P&B Pesetsky & Bookman

Center For Emerging Culture, Inc.
d/b/a Lightning Society

Community Board SLA License Questionnaire

Pesetsky & Bookman
Applicant's Alcoholic Beverage Counsel
325 Broadway, Suite 501
New York, NY 10007
www.pb.law | (212) 513-1988 | hello@pb.law

Meeting Date: May 2026

APPLICANT INFORMATION:

Name of applicant(s):
Center for Emerging Culture Inc

Trade name (DBA):
Lightning Society

Premises address:
45 Howard Street AKA 427 Broadway, Floors 4, 5 & Rooftop

Cross Streets and other addresses used for building/premise:

Between Broadway and Mercer Street

CONTACT INFORMATION:

Principal(s) Name(s):
Timothy Phillips

Office or Home Address: [redacted]

City, State, Zip: New York, NY 10013

Telephone #: [redacted]

Landlord Name / Contact:
The AJD Building LLC; Michael Chetrit

Landlord's Telephone and Fax: 212-698-6500

NAMES OF ALL PRINCIPAL(s):	NAMES / LOCATIONS OF PAST / CURRENT LICENSES HELD
Timothy Phillips	

Briefly describe the proposed operation (i.e. "We are a family restaurant that will focus on…"):

A not-for-profit private members cultural institution focusing on intimate salon-style gatherings designed to foster intellectual discussion, education, and networking. Our goal is to bring diverse individuals together to explore specific themes like arts and culture, and allow members to showcase talents, such as poetry and songwriting.

WHAT TYPE(S) OF LICENSE(S) ARE YOU APPLYING FOR (MARK ALL THAT APPLY):

_X_ a new liquor license (__ Restaurant __ Tavern / On premise liquor _X_ Other) Not-For-Profit Club

__ an UPGRADE of an existing Liquor License

__ an ALTERATION of an existing Liquor License

__ a TRANSFER of an existing Liquor License

__ a HOTEL Liquor License

__ a DCA CABARET License

__ a CATERING / CABARET Liquor License

__ a BEER and WINE License

__ a RENEWAL of an existing Liquor License

__ an OFF-PREMISE License (retail)

__ OTHER : _____

If upgrade, alteration, or transfer, please describe specific nature of changes:
(Please include physical or operational changes including hours, services, occupancy, ownership, etc.)

N/A

If this is for a new application, please list previous use of location for the last 5 years:

Cannabis Museum

Is any license under the ABC Law currently active at this location? _____ yes _X_ no

If yes, what is the name of current / previous licensee, license # and expiration date: N/A

Have any other licenses under the ABC Law been in effect in the last 10 years at this location?
___ yes _X_ no

If yes, please list DBA names and dates of operation:

N/A

PREMISES:

By what right does the applicant have possession of the premises?

___ Own _X_ Lease ___ Sub-lease ___ Binding Contract to acquire real property ___ other: _____

Type of Building: ___ Residential _X_ Commercial ___Mixed (Res/Com) ___ Other: _____

Number of floor: 5 Year Built : 1871

Describe neighboring buildings:
Mixed

Zoning Designation: M1-5/R9X; SNX

Zoning Overlay or Special Designation (applicable) N/A

Block and Lot Number: 231 / 8

Does the premise occupy more than one building, zoning lot, tax lot or more than one floor? X yes __ no
Floors 4, 5 & Rooftop

Is the premise located in a historic district? X yes ____ no

(if yes, have all exterior changes or changes governed by the Landmarks Preservation Commission (LPC) been approved by the LPC? X yes _____ no, please explain : _____
LPC has approved proposed work; already underway

Will any outside area or sidewalk café be used for the sale or consumption of alcoholic beverages? (including sidewalk, roof and yard space) ____ no X yes : explain Rooftop

What is the proposed Occupancy? 26

Does the premise currently have a valid Certificate of Occupancy (C of O) and all appropriate permits?

X no ____ yes

If yes, what is the maximum occupancy for the premises? See rider

If yes, what is the use group for the premises? B

If yes, is proposed occupancy permitted? X yes ____ no, explain : _____

_____

If your occupancy is 75 or greater, do you plan to apply for Public Assembly permit? X yes ____no

Do you plan to file for changes to the Certificate of Occupancy? X yes _____ no
(if yes, please provide copy of application to the NYC DOB) *Applied for a change in use from office to eating & drinking establishment - waiting for approval*

Will the façade or signage be changed from what currently exist at the premise? ____ no X yes

(if yes, please describe: Exterior signage on ground floor building door windows, and a branded canvas awning over the street elevator on Howard Street

INTERIOR OF PREMISES:

What is the total licensed square footage of the premises? Approx. 8,982 sq. ft. (including stairwells, storage, bathrooms, pantries, etc.)

If more than one floor, please specify square footage by floors: Floor 4: approx. 3,476 sq. ft. ; Floor 5: approx. 3,783 sq. ft. ; Rooftop: approx. 1,723 sq. ft.

If there is a sidewalk café, rear yard, rooftop, or outside space, what is the square footage of the area?

N/A

If more than one floor, what is the access between floors? Stairs x2 and elevator

How many entrances are there? 2 How many exits? 2 How many bathrooms ? 9

Is there access to other parts of the building? ___ no __X__ yes, explain: See attached diagrams

OVERALL SEATING INFORMATION:

Total number of tables? 51 Total table seats? 134

Total number of bars? 2 Total bar seats? 0

Total number of "other" seats? 2 please explain : Loungers

Total OVERALL number of seats in Premises : 136

BARS:

How many *stand-up bars / bar seats are being applied for on the premises? Bars 2 Seats 0

How many service bars are being applied for on the premises? 0

Any food counters? X no ___ yes, describe : _____

For Alterations and Upgrades:

Please describe all current and existing bars / bar seats and specific changes: N/A

_____

* A stand-up bar is any bar or counter (whether seating or not) over which a member of the public can order, pay for and receive food and alcoholic beverages.

PROPOSED METHOD OF OPERATION:

What type of establishment will this be? (check all that apply)

___ Bar ___Bar & Food ___Restaurant ___Club/ Cabaret ___Hotel __X__Other: Not-For-Profit Club

What are the Hours of Operation?

Sunday:	Monday:	Tuesday:	Wednesday:	Thursday:	Friday:	Saturday:
			* See Rider *			
___ to ___	___ to ___	___ to ___	___ to ___	___ to ___	___ to ___	___ to ___

Will the business employ a manager? ___ no _X_ yes, name / experience if known : _____

Will there be security personnel? ___ no _X_ yes(if yes, what nights and how many?) See rider
Do you have or plan to install French doors, accordion doors or windows that open? _X_ no ___ yes

If yes, please describe : N/A

Will you have TV's ? _X_ no ___ yes (how many?) _____

Type of MUSIC / ENTERTAINMENT: _X_ Live Music _X_ Live DJ ___Juke Box _X_ Ipod / CDs ___none

Expected Volume level: _X_ Background (quiet) ___ Entertainment level _X_ Amplified Music
(check all that apply)

Do you have or plan to install soundproofing? ___no _X_ yes

IF YES, will you be using a professional sound engineer? Yes

Please describe your sound system and sound proofing: See attached sound plan

Will you be permitting: ___ promoted events _X_ scheduled performances ___ outside promoters

___ any events at which a cover fee is charged? _X_ private parties

Do you have plans to manage or address vehicular traffic and crowd control on the sidewalk caused by your establishment? ___ no _X_ yes (if yes, please attach plans) See attached traffic plan

Will you be utilizing ___ ropes ___ movable barriers ___other outside equipment (describe) ____

See rider*

Are your premises within 200 feet of any school, church or place of worship? _X_ no ___ yes

If there is a school, church or place of worship within 200 feet of your premises or on the same block, please submit a block plot diagram or area map showing its' location in proximity to your applicant premises (no larger than 8 ½ " x 11").

Indicate the distance in feet from the proposed premise:

Name of School / Church: _____

Address: _____ Distance: _____

Name of School / Church: _____

Address: _____ Distance: _____

Name of School / Church: _____

Address: _____ Distance: _____

Please provide contact information for Residents / Community Board and confirm that if complaints are made you will address it immediately.

Contact Person: Timothy Phillips Phone: [redacted]

Address: [redacted]

Email : [redacted]

Application submitted on
behalf of the applicant by:

_____
Signature

Print or Type Name Timothy Phillips

Title President

Thank you for your cooperation. Please return this questionnaire along with the other required documents as soon as you can. This will expedite your application and avoid any unnecessary delays. Use additional pages if necessary.

