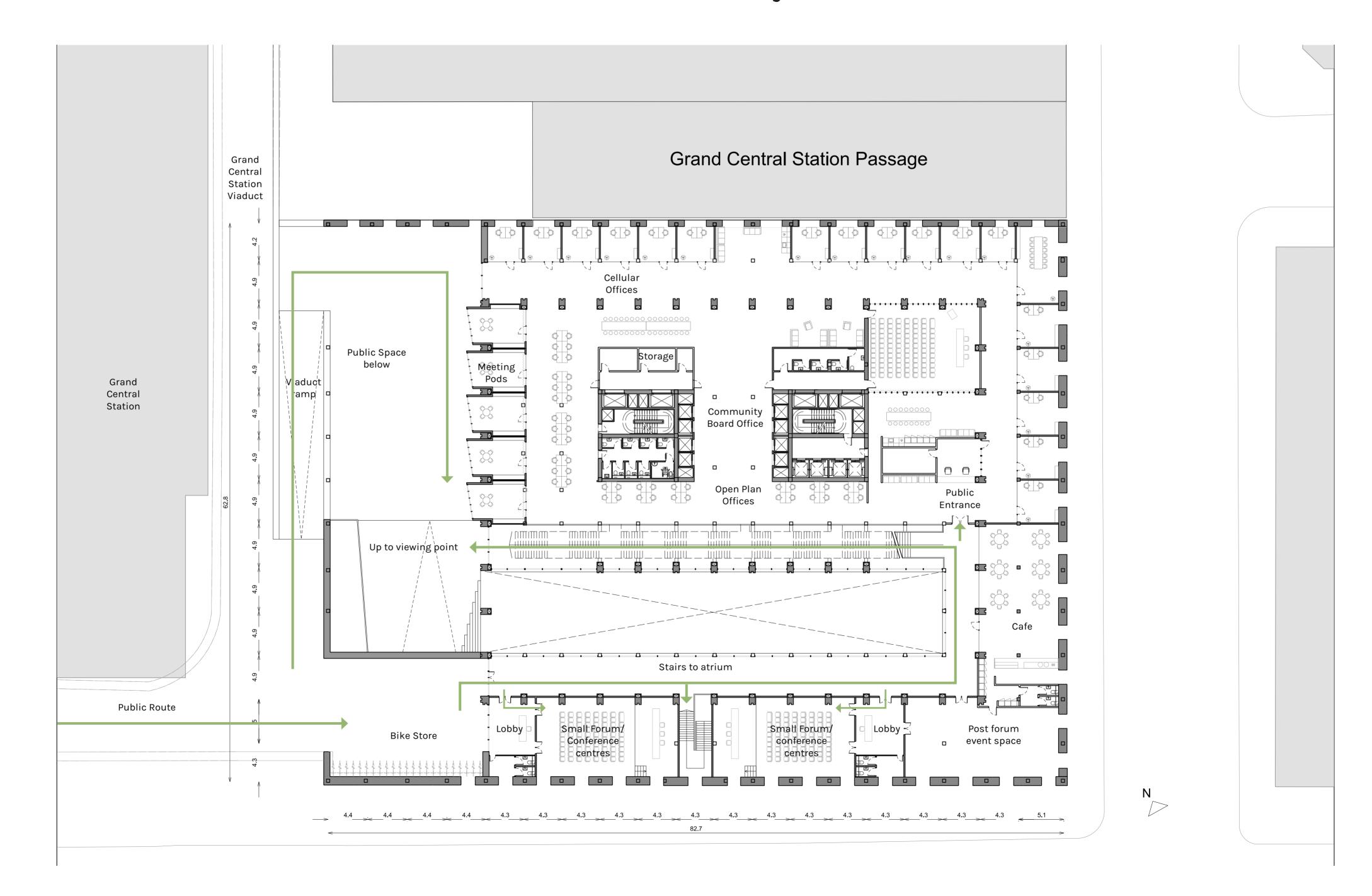


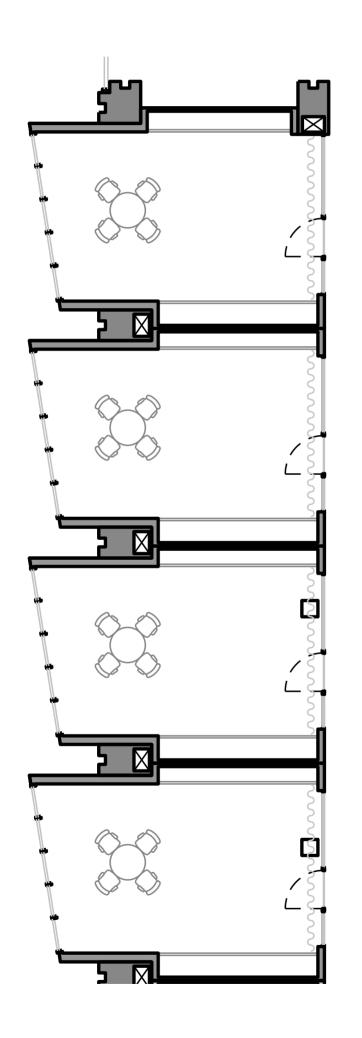
Upper Ground floor plan





Mezzanine Level - Community Board Office

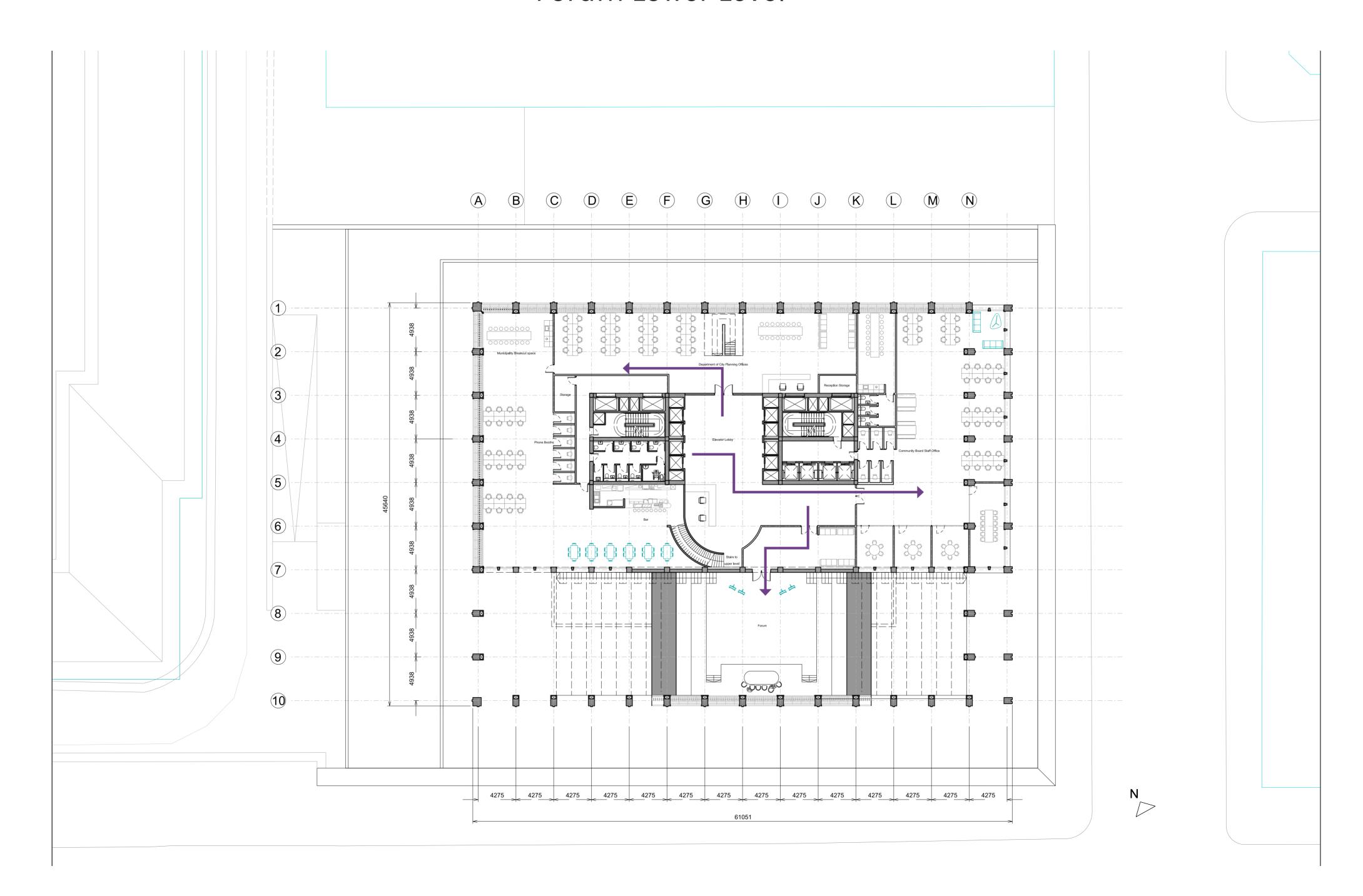




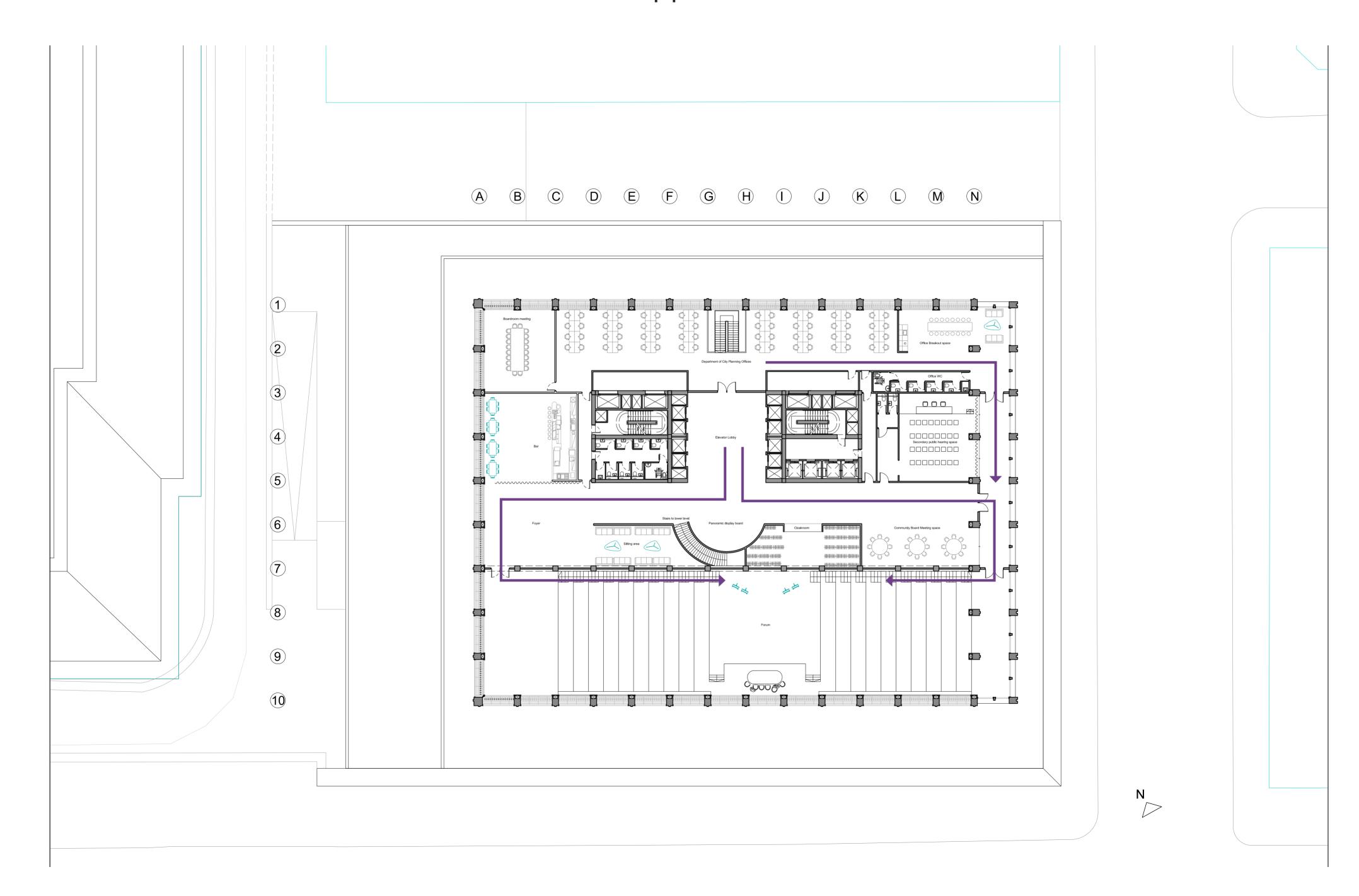


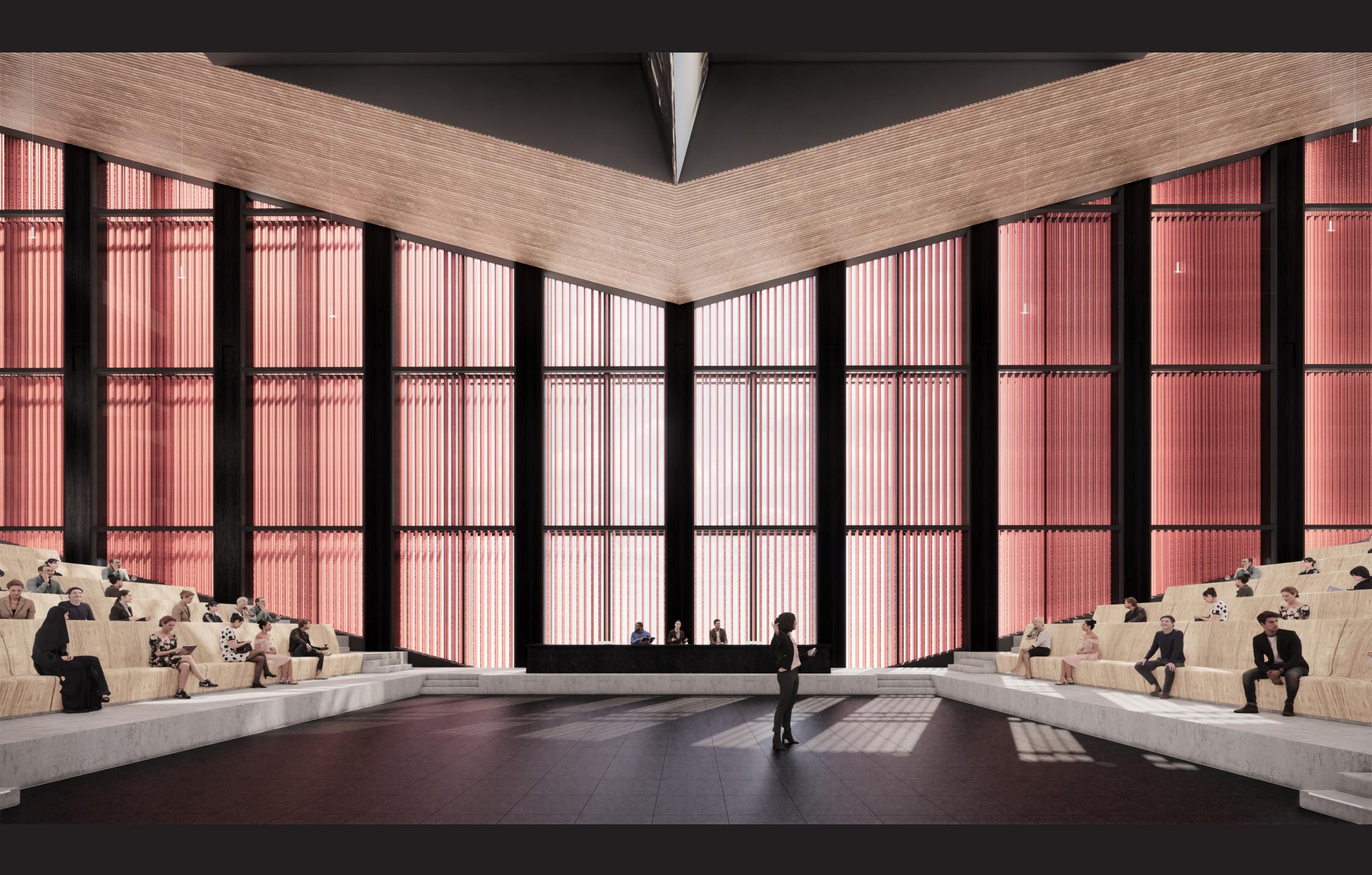


Forum Lower Level

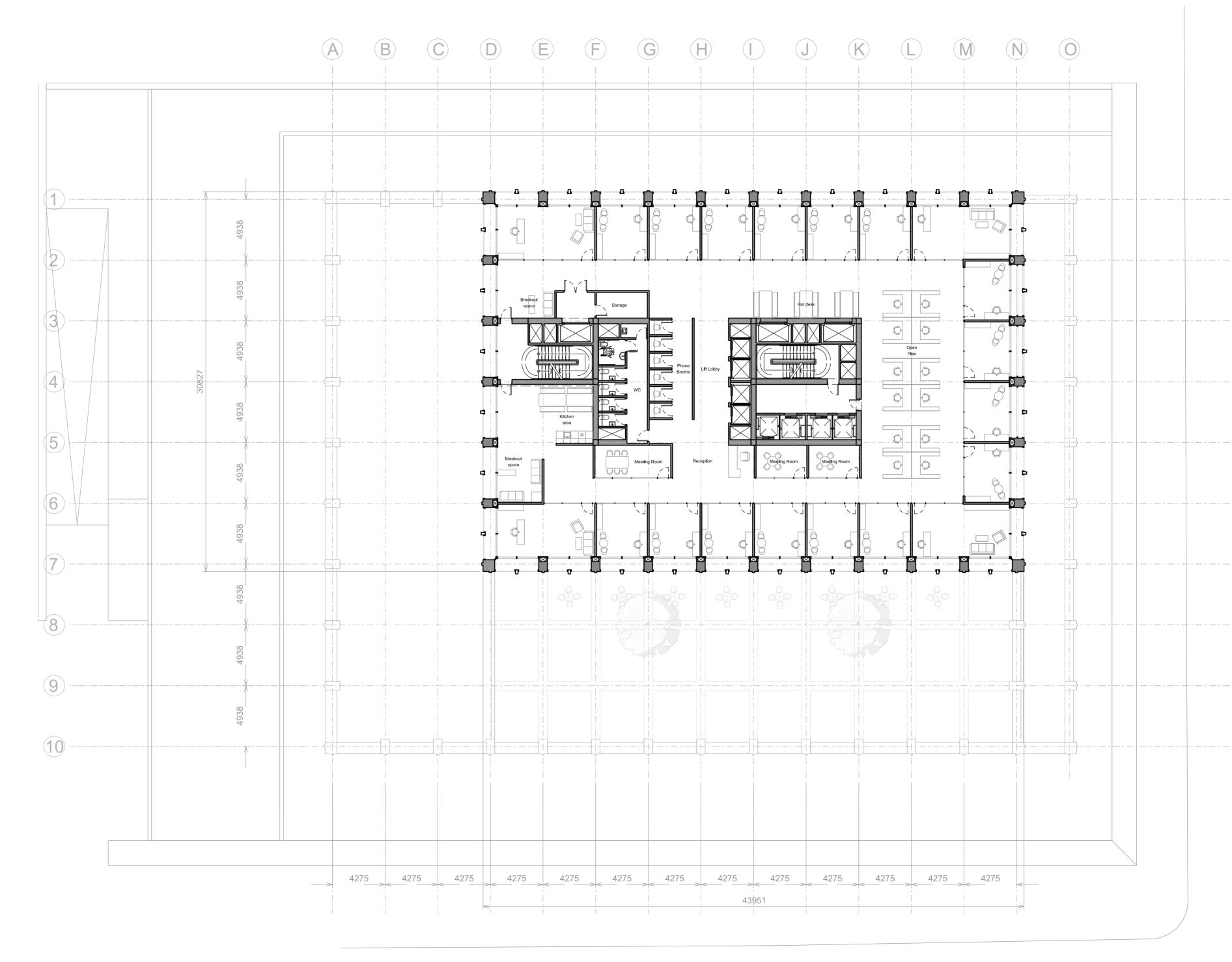