Community Board 2,
Manhattan SLA Licensing
Committee Donna Raftery, Chair

CATERING ESTABLISHMENT PROPOSED LICENSED PREMISES

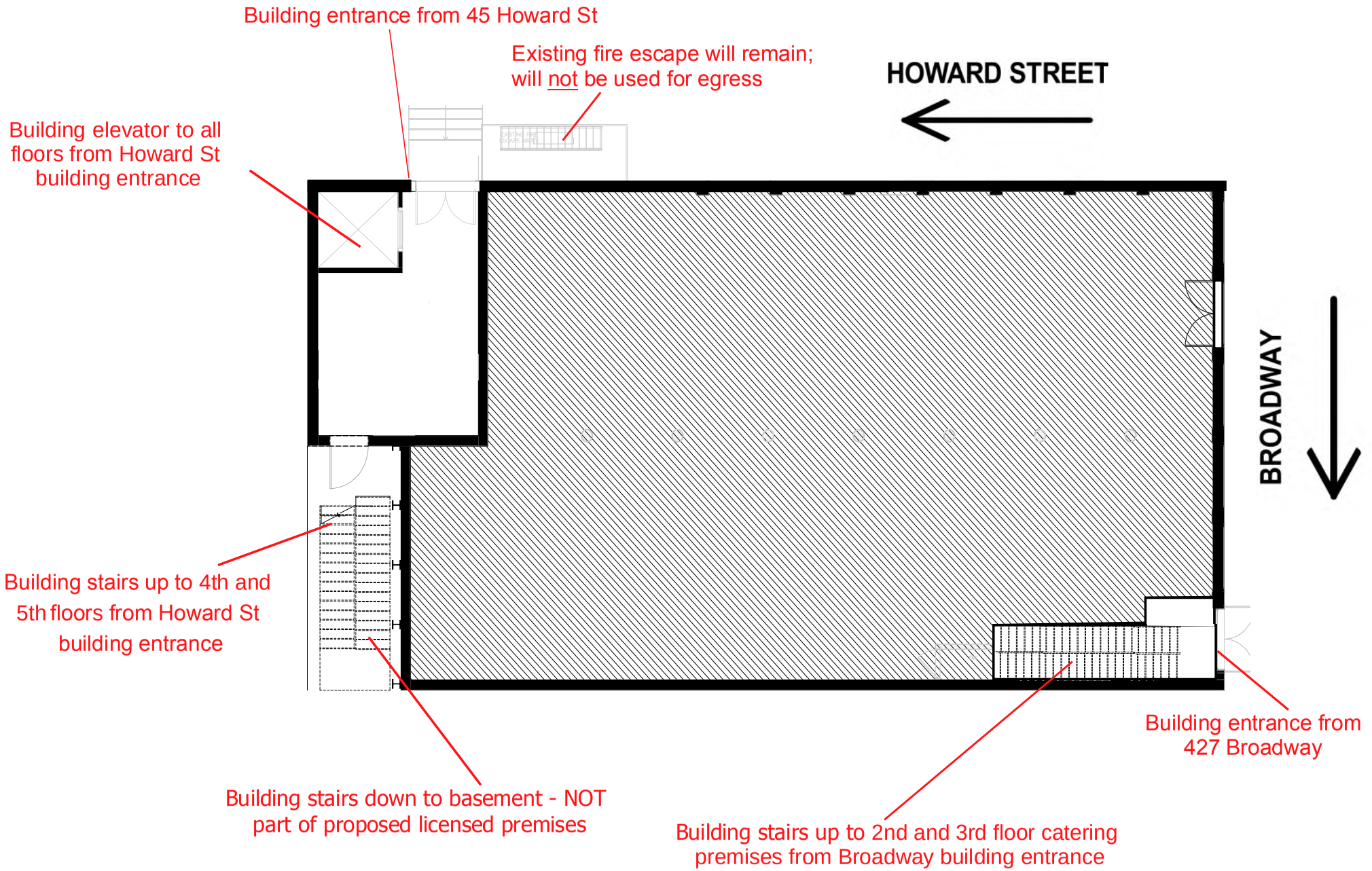
FLOORS 2 & 3

	Regular Operations	Special Events *No more than 10 per year across entire building*
Hours	8AM – 11PM, Sun – Thurs 8AM – 12AM, Fri + Sat	7:30AM – 12AM, Sun – Thurs 7:30AM – 2AM, Fri + Sat
Occupancy	225	400
Wait Lines	No outdoor queueing past 6PM	Outdoor queueing past 6PM
Security	2-4 security personnel on weekends	Additional security personnel, as needed (est. 5-8)

PRIVATE CLUB PROPOSED LICENSED PREMISES

FLOORS 4, 5 & ROOFTOP

	Regular Operations	Special Events *No more than 10 per year across entire building*
Hours	**Floors 4 & 5** Sun + Mon: 10AM – 12AM Tues – Thurs: 9AM – 12AM Fri: 9AM – 2AM Sat: 10AM – 2AM **Rooftop** 12PM – 10PM, daily	**Same as Regular Operations**
Occupancy	226	464
Wait Lines	No outdoor queueing	No outdoor queueing
Security	1 security personnel 7 days/week; 5PM – close	Additional security personnel, as needed (est. 5-8)

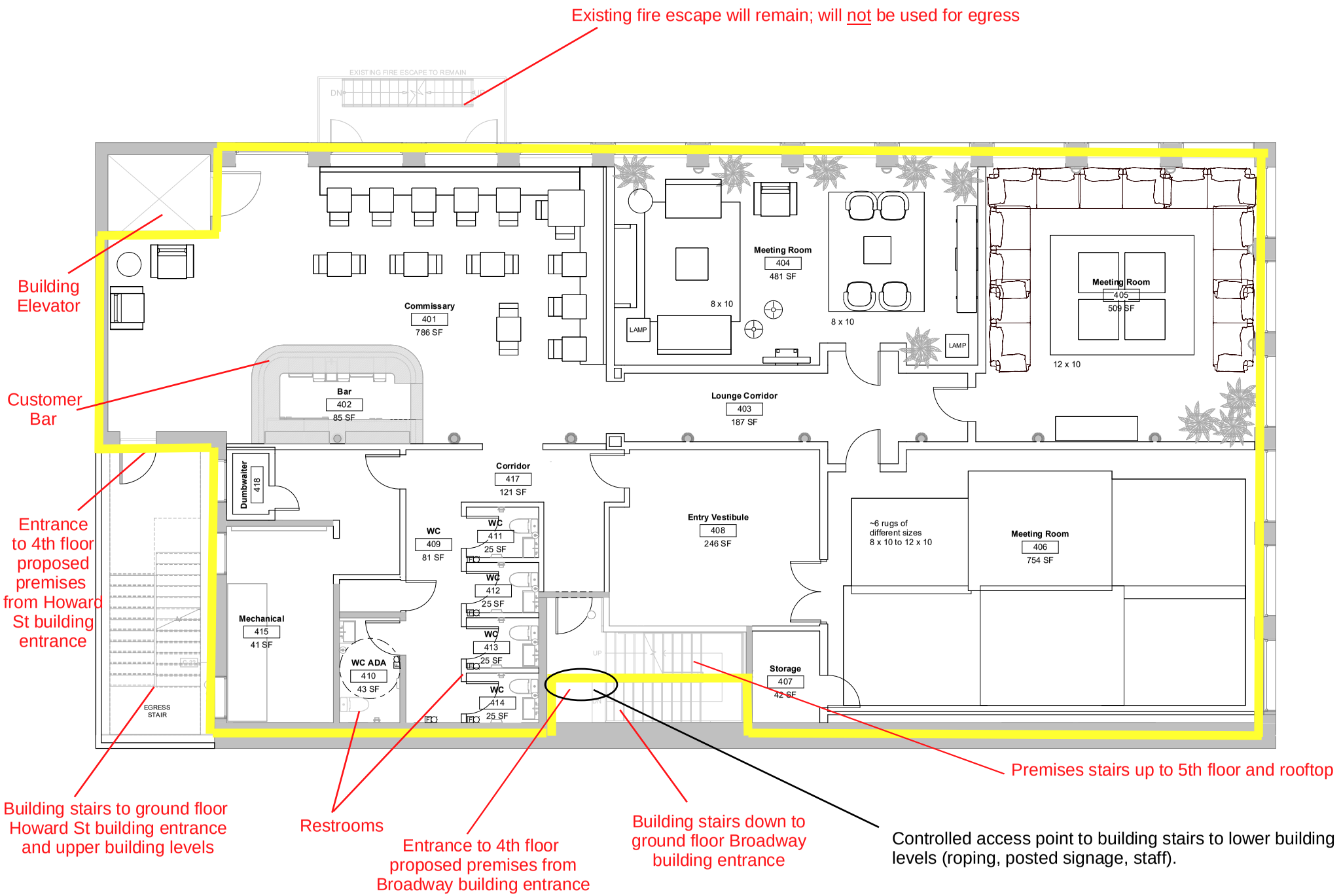


Center for Emerging Culture Inc

Ground Floor

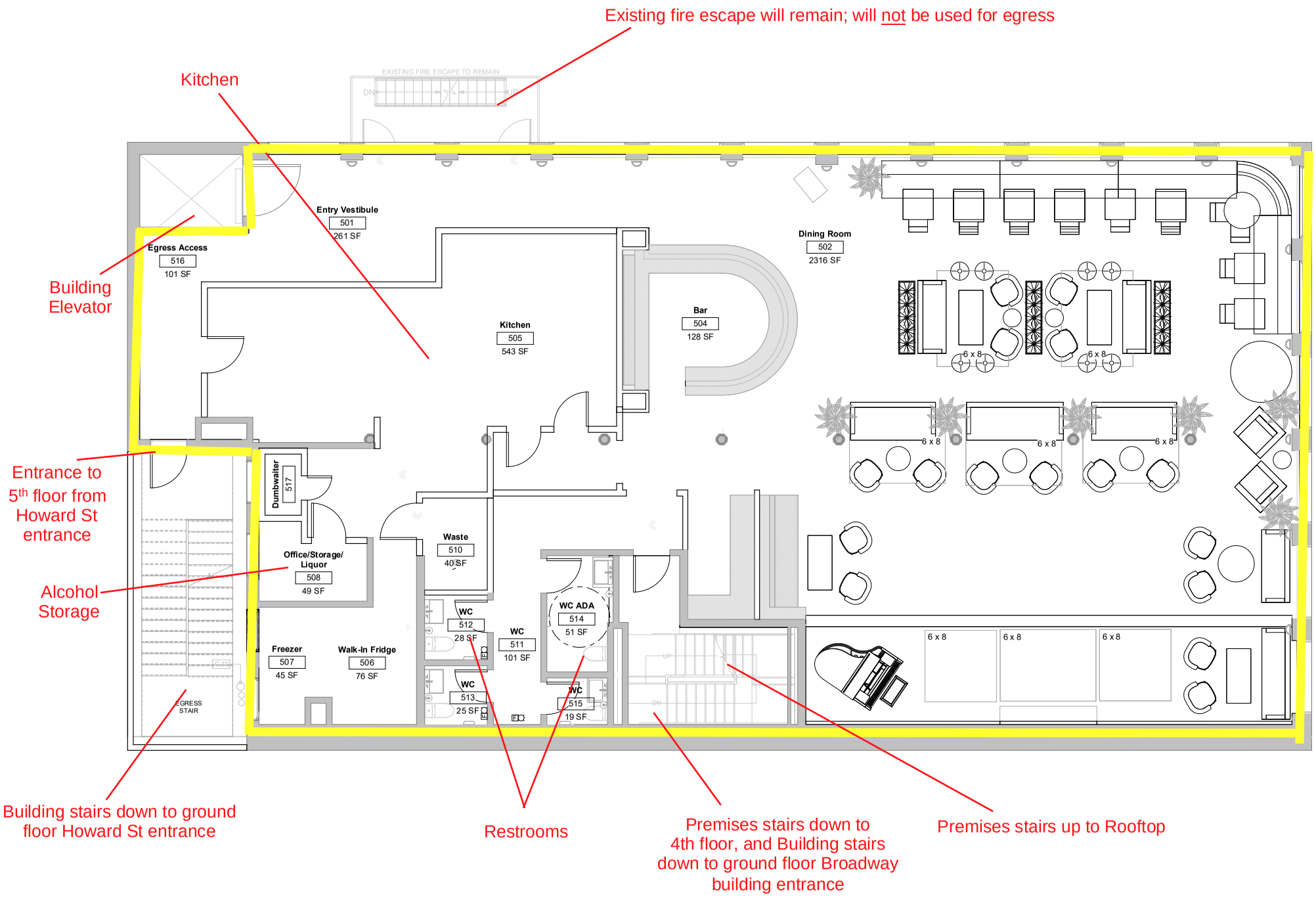
Center for Emerging Culture Inc

Fourth Floor



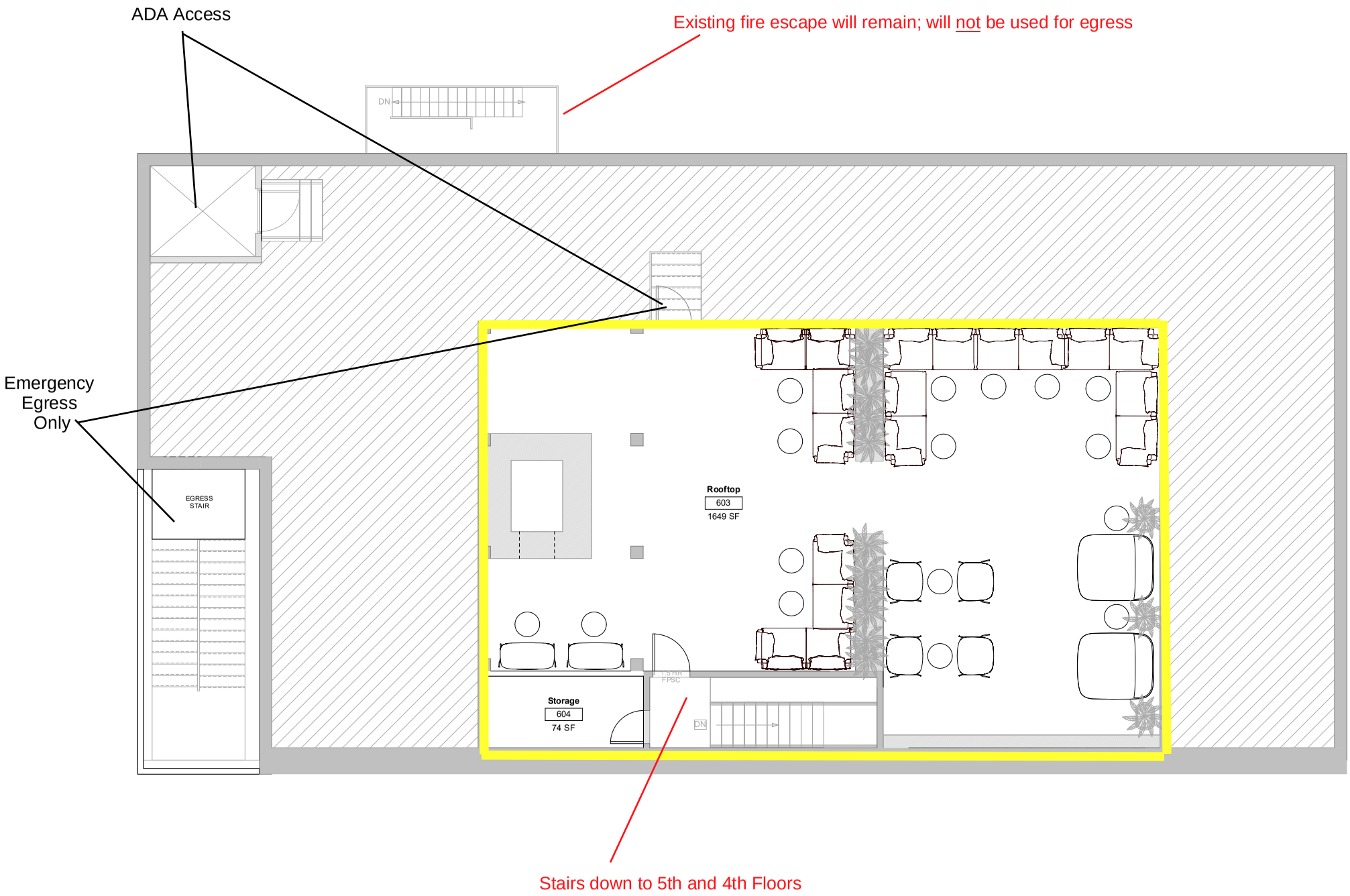
Center for Emerging Culture Inc

Fifth Floor



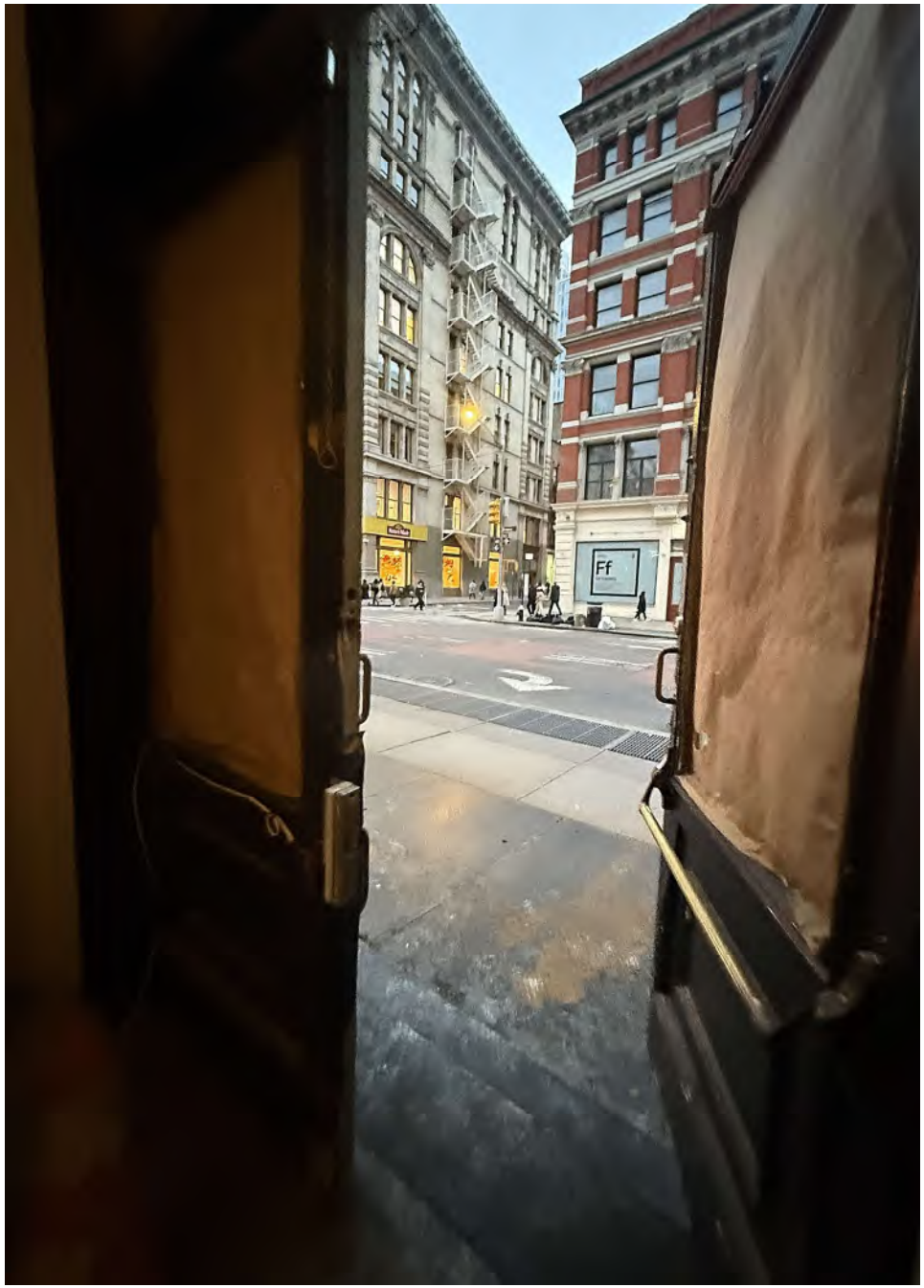
Center for Emerging Culture Inc

Rooftop



Proposed Premises - 2nd and 3rd Floors

Building Entrance from 45 Howard Street



Building Entrance from 427 Broadway

MENU

DIPS

- ***Tzatziki*** *– pita, olives, crudités*
- ***Guacamole*** *– taro chips*

SMALLS

- ***Shishito Peppers*** *– miso glaze – 12*
- ***Buffalo Chicken or Cauliflower*** *– 16 | 12*
- ***Crispy Brussels Sprouts*** *– 14*
- ***Burrata*** *– tomato, basil (v) – 18*

SALADS *(add vegan chicken 10 | chicken 10 | salmon 10)*

- ***Market Greens*** *– crispy onions, carrots, chia seeds – 17*
- ***Ahi Tuna Poke Bowl*** *– avocado, cucumber, fresno, jasmine brown rice – 22*

SANDWICHES

- ***Southern Fried Chicken Sandwich*** *– cabbage slaw, pickle, Calabrian chili aioli – 20*
- ***Cheeseburger*** *– cheddar, mustard, iceberg, tomato, pickles, fries – 21*
- ***Vegan Burger*** *– lettuce, tomato, pickles, mustard mayo, sweet potato fries (pb) – 22*

WOOD-FIRED PIZZA

- ***Buffalo Mozzarella*** *– tomato, basil, oregano – 22*
- ***Mushroom*** *– goat cheese, pearl onion, dill (v) – 23*
- ***Salami*** *– tomato, mozzarella, mushroom – 24*
- ***Plant-Based*** *– artichoke, olive, hemp ricotta (pb) – 21*

NYS SLA Traffic and Utilization Analysis
Center for Emerging Culture
45 Howard Street
Manhattan Community District 2

PREPARED FOR:
Center for Emerging Culture Inc.
45 Howard Street, NYC 10013
ATTN: Timothy Phillips

GZA GeoEnvironmental, Inc.
104 West 29th Street, NYC 10001
(212) 594-8140
31 Offices Nationwide
www.gza.com

April 19, 2026

1. OVERVIEW

GZA has reviewed the traffic and parking generation associated with the Center for Emerging Culture. The Center for Emerging Culture will provide a variety of spaces for cultural events, socializing, formal and informal gatherings, and co-working. The proposed SLA licensed catering establishment will occupy space on the second and third floors, and the separately licensed private members club will occupy space on the fourth and fifth floors, as well as the roof of 45 Howard Street a/k/a 427 Broadway. The spaces are described below.

The property is located on the southwest corner of Broadway and Howard Street in Manhattan Community District 2. Based on our understanding of the membership club's scale, operations and patronage, and the area's transportation context, we believe that it can function at this location without adversely affecting traffic or parking conditions in the area. Additionally, we provide recommendations the operator may explore to ensure that any potential effects on traffic are addressed and minimized.

Operations

The Center for Emerging Culture will provide its members and their guests with a variety of spaces for cultural events, socializing, formal and informal gatherings, and co-working. The proposed facility will operate under two separately issued State Liquor Authority (SLA) licenses: a catering establishment occupying the second and third floors, and a private members club occupying the fourth and fifth floors together with the rooftop, all within the building at 45 Howard Street a/k/a 427 Broadway. The individual spaces are described below.

Ground Floor: The primary entry to the venue is via 45 Howard Street, where patrons enter the Entry Lobby and access an elevator and staircase serving the second floor through the rooftop. A secondary entry point is provided via 427 Broadway, with a staircase to the second floor.

Second Floor (Catering Establishment): The second floor includes the Entry Vestibule, Event Space, and Service Pantry. The Event Space can be rented for private use. Under the worst-case scenario, acoustic live music with amplified reinforcement is possible in this space; otherwise, background music is played through in-house speakers. The maximum physical occupancy of this floor is 200 persons.