Forum Upper Level

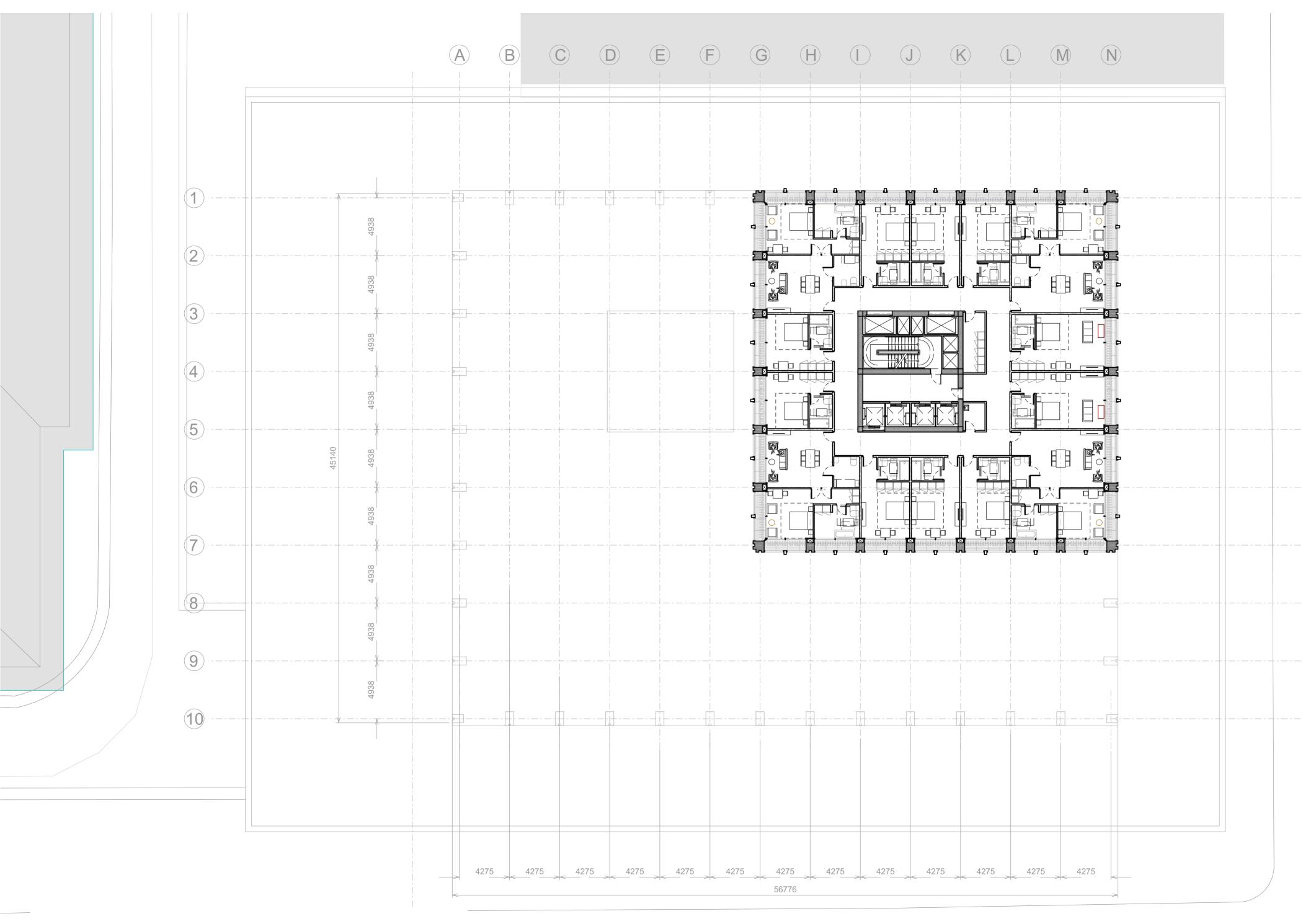


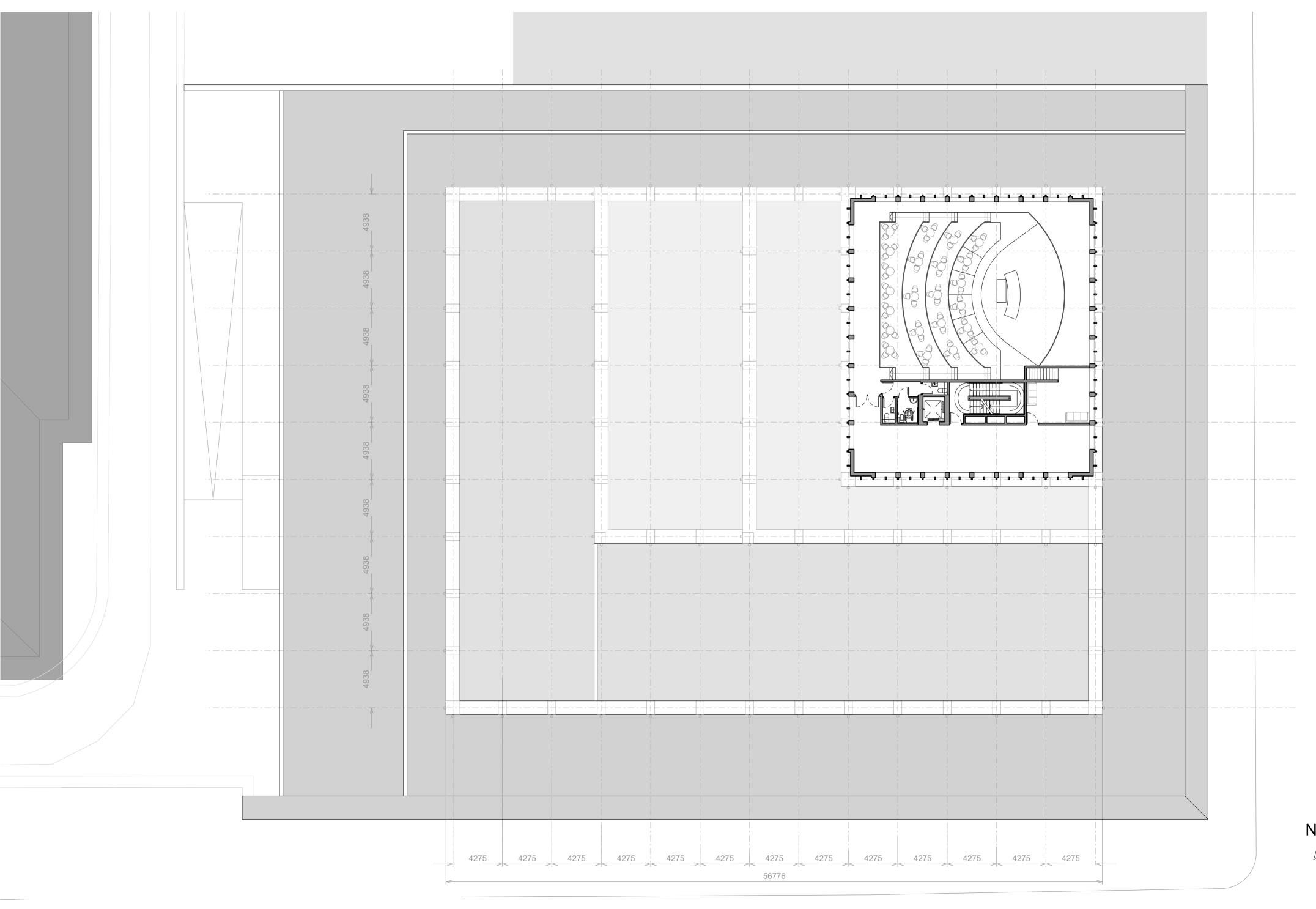






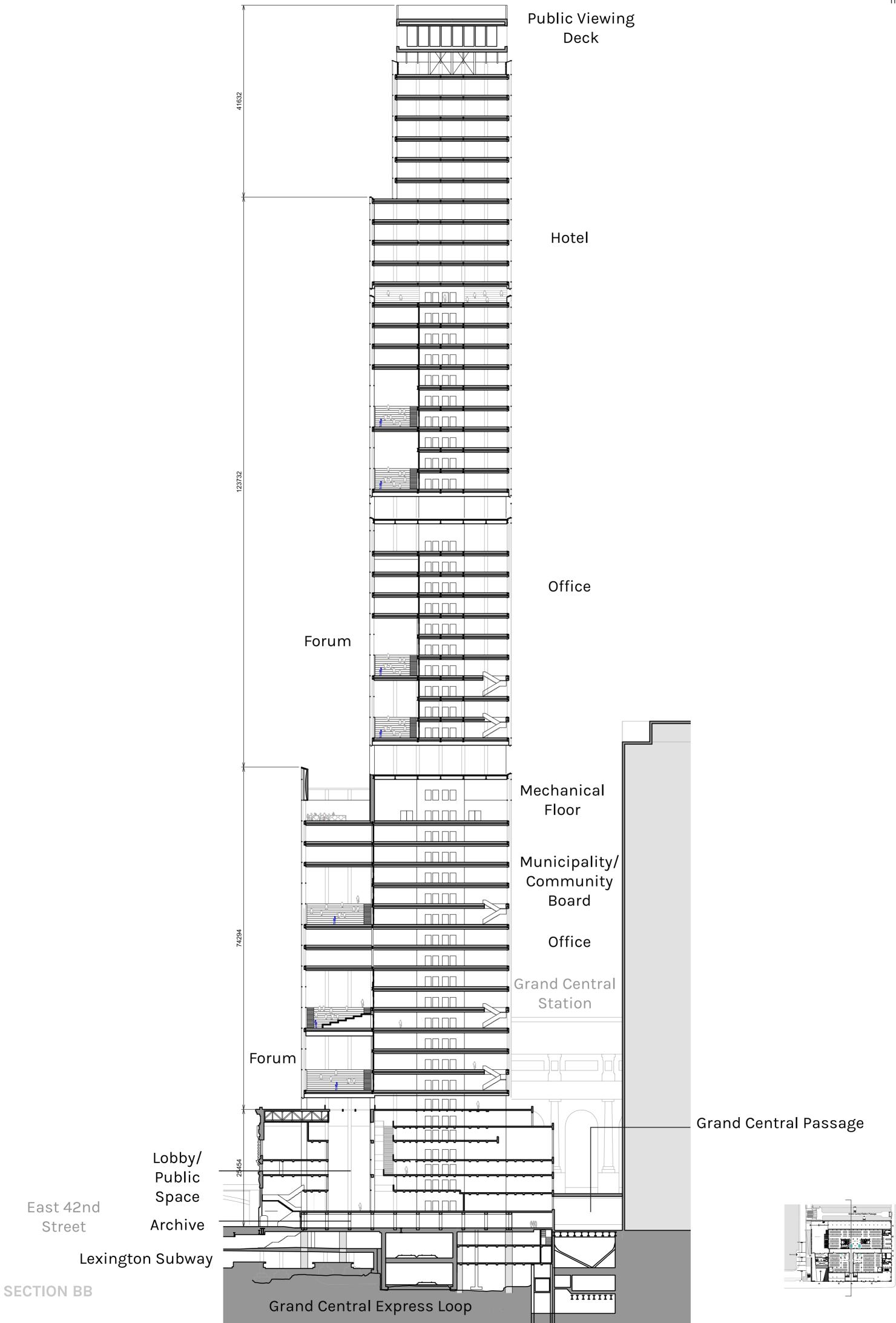


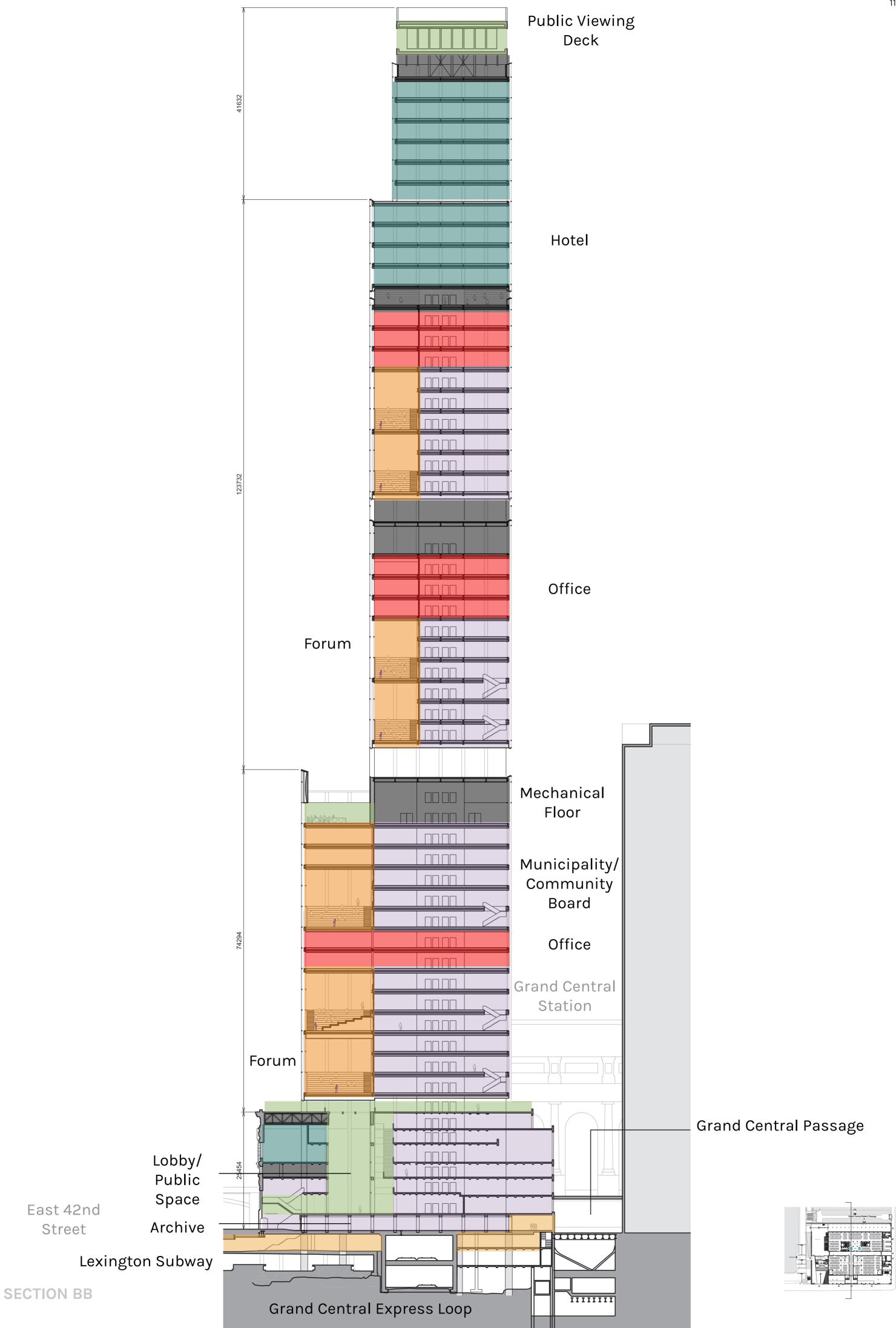


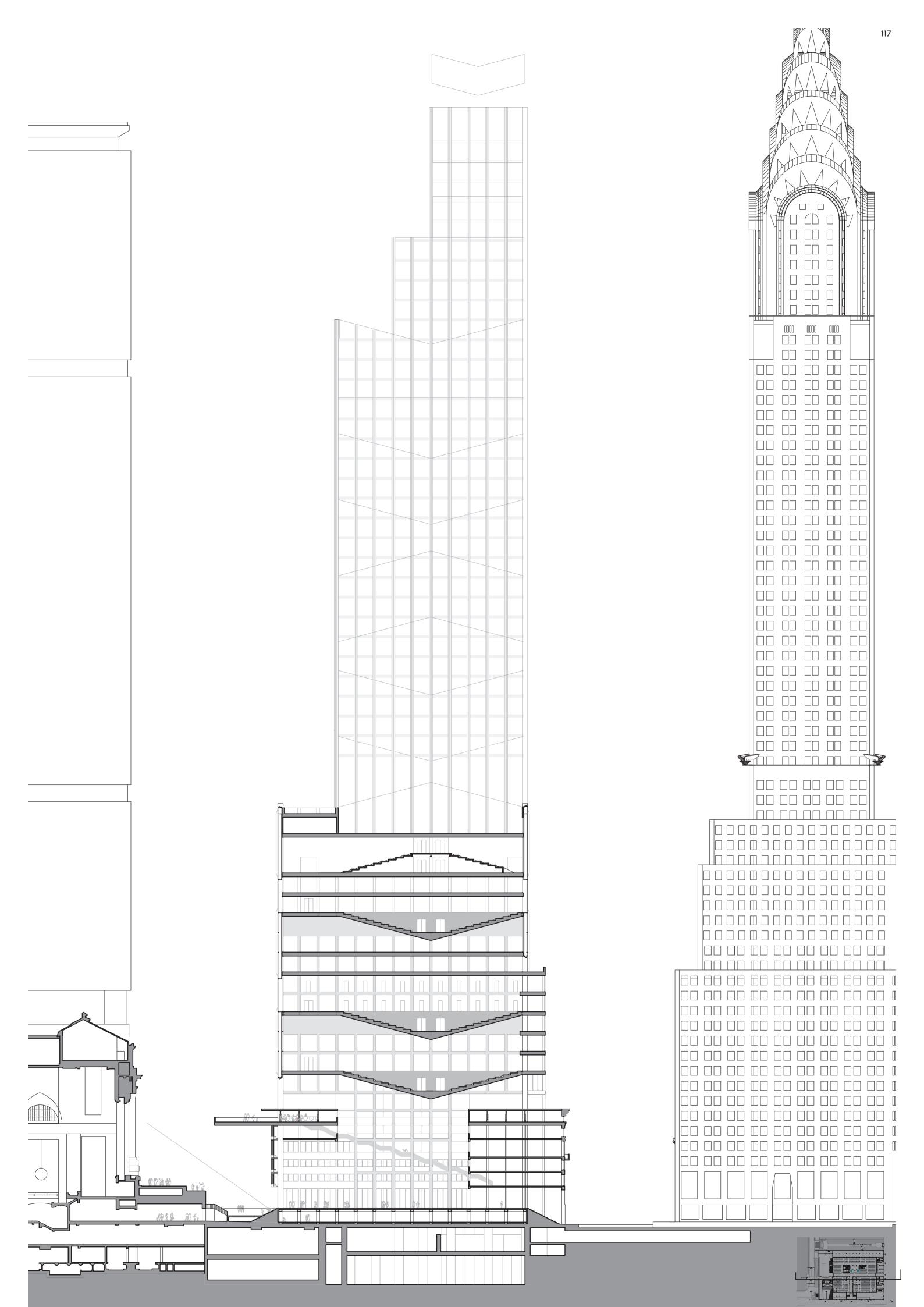












Facade Character

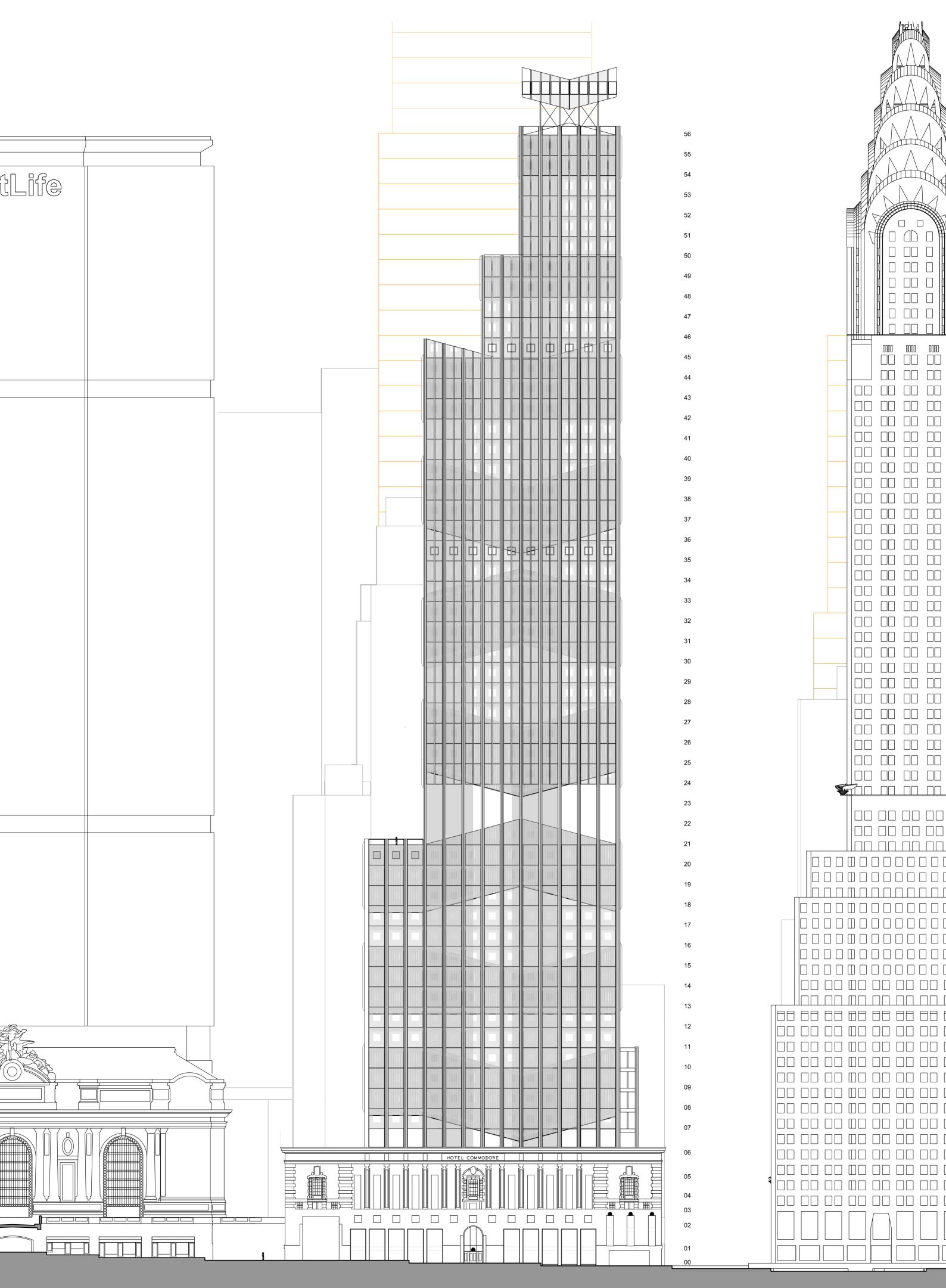


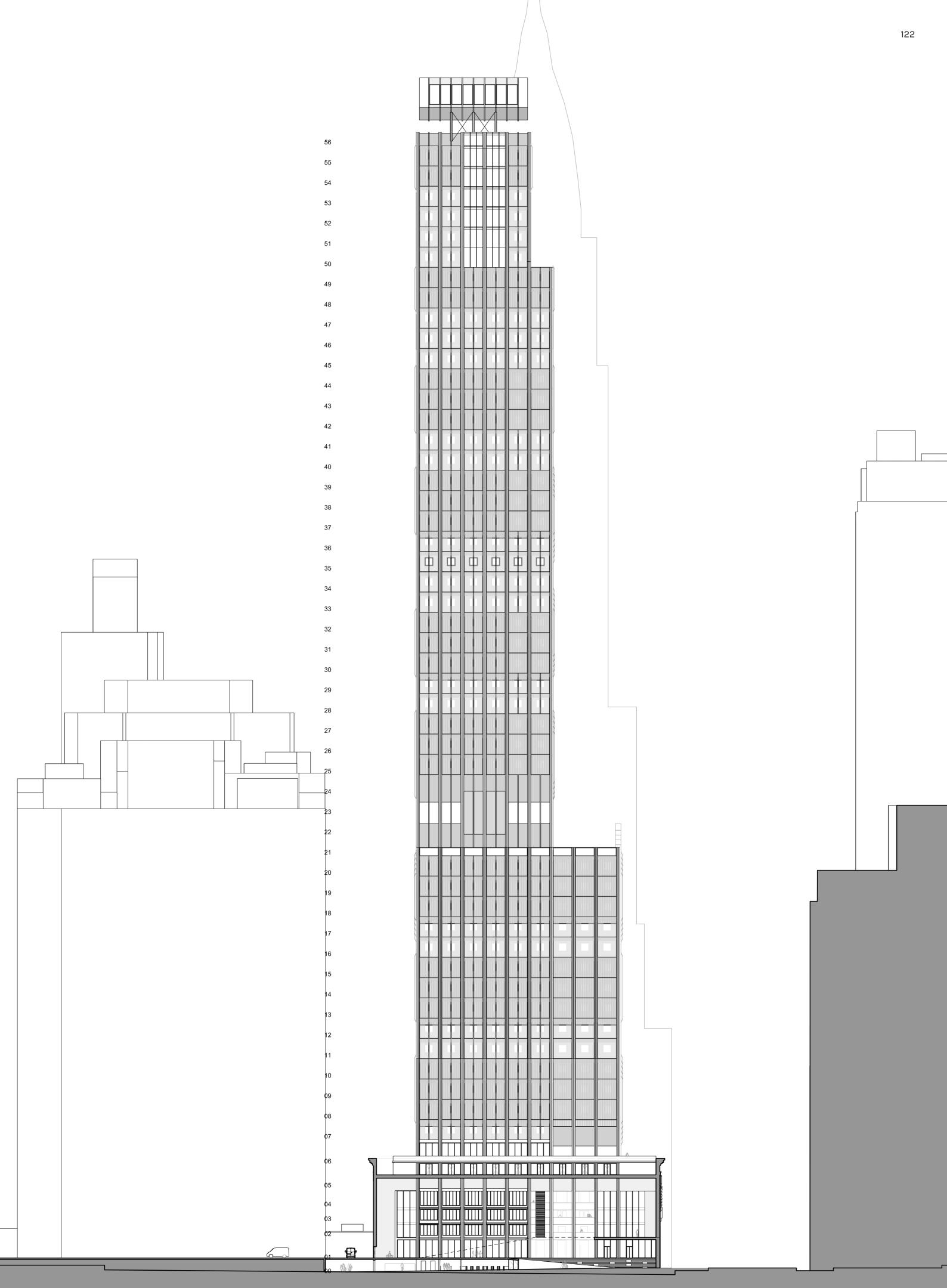


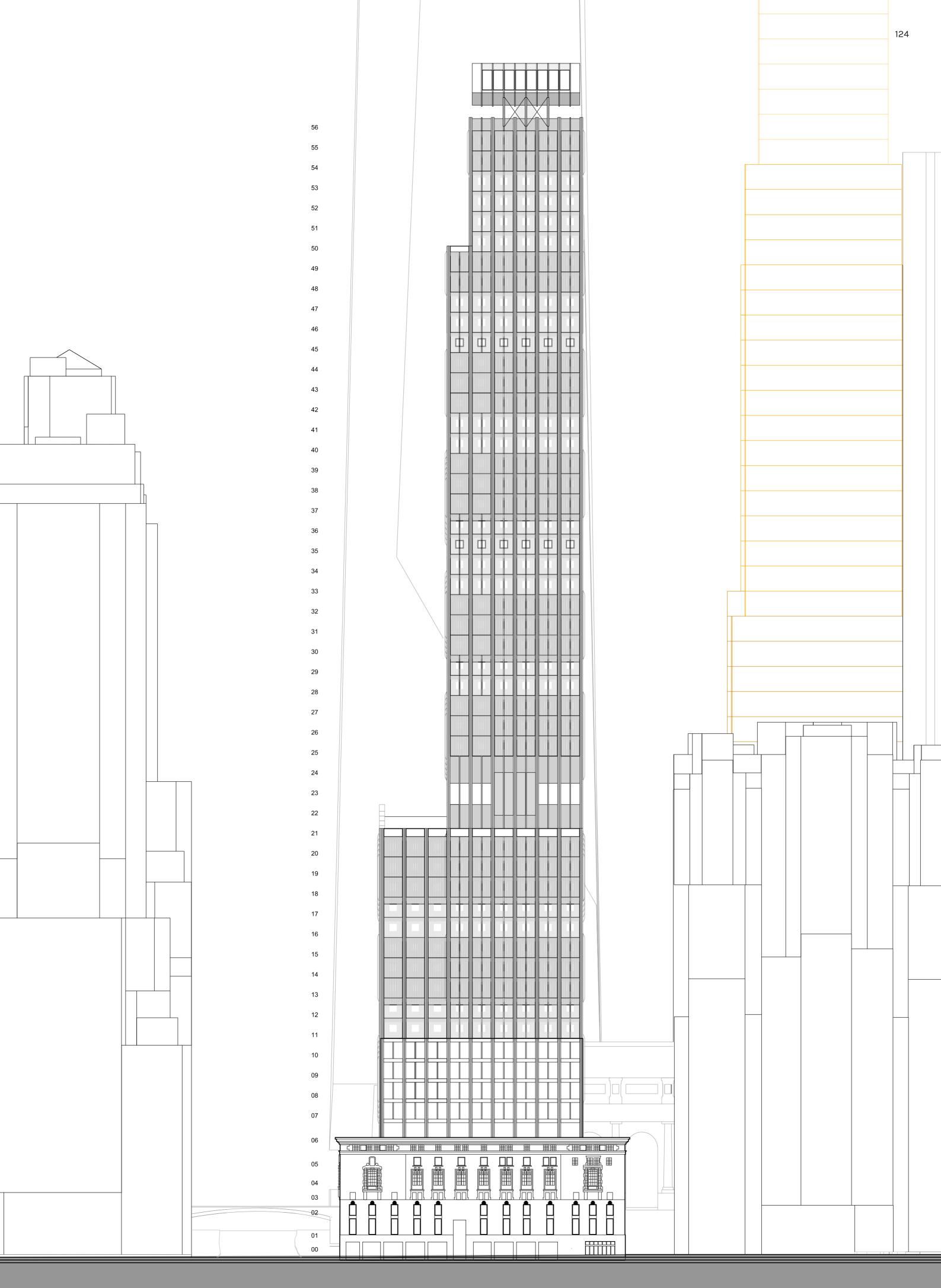






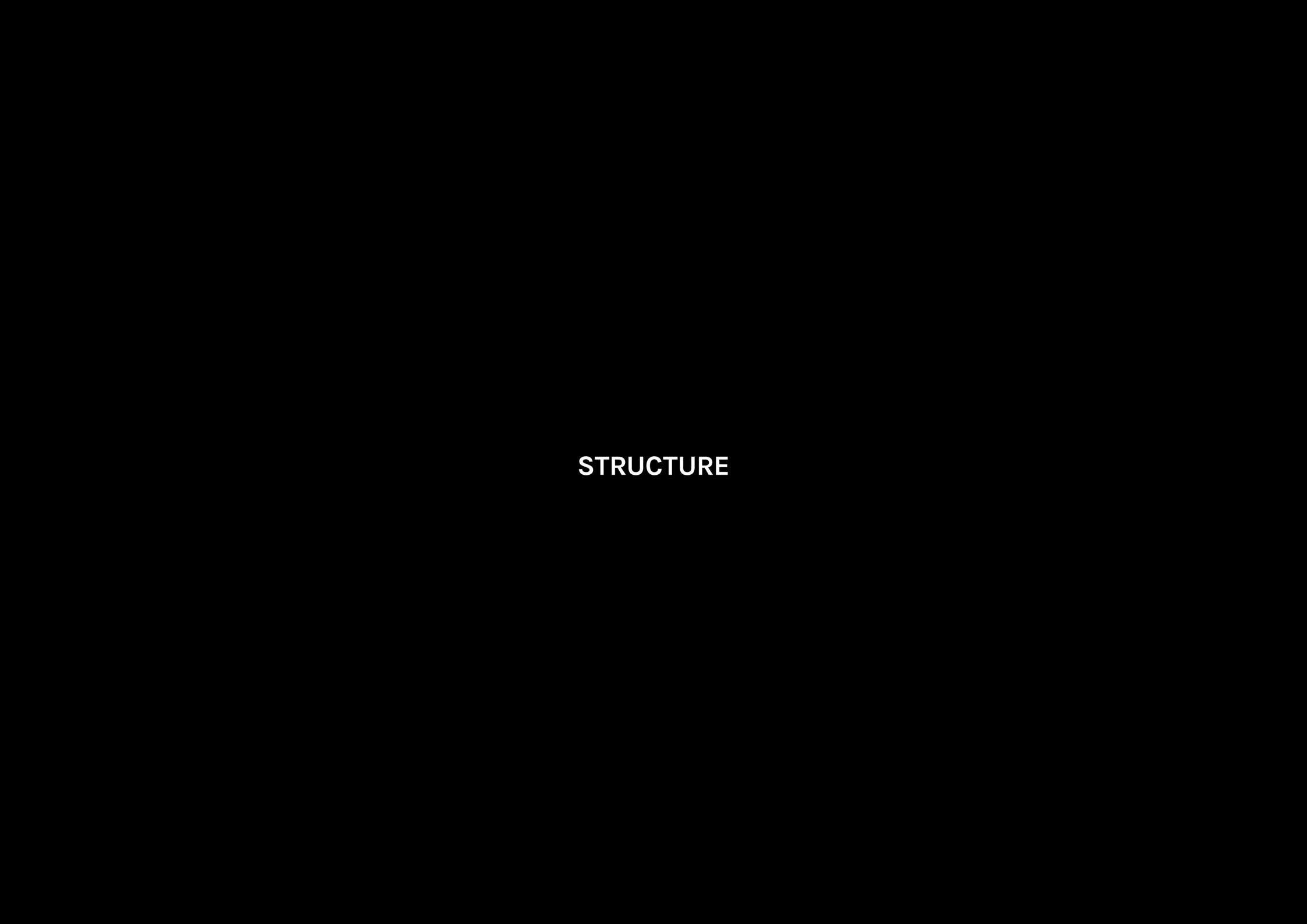




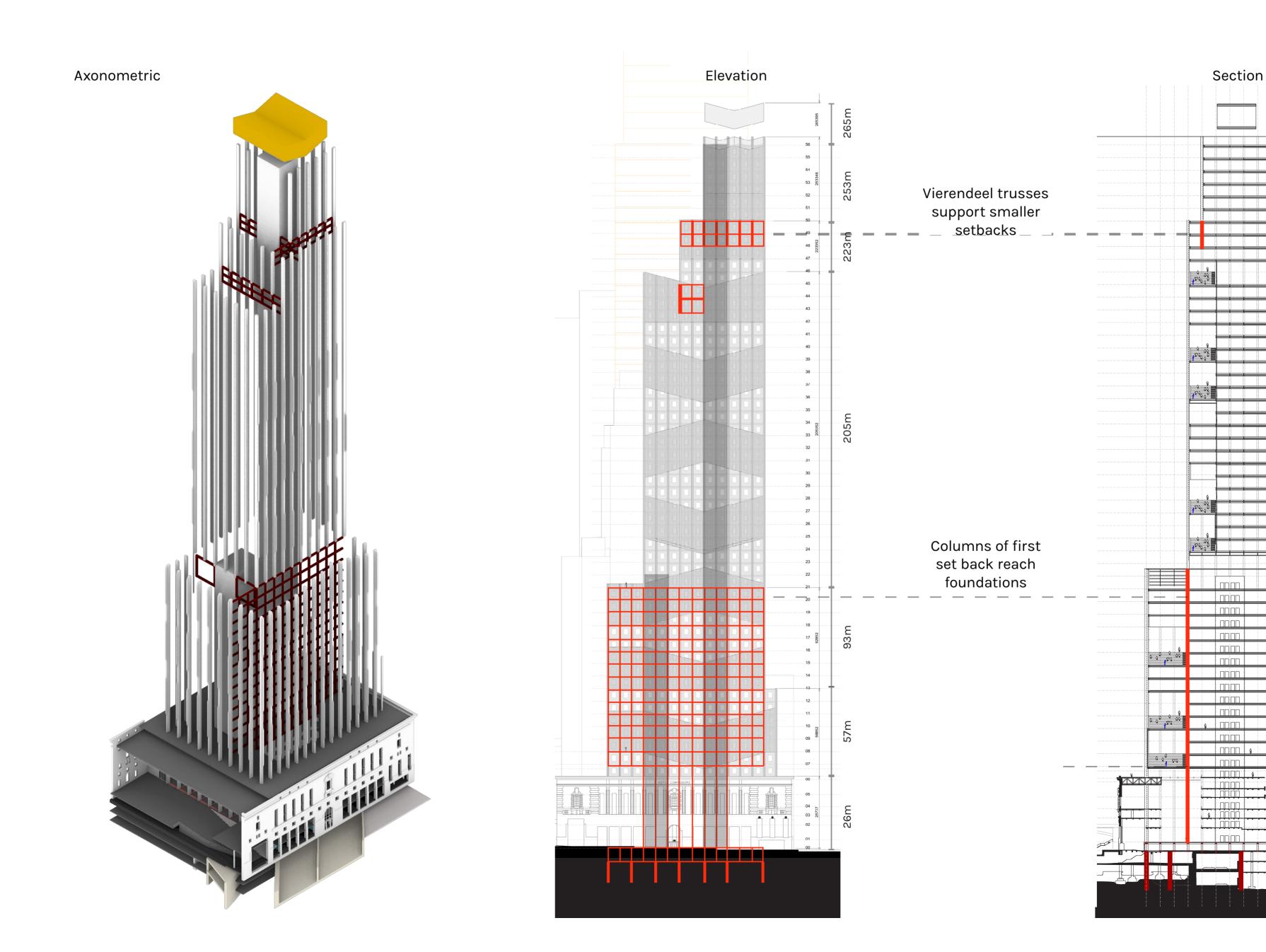




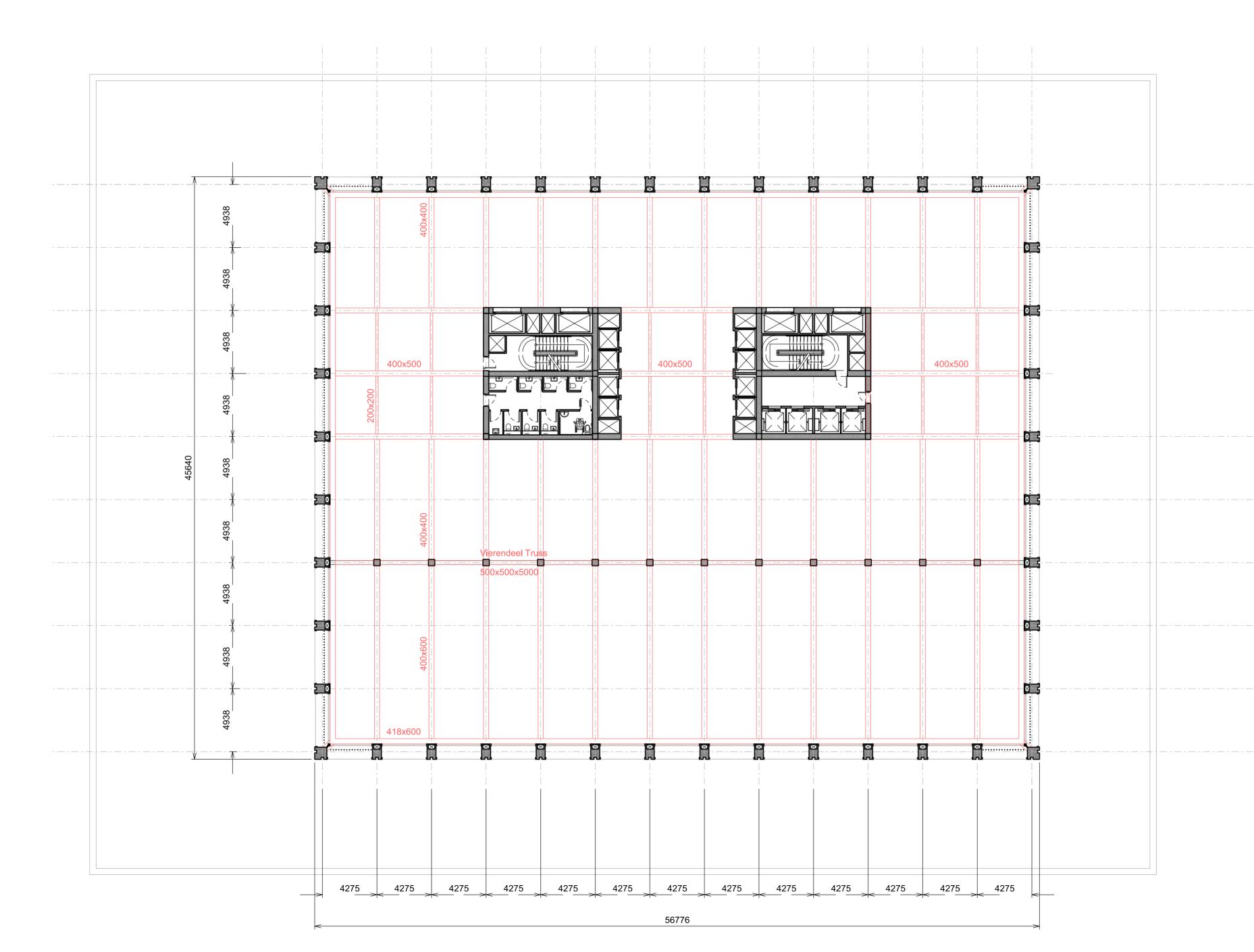




VIERENDEEL TRUSSES TO SUPPORT SET BACKS

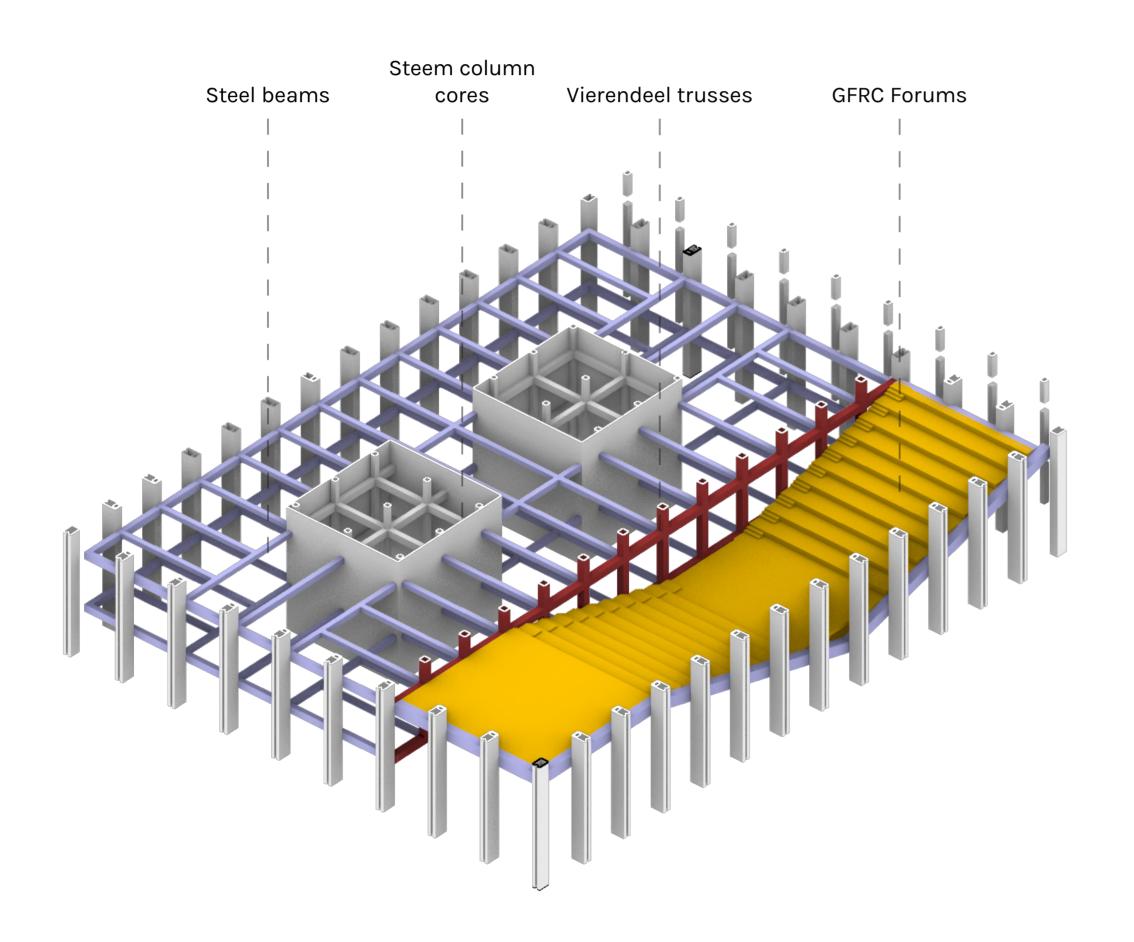


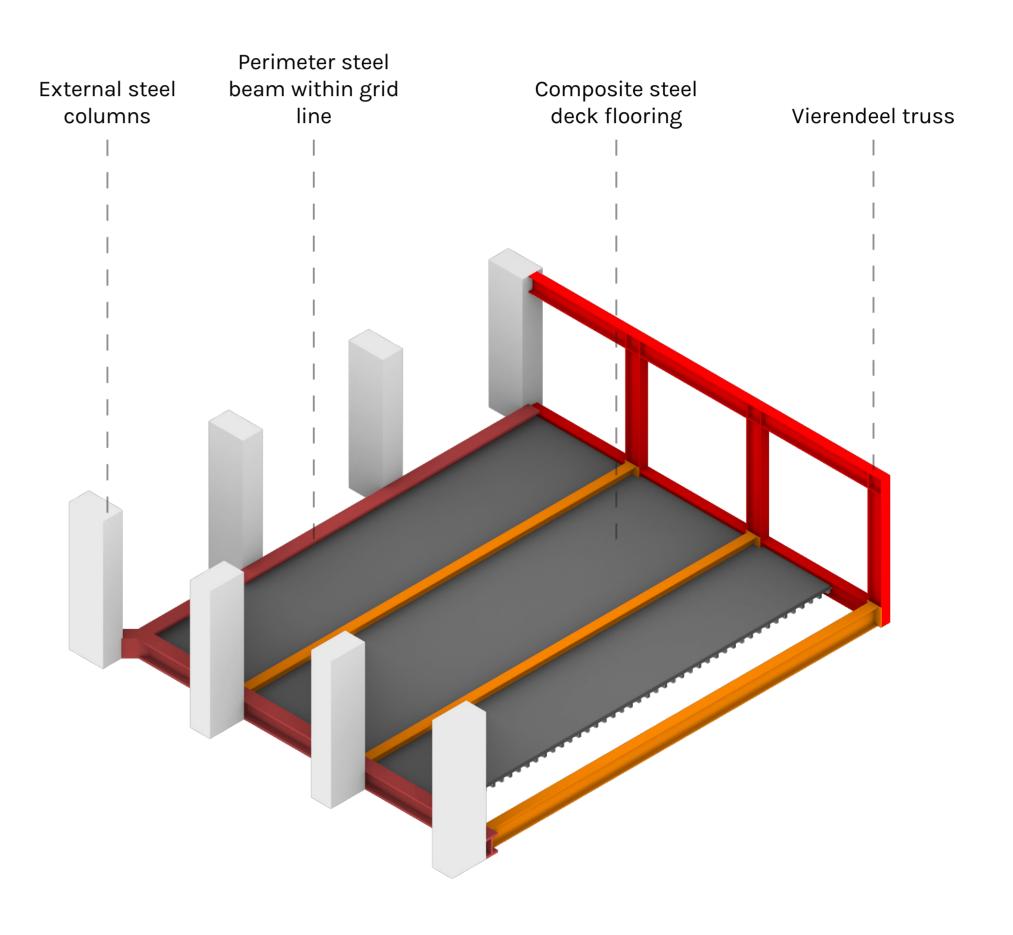
STRUCTURAL SCHEME TYPICAL PLAN