Third Floor (Catering Establishment): The third floor consists of a Reading Room, Listening Room, Coffee Bar, and Storage/Food Prep area. The Reading Room is a lounge and co-working space in which acoustic live music with amplified reinforcement is possible under the worst-case scenario; otherwise, background music is played through in-house speakers. The Listening Room houses a sound system and record player for patron use and does not face any exterior windows. The physical maximum occupancy of this floor is 261 persons.

Combined operational occupancy of the second- and third-floor catering establishment would be up to 225 persons during typical events, and up to 400 persons during Special Events (limited to no more than ten per year).

Fourth Floor (Private Members Club): The fourth floor includes four Meeting Rooms and a Commissary space with a bar. Under the worst-case scenario, live music is possible within the Large Conference Room;

otherwise, background music is played through in-house speakers. The physical maximum occupancy of this floor is 238 persons.

Fifth Floor (Private Members Club): The fifth floor contains a Members Lounge, Bar, Entry Vestibule, and Kitchen. This floor is proposed to offer sit-down dining with live entertainment, which may include a live band or a DJ. The maximum physical occupancy of this floor is 200 persons.

Rooftop (Private Members Club): A terrace is located on the rooftop and is operated under the private members club license. Background music is anticipated for this space. The maximum physical occupancy is 26 persons, and the rooftop is proposed to close no later than 10:00 PM daily.

Combined operational occupancy of the fourth- and fifth-floor and rooftop private members club would be up to 226 persons during typical events, and up to 464 persons during Special Events (limited to no more than ten per year).

To represent the worst-case scenario, it is assumed that all spaces are occupied simultaneously. Building-wide occupancy would be up to 451 persons during typical operation and up to 864 persons during Special Events, which are limited to no more than ten per year across the entire facility.

Proposed Hours of Operation

Catering Establishment (2nd and 3rd Floors):

- **Regular operation:** 8:00 AM – 11:00 PM, Sunday through Thursday; 8:00 AM – 12:00 AM (midnight), Friday and Saturday.
- **Special Events:** 7:30 AM – 12:00 AM (midnight), Sunday through Thursday; 7:30 AM – 2:00 AM, Friday and Saturday.

Private Members Club – 4th and 5th Floors (regular operation and Special Events):

- 10:00 AM – 12:00 AM (midnight), Sunday and Monday.
- 9:00 AM – 12:00 AM (midnight), Tuesday through Thursday.
- 9:00 AM – 2:00 AM, Friday.
- 10:00 AM – 2:00 AM, Saturday.

Private Members Club – Rooftop (regular operation and Special Events):

- 12:00 PM (noon) – 10:00 PM, daily.

Site Context

The neighborhood in which the Center is to operate features an eclectic mix of commercial, residential, light industrial, and cultural land uses. This highly walkable neighborhood, shown in **Figure 1,** features an active commercial streetscape offering restaurants, boutique and destination retail, and commercial and professional office uses that are well served by mass transit and off-street parking. The overall traffic and parking conditions around the Site are typical for a vibrant Manhattan neighborhood, characterized by

high pedestrian volume and steady vehicular turnover The presence of the Center for Emerging Culture at 45 Howard Street/427 Broadway would be consistent with neighborhood character and adjacent uses.

Howard Street is a one-way westbound local street extending four blocks, from Centre Street to Mercer Street, terminating one block west of the premises. Howard Street has one moving lane for vehicular traffic, and curbside parking and loading on both sides of the Street. Both the northern and southern curb lanes are signed for Commercial Vehicles Only – 3 hour metered parking from 8am to 6pm Monday to Friday, and 2-hour metered parking (not restricted to commercial vehicles) from 8 am to 6 pm Saturday. The southern sidewalk on Howard Street, adjacent to the premises, has a width of 9.38 feet.

Broadway adjacent to the premises is one-way downtown. It has three lanes for vehicular traffic, one each for left turn, right turn, and through movements at Canal Street, one block to the south, as well as a dedicated bus lane located between the right turn lane and the through-movement lane. The curb lanes on both sides of Broadway between Howard Street and Canal Street are posted as No Standing Anytime. The curb lanes on both sides of Broadway between Grand Street and Howard Street are posted for 3-hour metered parking for commercial vehicles only Monday to Friday from 7 am to 6 pm, and 2-hour metered parking Monday to Friday from 6 pm to 10 pm, and Saturday from 8 am to 10 pm. The western sidewalk on Broadway, adjacent to the premises, has a width of 13.55 feet.

A review of average annual daily traffic (AADT) recorded by NYS Department of Transportation was evaluated for major road segments abutting the premises. The latest available data from 2025 identified an AADT of 12,955 vehicles on this section of Broadway, with heaviest volumes during the 8 to 9 pm hour (868 vehicles) and the 9 to 10 pm hour (872 vehicles)[1]. Howard Street, which extends for only four blocks, one block north of Canal Street, carries minimal traffic and is not regularly monitored by NYS DOT.

Local and express subway service is available at the Canal Street station on the Broadway line (N, Q, R, and W) with underground connections to the 6, J, and Z lines. Citibike docking stations are at Broadway and Lispenard Street, two blocks to the south, and at Howard and Lafayette streets, two blocks to the east. There are multiple off-street parking facilities with available parking capacity within 500 feet, as detailed in **Table 1** and locations shown in **Figure 2.**

[1]https://nysdottrafficdata.drakewell.com/tfdaysreport.asp?node=NYSDOT_SC&cosit=041252000000&reportdate=2025-04-22&enddate=2025-04-24

Figure 1: Site Location - Context

Figure 2: Transportation Context

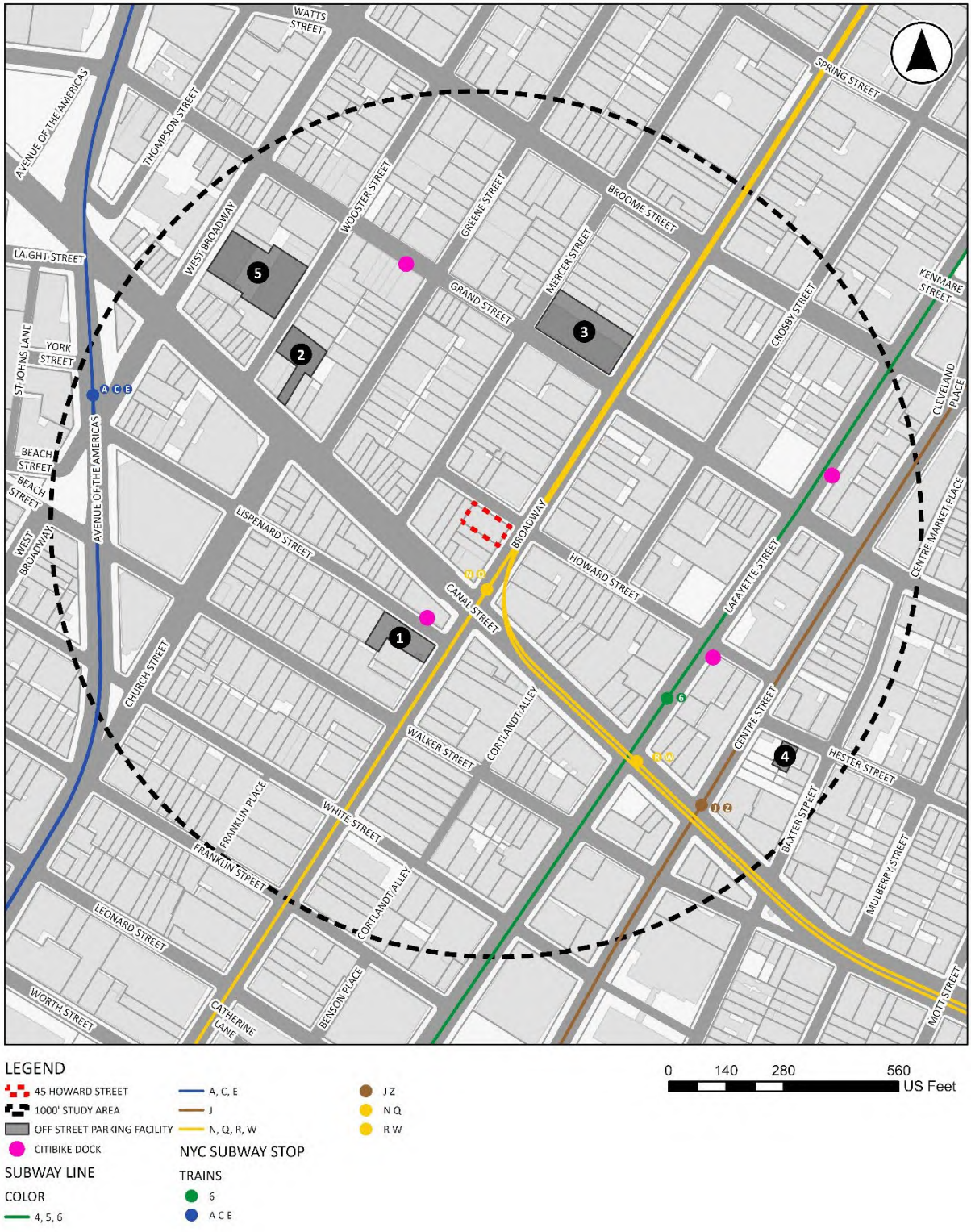


Table 1: Parking within Five Minute Walking Distance

Map ID #	Name	Address	Capacity	Hours
1	Champion Parking	413 Broadway	60 cars	8 am – 10 pm
2	Park-it Wooster	349 Canal St	225 cars/22 bicycles	24 hours
3	City Parking	40 Mercer St	100 cars	6 am-midnight
4	Edison ParkFast	174 Centre St	93 cars/9 bicycles	24 hours
5	City Parking	311 West Broadway	93 cars	24 hours

Activities & Utilization Analysis

Proposed Venue

As noted, the Center would contain multiple licensed spaces including lounges, meeting rooms, conference room, restaurant, and study for use as a catering facility, as well as by members and their guests for cultural and educational events, coworking and collaboration, dining, socializing, and business and social gatherings. While total seated capacity of all licensed spaces is 925 (899 indoors and 26 outdoors), the spaces on the 2nd and 3rd floor are designed and intended primarily to host events during business hours, while the 4th and 5th floors would be primarily active during evening hours and weekends. Over the course of a given day there might be five or ten events, but the overwhelming majority would be meetings under 20 people. Larger events which might include musical performances would amount to less than one per day. Based on the design and intended use of the spaces operational plans and staffing levels, expected occupancy would be no more than 50% of total capacity. Occupancy on a typical event day could be up to 225 in the catering facility and 226 in the membership club, for a total of 451. As noted, catering events would primarily be during business hours, and therefore any queuing for such events would occur during the daytime, with no queuing after 6 PM. Under typical operation, members would enter the private club with no queuing.

Peak occupancy would occur during special events such as the Center's membership holiday parties or major catered events such as those occurring during New Years celebration, which could be attended by up to 864 people for an evening-long event occupying all floors. On such special event occasions, there would be sidewalk queuing after 6 PM. This is the 'worst-case' utilization.