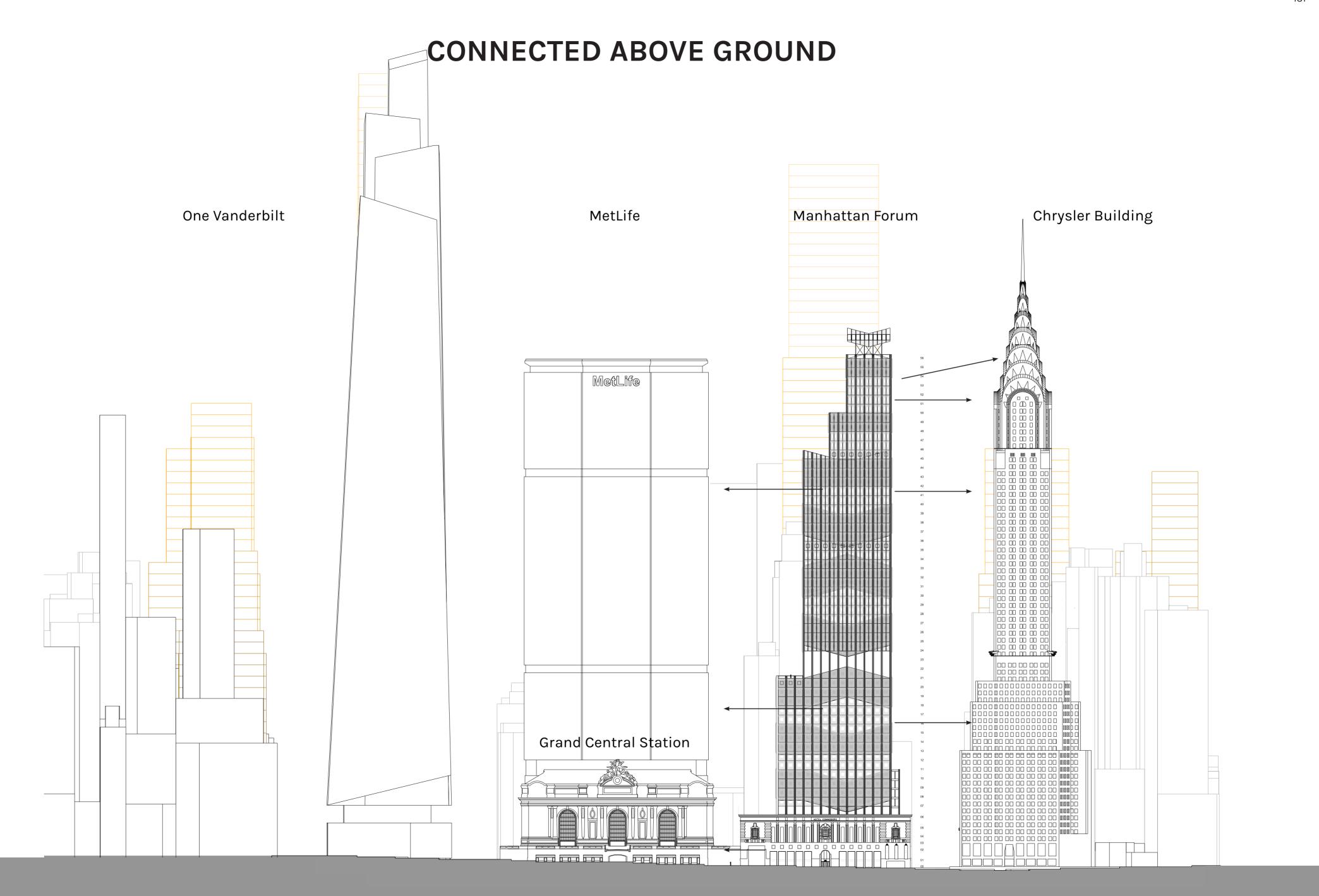


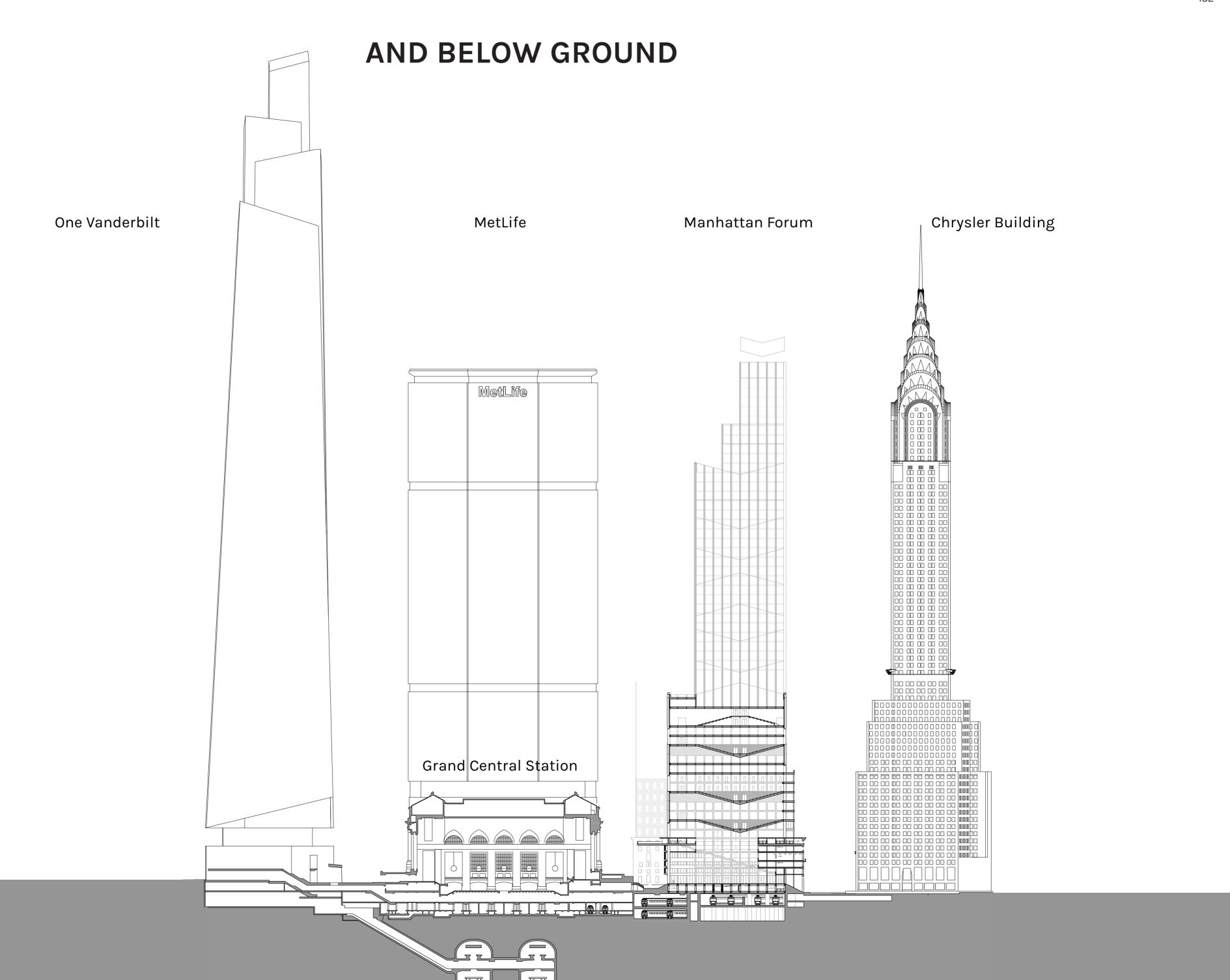


STRUCTURAL SCHEME ALLOWS FOR COLUMN FREE SPACES IN FORUMS AND OFFICES, SATISFYING BOTH OFFICE AND FORUM PROGRAMS



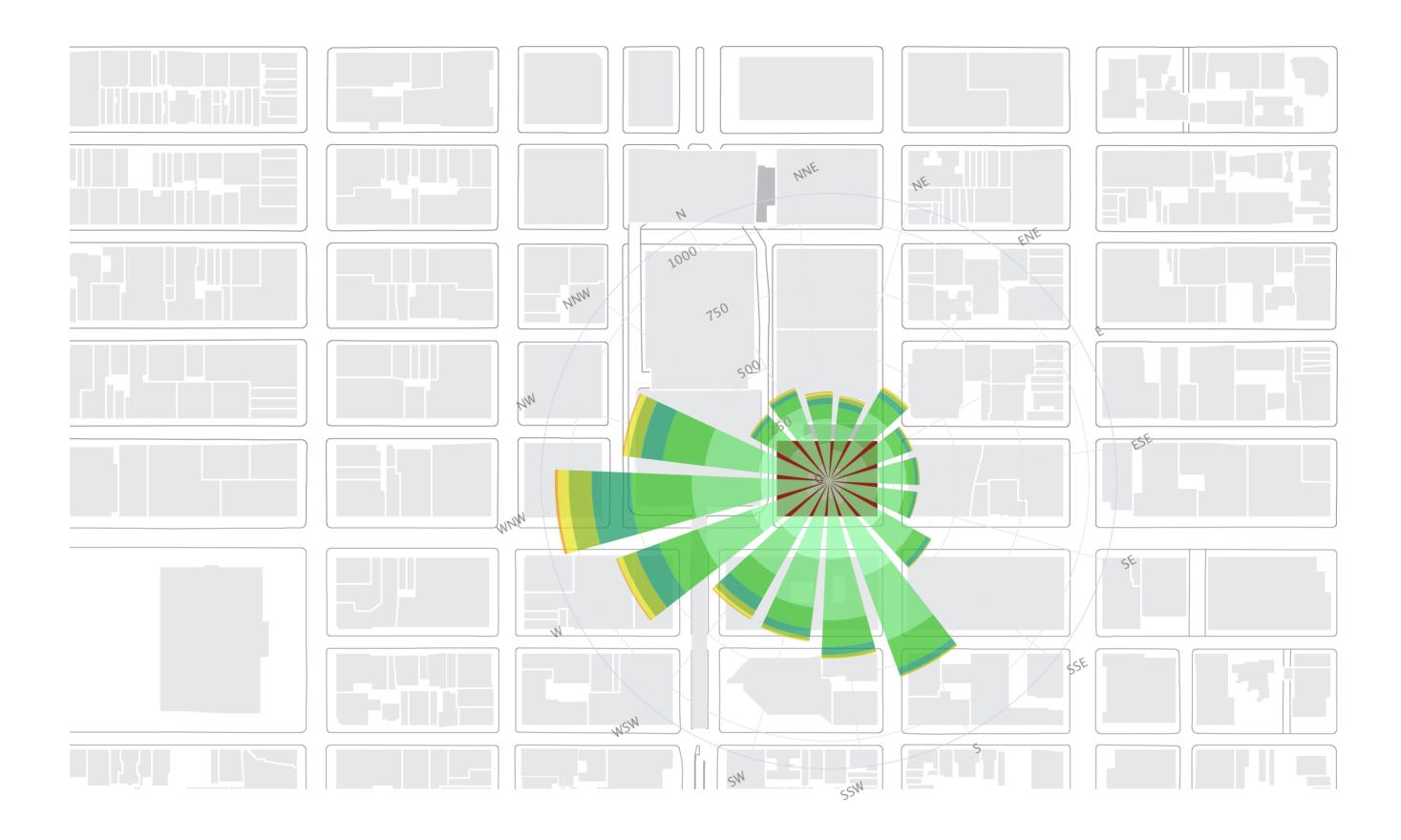


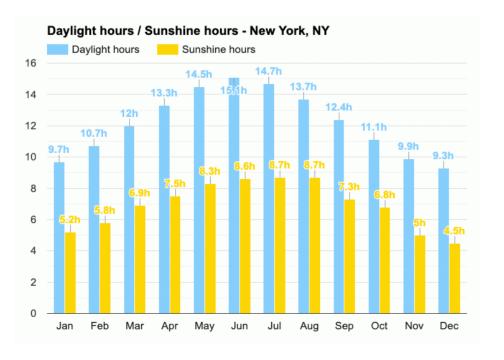


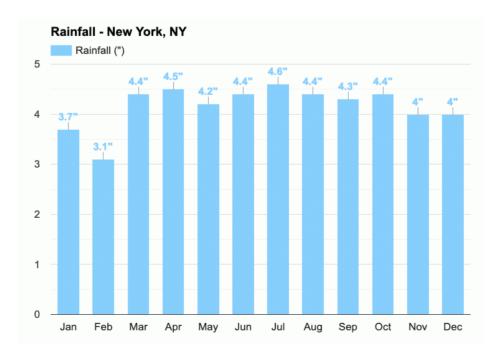




CLIMATE SCHEME