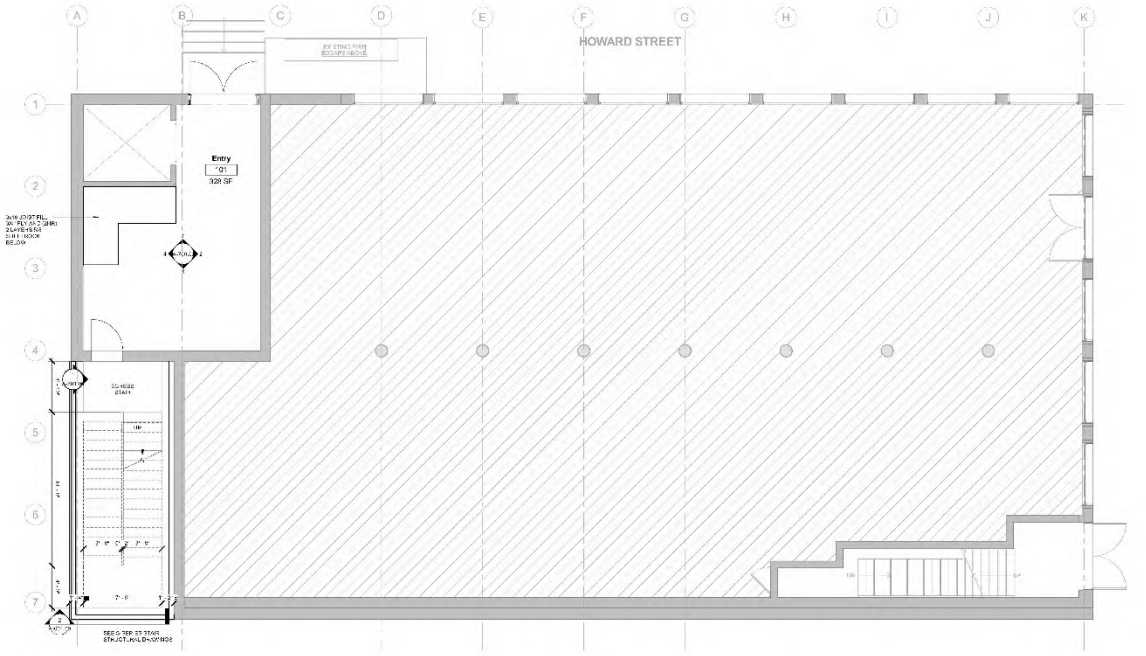
Traffic and Access Analysis

Access to the Center is via a set of double doors on Broadway, and an ADA accessible set of double doors on Howard Street as shown in **Figure 3**. The Broadway doors open onto a lobby which provides direct access to stairs leading to the 2nd floor. Check-in would be on the second floor. The Howard Street doors would open into a lobby, which provides direct access to elevators and stairs that lead to the 2nd floor where members and guests would check in. The service entrance is on Howard Street as noted in **Figure 3**. The lobbies on Howard Street and Broadway can adequately accommodate and process arriving members and their guests toward the 2nd-floor reception area without causing significant queuing on the sidewalk. Since the premises would primarily host business and after-work events, no sidewalk queuing after 6 pm would occur except during up to ten special events per year. In order to minimize check-in

delays and subsequent queuing, it is recommended that registrations and reservations be processed via contactless check-in using QR codes.

While entrances to the Center are on both Broadway and Howard Street, for-hire vehicle drop-off and pick-up would be directed to Broadway, to minimize noise and activity on the side street. Additionally, egress from the Center would be steered toward the Broadway frontage.

Figure 3: Ground Flood Access



The worst-case assessment assumes full operational occupancy for a special event such as a holiday party or major catered event, with up to 864 members and guests visiting the Center. Because such an event would consist of various activities in the spaces throughout the building, it is expected that traffic flow into and out of the Center would be dispersed throughout the day or evening. However, to model a 'worst-case' condition, it is assumed that full occupancy would arrive within a one-hour period and similarly depart within a one-hour period.

These factors were utilized to build arrival and departure models for the proposed licensed spaces and then broken down into travel mode to identify the number of private cars, cabs/car service, and pedestrian trips associated with the Center. These projections serve as a basis of assessment for potential traffic impact and identify operational measures for optimal functioning within the context of the neighborhood.

The assessment below assumes private car and cab/car service occupancy to be an average of 2 patrons per vehicle. Net cab/car service trips are assumed to consist of both arrival and departing movement. Non-drop-off private car trips are counted as pedestrian arrivals at the premises as the models below

assume that these vehicles would seek curbside or off-street parking accommodations elsewhere in the area. There is no on-site parking offered.

Assessment of Arrivals and Departures for the Center's Spaces – "Worst Case Condition"

The worst-case condition for traffic would occur during the peak evening period of background traffic on Broadway, identified as 8 to 10 pm[2]. This worst-case analysis was selected during this period as ambient existing background traffic is at its highest. Although the proposed licensing and range of spaces would allow for members and guests to arrive earlier and depart later, it is conservatively assumed that all patrons would arrive and depart within a one-hour period.

Based on observations at the premises during its operation, from November 2025 to March 2026, as an event space without licensure and therefore with no liquor service, it is expected that most events would draw attendees who travel almost exclusively by mass transit or walking from nearby locations. However, to model a 'worst-case' condition, as shown in **Table 2** below, it is conservatively expected the Center would generate the following mode trips.

- 25% of its patrons from cab/car-service which would drop-off/pick-up primarily on Broadway.
- 15% would take private auto and park at a local public parking facility.
- 60% would walk or use transit and walk to Site (this includes linked trips from area restaurant/ bar establishments).

Table 2: Forecast Patron Mode of Arrival

Modal Split:	**All**
Auto-Drive (walk to site)	15.00%
Subway (walk to site)	35.00%
Drop-off (Taxi-Car Service)	25.00%
Walk Only	25.00%
Total	**100%**
Vehicle Occupancy:	
Auto	2
Taxi-Car Service	2

As shown in **Table 3** and noted above, the peak occupancy for a 'worst-case' holiday event would be 864, and 25% of this total patron traffic is forecasted to use cab/car-service. This mode share of patrons would generate 108 vehicular arrival/departures via cab/car service. Members and guests would be advised to instruct rideshare and taxi drivers to use the premises' Broadway address, thereby minimizing activity on

[2] Friday and Saturday peak hour traffic is identified as 8-10PM by NYS DOT annual averaged daily traffic counts.

Howard Street. The curb lane on Broadway is signed No Standing Anytime, which permits expeditious drop-off and pick-up of passengers, but does not permit waiting.

The 108 total cab/car service trips are assumed to carry an average of two patrons for a total of 216 person trips. It is anticipated that this number of vehicular arrival and drop-off trips at the premises, when considered over an hour, would result in an average of two cab arrivals every 33 seconds, and perhaps three or four per minute during the peak five-minute arrival window. This rate is well within the throughput capacity of the Broadway curbside frontage. The No Standing Anytime designation on the west side of Broadway, directly adjacent to the premises entrance, is a regulatory condition that enables continuous, high-frequency passenger drop-off and pick-up without vehicle queuing or lane blockage. Vehicles stop, discharge or load passengers, and immediately resume moving — a cycle that typically takes under 30 seconds for a practiced Traffic Network Company (TNC) or car service driver. At the observed peak-hour background traffic volumes on Broadway (approximately 870 vehicles per hour), the addition of 108 for-hire vehicle movements represents an incremental increase of approximately 12%, distributed across the full curbside frontage length and absorbed without material effect on through traffic flow.

Table 3: Forecast Peak Hour Patron Generation

Mode	Total Hourly Person Trips	Total Hourly Vehicle Trips
Private Auto	130	65*
Cab/Car Service	216	108
Subway	302	-
Walk Only	216	-
Total Trips	**864**	**173***

*Private auto trips would be to/from nearby public parking facilities.

As shown in **Table 3**, 518 pedestrian (subway and walk only trips) arrival/departures would occur, including people walking to or from local origin points, from transit, or nearby businesses. In addition, 65 private car trips are assumed to be generated, whose 130 occupants would walk from nearby parking facilities. As shown in **Figure 2** and **Table 1** above, ample off-street parking options are available within a five-minute walk.

During its busiest periods, a maximum of 100 to 120 staff would be on-site. This staff would primarily use the Center's entry on Howard Street. Most staff trips would be outside peak arrival and departure periods for patrons and therefore would not contribute to peak hour travel.

Truck movements for deliveries, carting, and event load-in and load-out would occur on Howard Street. Based on operational experience since November 2025, truck deliveries are accommodated curbside as permitted by parking regulations on Howard Street that allow for commercial parking only during business hours, Monday to Friday. For catered events hosted at the premises, advance notice of truck movements is obtained by management, to ensure that deliveries are processed efficiently with minimal impact on traffic.

Proposed Venue Traffic Operations Assessment

Vehicular and pedestrian traffic conditions at the premises were evaluated during the evening of Friday, February 13, 2026. Friday evening traffic would be affected by both work-related travel as well as weekend entertainment/socializing and therefore constitutes a worst-case period. Traffic was moderately busy during the expected peak operating period and flowed generally without delays. Traffic on Broadway making the right turn onto Canal Street was observed to queue during red lights, but was typically processed during the next green phase, without creating stationary gridlock. Vehicular traffic on Howard Street was observed to be light.

The Center can be expected to increase pedestrian traffic on Broadway and, to a lesser extent, on Howard Street, during arrival and departure hours. Given the available curbside and off-street parking resources proximate to the premises, private vehicular car travel is expected to have a minimal impact on parking resources in the area. While cab arrivals/departures may modestly increase during peak hours, no more than 108 for-hire car service vehicles are anticipated to be generated during these hours, and these would primarily use available curbside space on Broadway. The west side of Broadway, adjacent to the premises entrance, is signed as No Standing Anytime, a regulation which allows for the expeditious pick-up or drop-off of passengers. It should be noted that the 25% for-hire vehicle assumption is appropriate as a conservative baseline figure, but for certain events, particularly formal or holiday events during cold-weather months, where members arriving in evening attire are more likely to use car service regardless of transit proximity - actual for-hire utilization may trend as high as 30 to 35%. This reflects the demographics of the target membership: a 25–45-year-old culturally-engaged cohort with above-average income is less price-sensitive to TNC costs and more likely to prioritize convenience and comfort, especially in inclement weather. As a sensitivity check: even at 35% for-hire utilization (301 person trips, approximately 150 vehicle trips per hour), the Broadway curbside would experience an average of one-for-hire vehicle arrival or departure approximately every 24 seconds. This remains an operationally manageable frequency on a three-lane, high-volume arterial with a No Standing designation, and is consistent with curbside activity observed at comparable Manhattan venues during evening event periods. The 25% assumption used in this analysis is therefore conservative and the Broadway frontage has sufficient capacity to absorb higher-than-forecast for-hire volumes without material traffic impact.