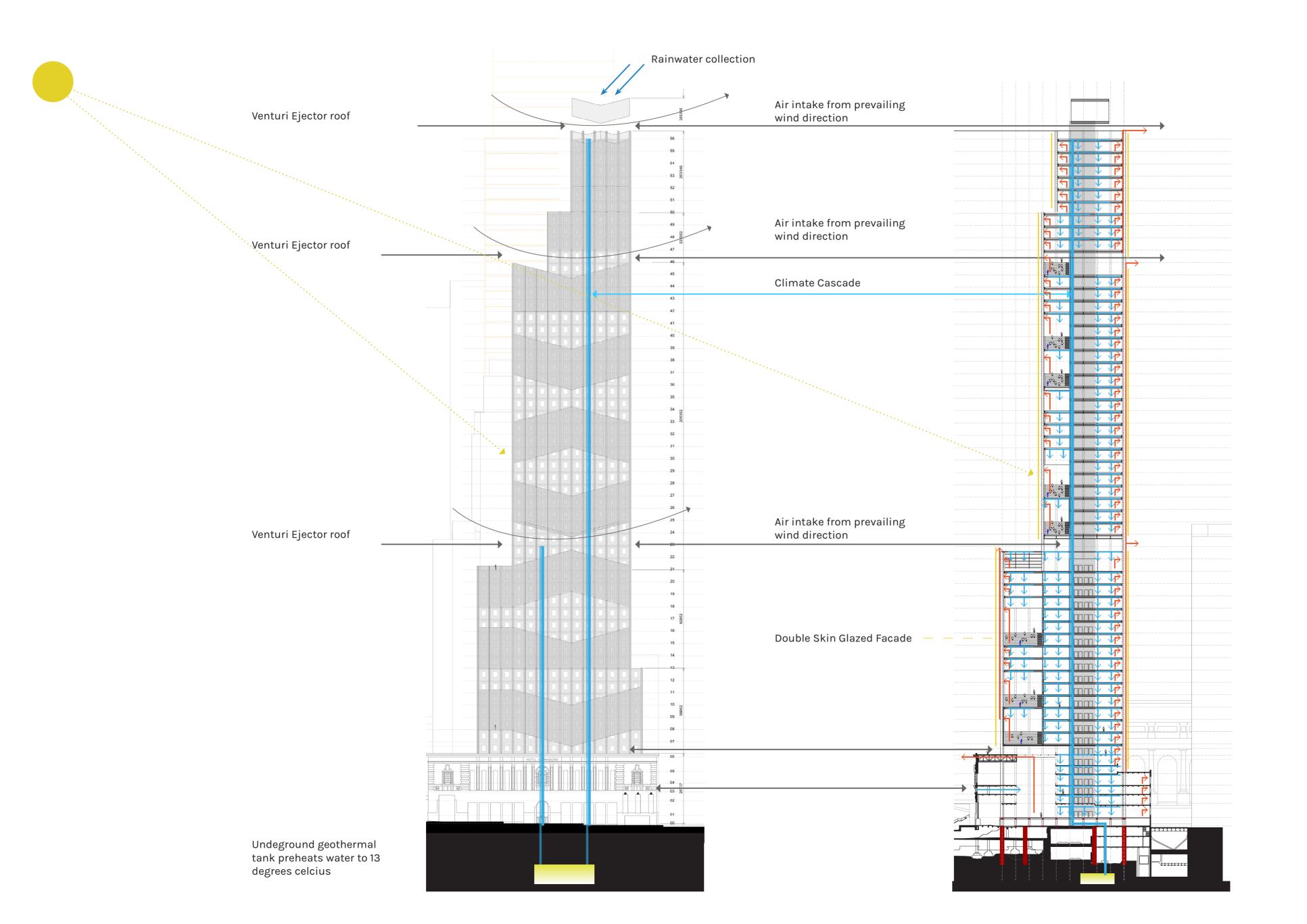








CLIMATE SCHEME



CLIMATE DIAGRAM PLINTH

Climate Cascade inside core shaft

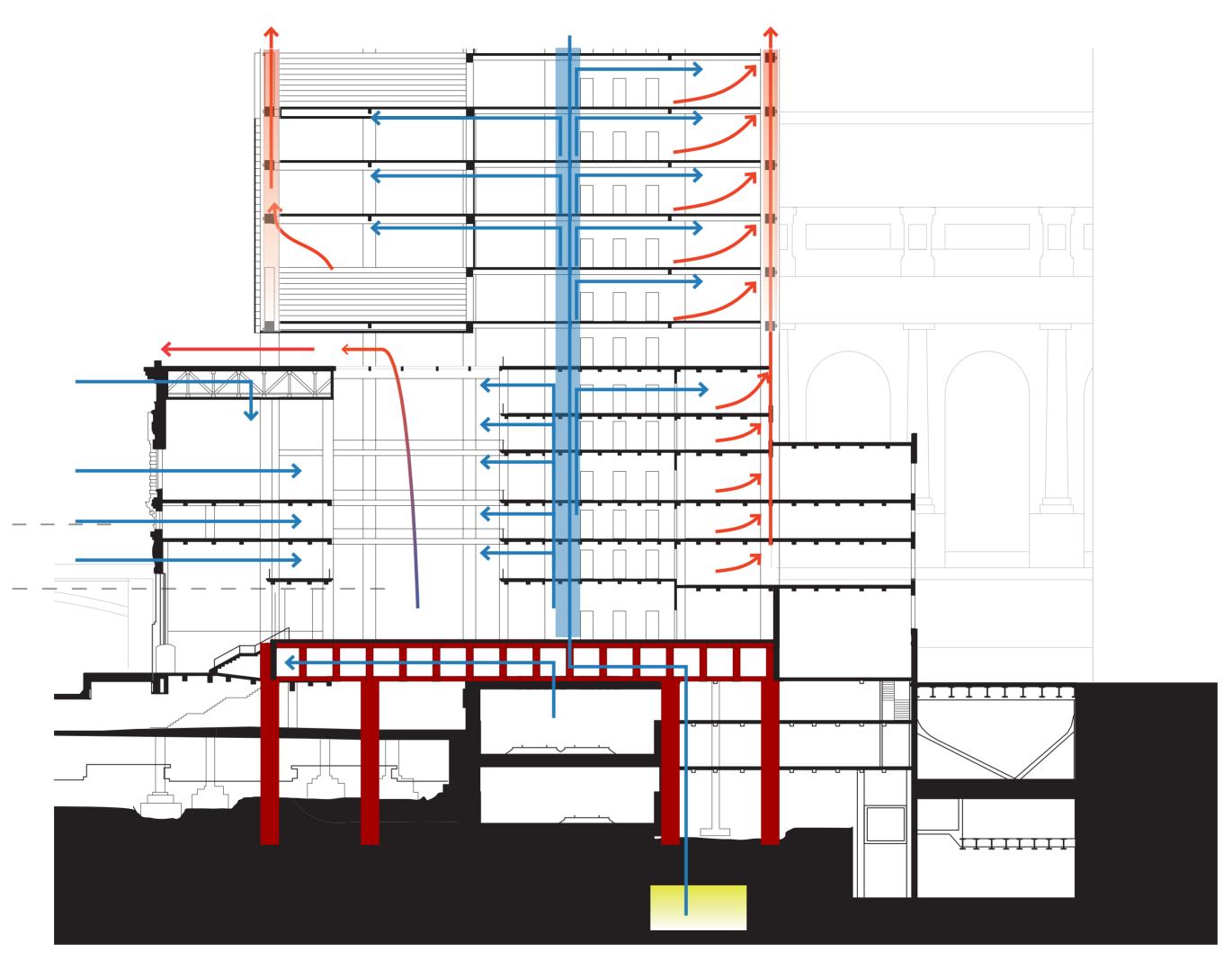
Fresh air from climate cascade is pushed up second duct in core and distributed into the spaces

Stale air is extracted in a duct integrated into the exterior columns

Mechnical air supply for backup through ceiling truss level

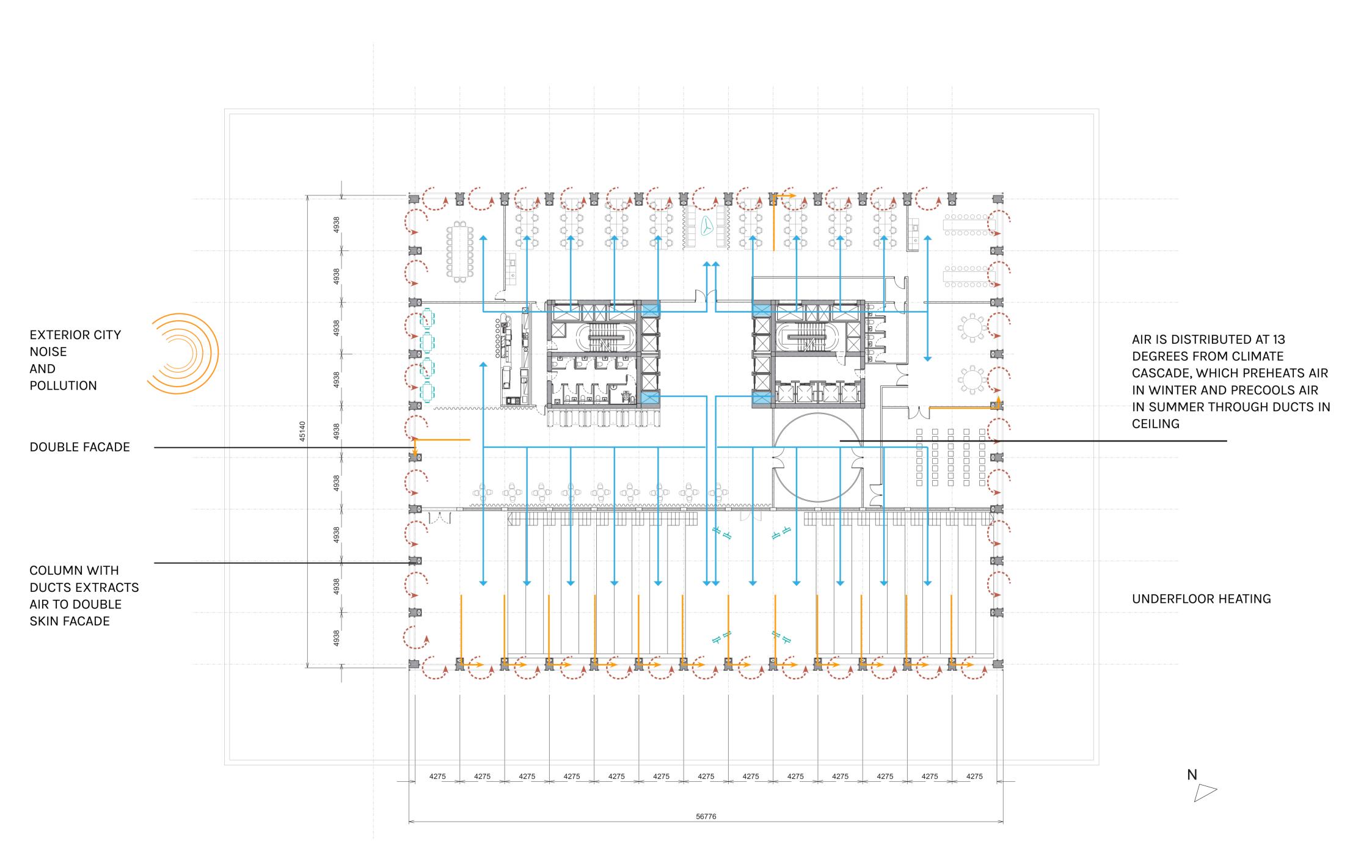
Cross ventilation for plinth spaces.

Stale air from plinth is ejected from atrium through stack effect



Water inside climate cascade is at 13 degrees. It obtains this temperature from an underground geothermal tank where the earth's stable temperatures are about 13 degrees.