Distribution of For-Hire Vehicle Activity Across Adjacent Frontages

Consistent with observed operational patterns at comparable Manhattan SLA-licensed venues and with the behavior of for-hire vehicle application platforms, a meaningful share of pickup and drop-off activity does not occur at the precise designated frontage of a venue. TNC and car-service drivers respond to loosely geofenced pickup points; vehicles frequently stop at the first available legal curb position along the approach corridor; and patrons use the application's real-time vehicle-location display and walk to their vehicle rather than the reverse. This behavior naturally distributes for-hire vehicle curbside demand across a broader corridor than the single block face abutting the venue entrance.

For the Broadway frontage serving 45 Howard Street / 427 Broadway, this distribution pattern is reinforced by three local conditions:

- The continuous No Standing Anytime designation along the west curb of Broadway between Canal Street and Howard Street permits expeditious passenger loading and unloading across the full two-block corridor, not only the block face at the Venue entrance;
- The adjacent Broadway curb between Howard Street and Grand Street is signed for 3-hour metered commercial parking weekdays and 2-hour metered parking weekday evenings and Saturdays, which permits passenger drop-off and pickup during the evening hours when the Center's private-club demand is concentrated;
- The short SoHo block lengths (typically 250 to 275 feet between intersections) allow patrons to walk one-half to one block to reach a vehicle staged on an adjacent frontage without material inconvenience.

Based on this pattern and consistent with practice observed at similar SLA-licensed cultural and membership establishments in SoHo, TriBeCa, and the surrounding Community Boards 1, 2, and 3, GZA anticipates that approximately 25 percent of for-hire vehicle pickups and drop-offs associated with the Venue will occur on adjacent Broadway frontages rather than at the immediate 427 Broadway curb. The primary adjacent zones are the Broadway west curb between Howard and Grand Streets (directly north of the Venue), the Broadway west curb between Canal and Howard Streets (directly south), and to a lesser extent the east side of Broadway within the same two-block window and adjacent side-street frontages along Crosby Street and Lispenard Street.

Applying this 25 percent distribution to the peak-hour forecasts yields the adjusted curbside activity rates shown in Table 4 below. At the primary 427 Broadway frontage, the arrival peak resolves to approximately one vehicle per 44 seconds, comfortably within the throughput capacity of the No Standing zone, with the remaining activity absorbed by the surrounding two-block Broadway corridor without concentration at any single point. This distributed pattern is operationally beneficial because it reduces concentration at the primary frontage by approximately 25 percent without requiring active management. The Venue's patron communications should direct rideshare and car-service pickups and drop-offs to the Broadway corridor as the primary designated zone while recognizing that vehicles may appropriately stage anywhere along the corridor within one block of the Venue. Under no circumstances should patrons or drivers be directed to Howard Street for pickup or drop-off, which would concentrate for-hire activity on the narrower (9.38-foot) Howard Street sidewalk adjacent to sensitive residential uses at 47 Howard Street.

Overall, the traffic generation associated with the Proposed SLA Spaces at 45 Howard Street is forecast to generate moderate volumes of traffic that would neither result in congestion nor overburden the curbside frontages. The Broadway curbside frontage has been demonstrated to accommodate the forecast for-hire vehicle volumes under the baseline scenario and retains meaningful reserve capacity for higher-utilization conditions associated with cold-weather or formal-attire events.

Queuing

During typical operations, the membership club on floors 4 and 5 would host small gatherings and performances, as well as offering its members various dining and lounge options. Such operation would not generate surges of traffic, and it is expected that there would be no sidewalk queuing. The catering

facility on the 2nd and 3rd floor would primarily host events during business hours. Any queuing associated with such events would happen before 6 PM. Measures to facilitate speedy admissions, such as pre-registration, contactless check-in via QR codes or pre-printed ID badges with bar codes, would be employed to eliminate or minimize any sidewalk queuing. For a typical catered event hosting up to 225 guests, with all arriving within the hour prior to the event, and a peak surge of 50% of guests arriving in a 15-minute period, a processing speed of 8 seconds per arriving guest would be required to avoid delays that could create a queue. This speed of processing is achievable using QR scan and badge printing at self-service kiosks (~7 to 10 seconds per guest). QR code scanning without badge printing can achieve a significantly higher throughput of one guest every 2 or 3 seconds.

A special catered event, with attendance of up to 864 people, could generate up to 432 arrivals during the peak 15-minute period at event start. With this level of traffic, some sidewalk queuing is anticipated. Queuing would be directed to Broadway. With a sidewalk width of 13.55 feet, a 10-foot-long queue could easily form while still providing adequate room for passing pedestrians. Security staff stationed on the sidewalk would communicate with staff in the building, and based on this communication could direct guests upstairs via either the Broadway or Howard Street entrances, based on real-time indoor capacity.

Departure Queuing Analysis

The arrival queuing analysis above addresses sidewalk queuing during the pre-event arrival window. Departure and pickup activity presents a different and typically more concentrated curbside demand profile and is analyzed separately below. At event close, observational data from comparable Manhattan membership and cultural venues indicates that approximately 60 to 75 percent of departing patrons exit the building within a 20-to-30-minute window following the formal end of programming. For an 864-person special event with the same 25 percent for-hire mode share used in the arrival analysis, this implies up to 162 person trips and 81 for-hire vehicle pickups concentrated in a post-event 30-minute window, with the balance of the 108 total peak-hour pickups occurring in the shoulder periods on either side of this window.

The resulting curbside activity rates — comparing arrival peak, unmitigated departure peak, and managed departure peak (with staggered-release protocols) — are summarized in Table 4 below.

Table 4: Comparative For-Hire Vehicle Curbside Activity Rates, Special Event Worst Case

Scenario	FHV Trips	Window	Corridor Average	Primary Frontage (75%)
Arrival — peak hour (pre-event)	108	60 min	**1 per 33 sec**	**1 per 44 sec**
Departure — unmitigated peak (post-event)	81	30 min	**1 per 22 sec**	**1 per 29 sec**
Departure — managed (staggered protocols)	64	30 min	**1 per 28 sec**	**1 per 38 sec**

The unmitigated peak departure rate of one vehicle per 22 seconds is approximately 50 percent higher than the peak arrival cadence on a per-minute basis. Two features of the site and operational model offset this elevated concentration: first, the Broadway No Standing Anytime designation enables continuous, non-queued pickup in the same manner that it enables continuous drop-off (typical pickup dwell times of 20 to 30 seconds mean that at the unmitigated cadence the Broadway curb holds at most one to two vehicles simultaneously); and second, the approximately 25 percent of pickup activity expected to occur on adjacent Broadway frontages further reduces concentration at any single point. The frontage-level activity rates after applying the 25 percent adjacent-frontage distribution are summarized in Table 5.

Table 5: For-Hire Vehicle Activity Distribution — Primary vs. Adjacent Frontages

Scenario	Total FHV Trips	Primary Frontage (75%)	Adjacent Frontages (25%)
Arrival peak hour	**108**	**81**	**27**
Departure peak 30 min (unmitigated)	**81**	**61**	**20**
Departure peak 30 min (managed)	**64**	**48**	**16**

Mitigation through staggered departure. Three operational mechanisms distribute departure demand across a longer window: (i) post-event bar service on the Fifth Floor that retains approximately 20 to 30 percent of attendees past the concentrated post-close peak; (ii) coat-check sequencing that releases coats in batches tied to floor or ticket number rather than on demand; and (iii) floor-by-floor release in which the MC announces the release order at event close (floors 2 and 3 first, floor 4 after approximately 10 minutes, floor 5 held as the continuation-bar floor). When applied in combination for a maximum-occupancy event, these mechanisms extend the effective departure window from the 30-minute unmitigated baseline to approximately 40 to 45 minutes and shift a meaningful share of demand outside the concentrated post-close peak. Under this managed-departure scenario, the effective peak 30-minute rate drops to approximately 64 pickups, or one vehicle per 28 seconds on average across the corridor and one vehicle per 38 seconds at the primary 427 Broadway frontage. This rate is within the range routinely observed at comparable Manhattan membership venues during post-event egress.

Finding. The Broadway frontage has sufficient curbside capacity to absorb both the arrival peak and the unmitigated departure peak of an 864-person special event without vehicle queuing or travel-lane obstruction, given the No Standing Anytime regulatory framework and the distribution of activity across adjacent frontages. With the staggered-departure protocols implemented under the Operations Management Plan in the following section, effective peak activity is comfortably within the operational range observed at comparable venues. For events expected to exceed 400 attendees, staggered-departure programming is treated as a required operational protocol rather than an optional practice.

Deliveries and Service

As with member and guest traffic, delivery and service traffic associated with the proposed licensed facility is expected to be comparable to neighborhood food and beverage operations.

Deliveries and trash pick-up would occur on Howard Street. Deliveries would match regular commercial delivery times in the mornings between 8AM and 2PM, during hours when curbside parking is available for commercial vehicles only. Trash removal service would be scheduled during hours that coordinate with services on the street to the greatest extent feasible to minimize garbage truck intrusion on the street.

Traffic and Patron Operations Management Plan

The forecasts in the preceding sections rely on assumptions about operational behavior: that for-hire vehicle drop-off and pickup are concentrated on Broadway, that arrivals are processed at QR-throughput cadence, that departure is staggered, and that staff manage curbside activity in real time. This section translates those assumptions into a concrete operational framework. The framework is tiered by anticipated concurrent occupancy, with specific staffing, entry, exit, and for-hire vehicle protocols for each tier. The Plan is intended to be adopted by the Venue's operator as standard operating procedure and to be made available to Community Board 2 on request.

Tiered Framework

The Plan operates on four tiers keyed to anticipated concurrent building-wide occupancy at peak. The tier is locked in at the time the event is booked, based on confirmed guest count. Table 6 summarizes the tier framework. The Plan recognizes the two separately licensed establishments within the building but treats them as a single integrated operation for curbside and sidewalk management purposes, because both draw on the same Broadway and Howard Street frontages.

Table 6: Operational Tiers Framework

Tier	Entry Protocol	Exit Protocol	FHV Management
Tier 1 **Private Club Baseline** **≤ 226 continuous**	Member access via 45 Howard entrance; no formal check-in; reception on duty.	Continuous, organic egress throughout evening; no queuing expected.	Broadway frontage for drop-off/pickup via standard TNC behavior; Howard Street not directed.
Tier 2 **Typical Catering Event** **≤ 225 attendees**	Pre-registration + QR/badge check-in at 8 sec/guest; 1 check-in station; 2 staff on Broadway sidewalk.	Event-managed close; organic egress; no staggered-release protocol needed.	Broadway-only directive in event confirmation; adjacent-frontage distribution expected.
Tier 3 **Large Catering Event** **226 – 400 attendees**	QR-only check-in at 2–3 sec/guest; 2 check-in stations; 3 sidewalk staff; Broadway queue if any.	Staggered release active: coat-check sequencing + post-event bar service (20–30 min window).	Broadway-only directive with explicit address; Pickup Coordinator role active during egress.

Tier	Entry Protocol	Exit Protocol	FHV Management
Tier 4 Special Event 401 – 864 (≤ 10 / year)	QR-only required; 4–6 stations; 5+ sidewalk staff; VIP/GA staggered 30 min.	Full staggered release required: floor-by-floor (2 → 3 → 4, 5 held); extended bar; coat-check batching.	Broadway-only with geofenced addresses; dedicated Pickup Coordinator; Howard Street Monitor deployed.

Roles and Responsibilities

Effective patron operations require clearly assigned roles. The following positions have defined responsibilities under this Plan:

- **Event Manager / General Manager.** Holds overall operational authority for any event at Tier 2 or above. Approves the event plan, briefs staff, and makes real-time escalation decisions. The Event Manager does not work a station; their job is to observe, direct, and decide.
- **Front-of-House Supervisor.** Manages reception, check-in stations, and interior flow. Communicates directly with the Pickup Coordinator and sidewalk staff via radio. Responsible for capacity-triggered communications (pausing arrivals if a floor reaches threshold).
- **Check-in Staff.** Operates QR or QR+badge check-in stations in the Broadway vestibule. Processes arriving guests at the tier-appropriate cadence.
- **Sidewalk Staff.** Positioned on the Broadway sidewalk. Directs arriving patrons to check-in stations, manages any queue, maintains pedestrian clear path, answers FHV driver questions. Radio-equipped.
- **Pickup Coordinator.** Tier 3 and Tier 4 only. Stationed on the Broadway sidewalk during the post-event egress window. Actively manages pickup flow: spots incoming vehicles, matches them to named patrons, directs staging to adjacent frontage when primary is occupied, maintains radio contact with front-of-house on release pace. Operational metric: zero double-parked vehicles, zero vehicles idling longer than 30 seconds at the primary curb.
- **Security Staff.** Positioned per the building security plan; supports the Event Manager on incident escalation.
- **Howard Street Monitor.** Tier 4 only. Positioned on Howard Street adjacent to the 427 Broadway secondary entrance. Redirects any patrons, TNC drivers, or delivery vehicles attempting to use Howard Street for pickup or drop-off, and maintains quiet at the secondary entrance in deference to 47 Howard Street residential uses.

Staffing Matrix

Table 7 specifies minimum staffing by role and tier. These figures are floors, not ceilings; the Event Manager may increase staffing for event-specific considerations.

Table 7: Staffing Matrix by Tier

Role	Tier 1	Tier 2	Tier 3	Tier 4
Event Manager / General Manager	On call	1	1	1
Front-of-House Supervisor	1 (reception)	1	1	2
Check-in Staff (Broadway vestibule)	—	1 (QR+badge)	2 (QR-only)	4–6 (QR-only)
Sidewalk Staff (Broadway)	—	2	3	5+
Pickup Coordinator	—	—	1 (post-event)	1 (full egress)
Security	Per daily schedule	1	2	3–4
Howard Street Monitor	—	—	—	1

Entry Operations

Pre-arrival preparation: All events Tier 2 and above begin with a staffing huddle at T−90 minutes. Stations are tested, radios confirmed, sidewalk zones marked, and the Event Manager briefs staff on the event-specific arrival curve, VIP windows, and accessibility requirements. Check-in manifests are loaded to QR-scan devices. The Pickup Coordinator (Tier 3/4) reviews expected close time and departure curve.

Arrival peak management: Sidewalk staff maintain a single-file processing line leading to the check-in vestibule. Check-in stations operate continuously at the tier-appropriate throughput (8 seconds per guest with badge printing for Tier 2; 2–3 seconds per guest QR-only for Tier 3 and Tier 4). Any queue that forms remains on the Broadway sidewalk; no queuing is permitted on Howard Street.

Capacity-triggered communications: The Front-of-House Supervisor maintains real-time awareness of occupancy by floor and communicates with sidewalk staff whenever a floor approaches 90 percent of its Plan occupancy. On reaching 95 percent, arrivals to that floor are paused and sidewalk staff direct incoming guests to alternate floors per the event plan or hold at the check-in station.

Exit Operations and Staggered Departure

Departure is the operational pinch point for Tier 3 and Tier 4 events. The three staggered-release mechanisms are as follows:

- **Post-event bar service.** The Fifth Floor bar remains open at reduced service for 20 to 30 minutes past formal event close. Retains 20 to 30 percent of attendees inside the building past the concentrated post-close peak, flattening the departure curve. Event host announces at formal close; bar staff remain in place.
- **Coat-check sequencing.** Coats released in batches tied to floor or ticket number rather than on demand. Prevents the lobby bottleneck at the moment of formal close and directly reduces concentration of patrons standing curbside waiting for their TNC.

- **Floor-by-floor release.** For structured events (galas, programmed dinners), the MC announces the release order at event close: floors 2 and 3 first, floor 4 after approximately 10 minutes, floor 5 held as the continuation-bar floor.

Pickup Coordinator operations: From T + close − 15 minutes through T + close + 60 minutes, the Pickup Coordinator is actively stationed on the Broadway sidewalk adjacent to the primary curb. Responsibilities: (i) greet arriving TNC and car-service vehicles; (ii) call out patron names to the sidewalk group when a vehicle arrives; (iii) direct vehicles that cannot load immediately to the adjacent Broadway frontage (north or south) and radio the patron to walk to the vehicle; (iv) prevent any vehicle from idling at the primary curb beyond 30 seconds; (v) maintain clear path on the sidewalk. The Pickup Coordinator carries a paper and digital log of arrivals and departures for post-event review.

Event Day Timeline

Table 8 sets out the canonical event day timeline for Tier 3 and Tier 4 events. Time markers are expressed relative to event start (T) and event close (T + close).

Table 8: Event Day Timeline — Tier 3 and Tier 4 Events

Time Marker	Phase	Key Actions (Tier 3 / Tier 4)
T − 90 min	Pre-arrival setup	Staff huddle; check-in stations tested; radios confirmed; sidewalk zones marked; Pickup Coordinator briefed on close time.
T − 60 min	Doors open (early)	Check-in active; sidewalk staff deployed; VIP arrival window begins (Tier 4).
T − 30 to T + 15	Arrival peak	Expected peak FHV cadence: ~1 vehicle per 33 sec corridor, ~1 per 44 sec primary curb. Capacity-triggered comms to reception if queue forms.
T + 15 to T + 60	Event programming	Transition to steady-state; sidewalk staff reduced; Pickup Coordinator on standby.
T + close − 15	Pre-close	Staff re-deployed for egress; coat-check staged; Pickup Coordinator active on Broadway; announcement of staggered release.
T + close	Formal event close	Begin floor-by-floor release (Tier 4): 2nd & 3rd first, 4th at +10 min, 5th bar open for continuation.
T + close to +30	Managed egress peak	Expected peak FHV cadence: ~1 per 22 sec unmitigated; ~1 per 28 sec managed. Pickup Coordinator directs vehicles.
T + close to +60	Tail egress	