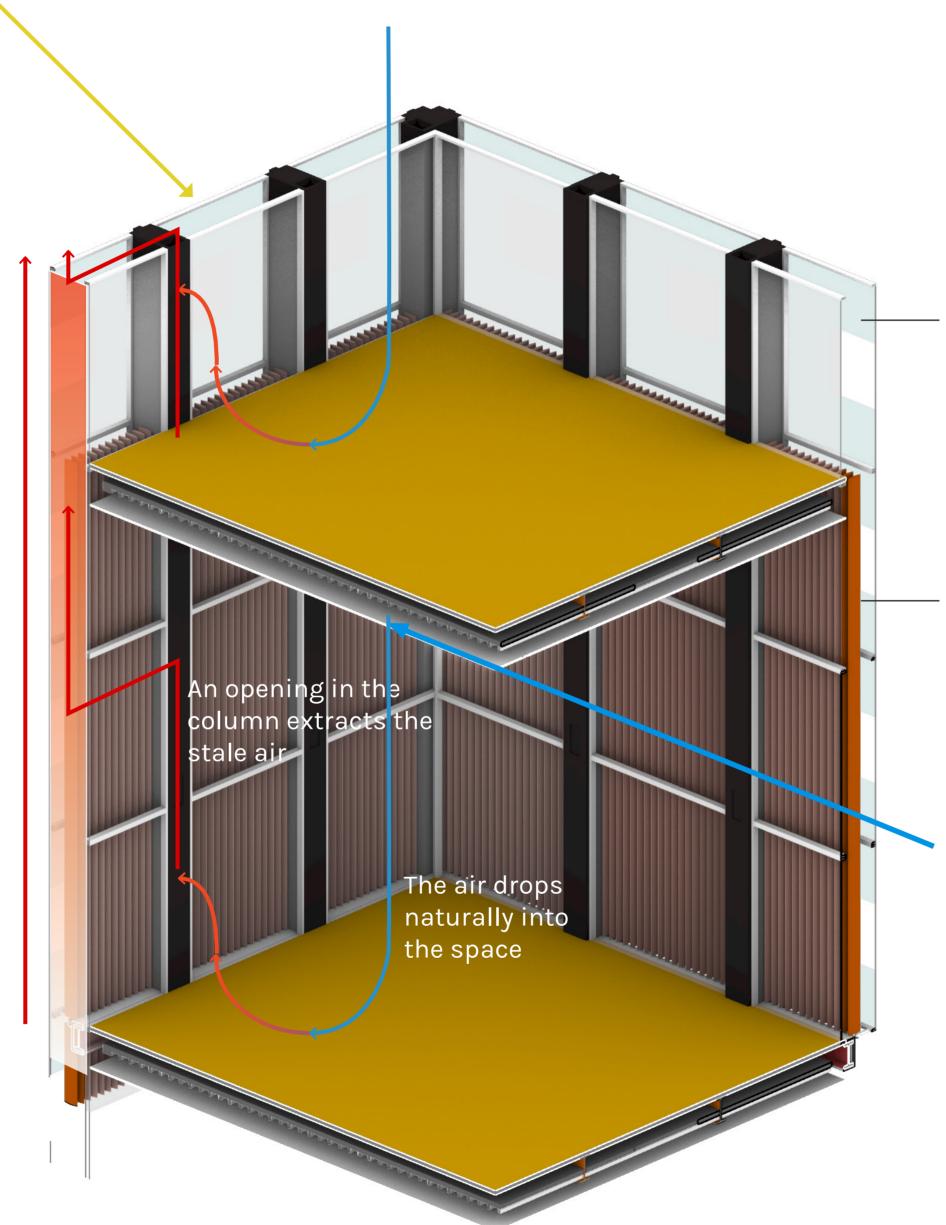
FORUM PLAN DOUBLE FACADE



FACADE INTEGRATION

A double skin facade with single glazing on the outside and double glazing inside runs continuously up the building

The column creates a shunt system. The air then enters the thermal flue (double skin facade) where thermal boyancy occurs through heating of the sun

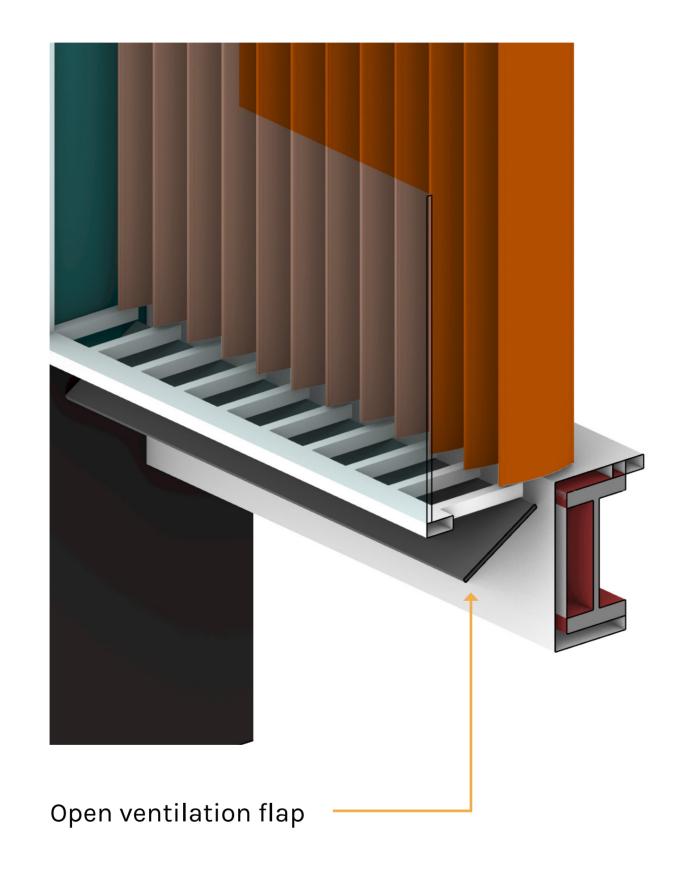


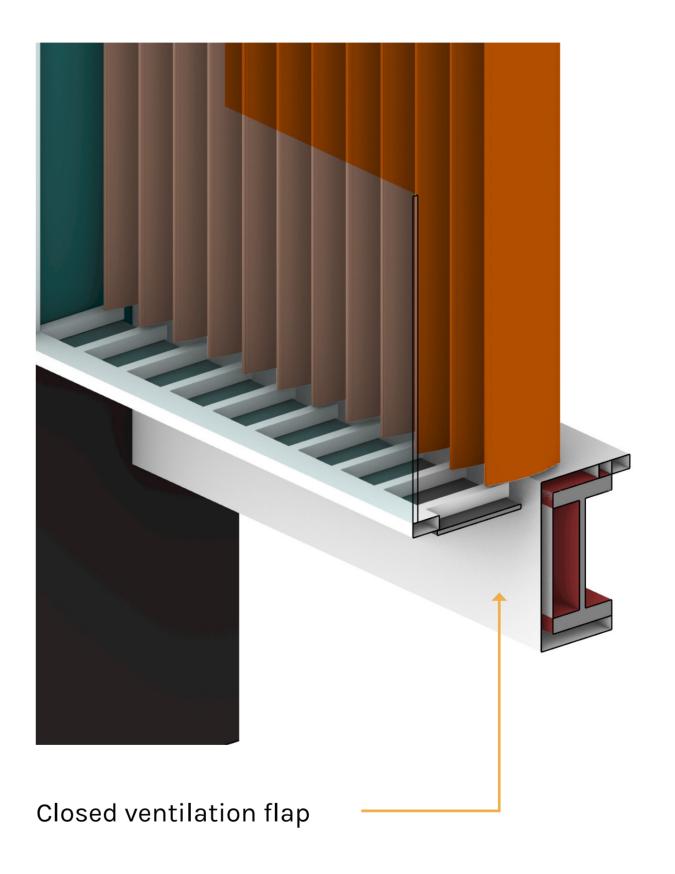
Office Space, no louvres, black frit on exterior pane of glass controls solar radiation

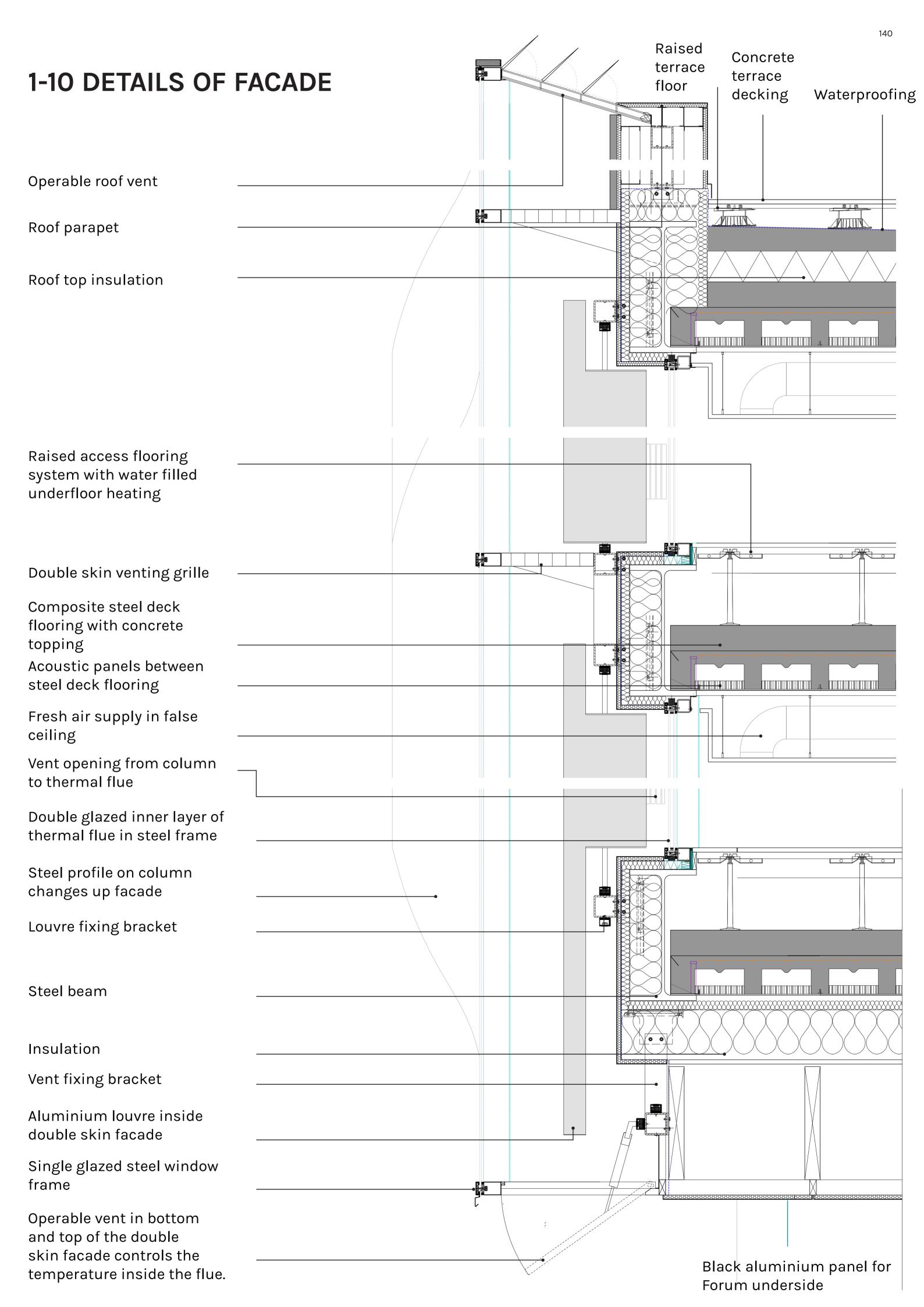
Forum space, coloured aluminium louvres define the volume and filter light. Black frit on exterior pane of glass further reduces solar radiation

Fresh air which is precooled in summer and pre heated in winter at 13 degrees is distributed through ceiling ducts in the drop ceiling. The air comes from the climate cascade in the core.

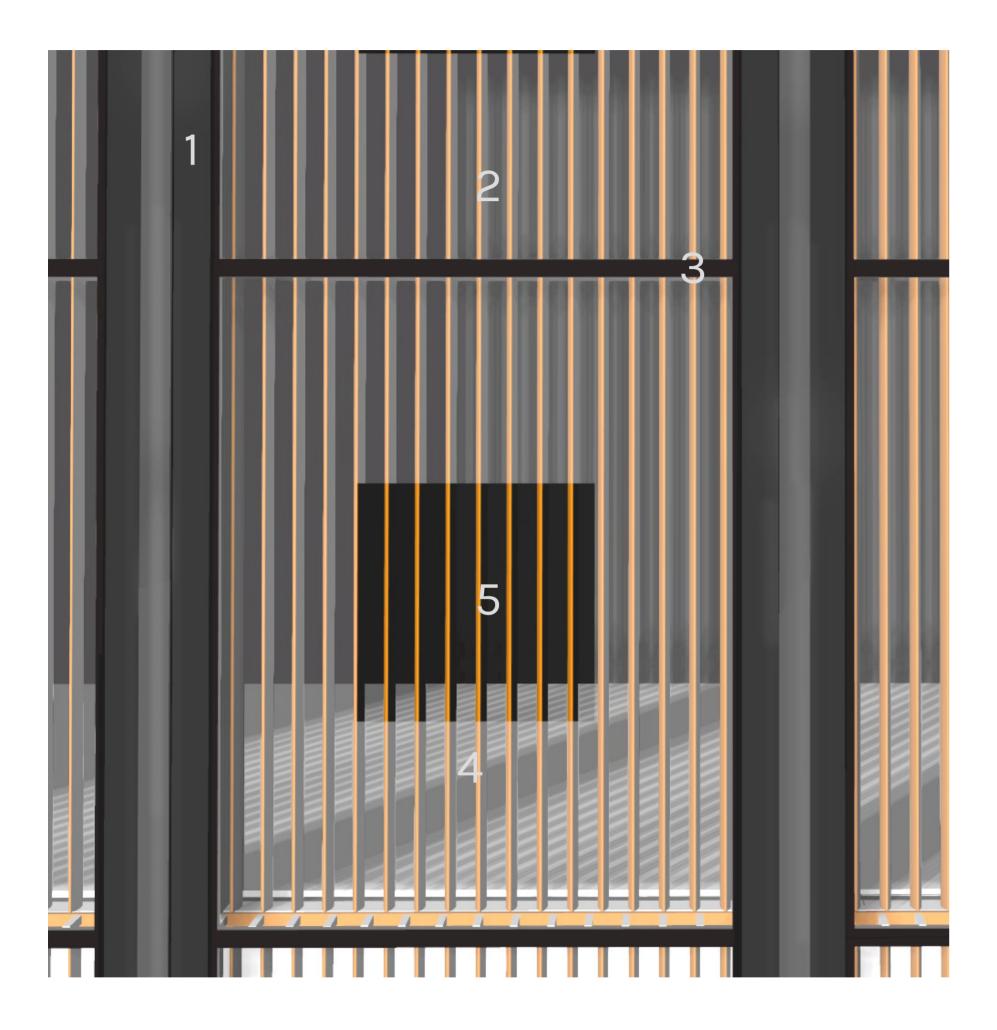
FACADE INTEGRATION

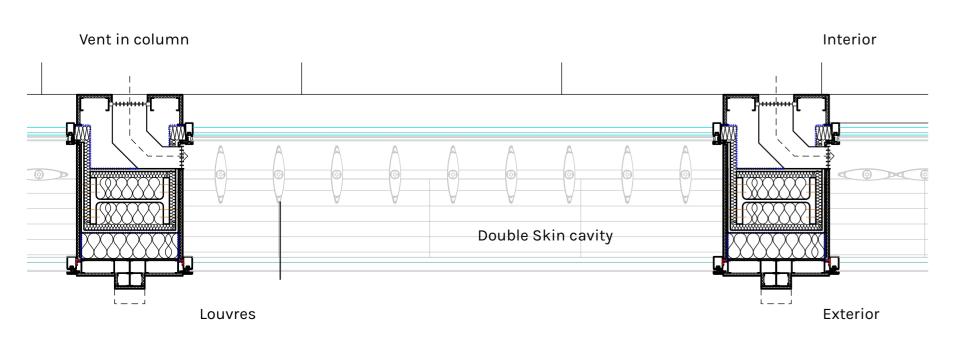


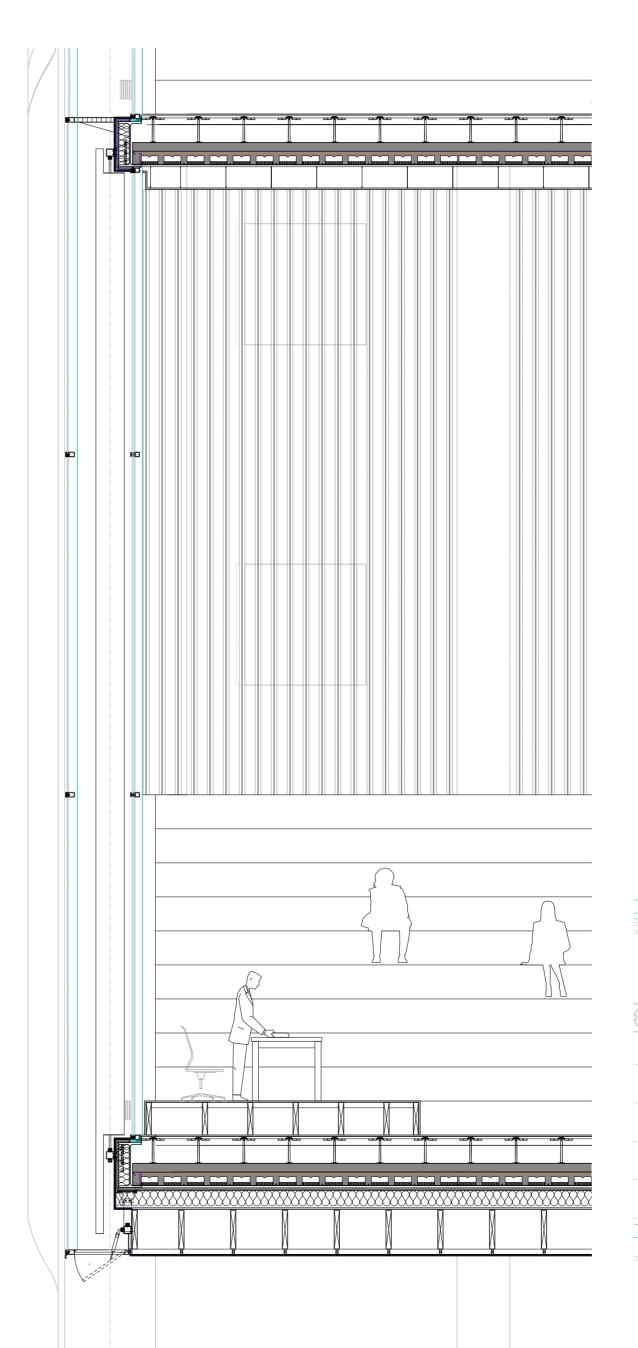




FACADE FRAGMENT







- 1. Black steel columns
- 2. Coloured Aluminium louvres
- 3. Black curtain wall frame
- 4. Glass frit
- 5. No glass frit

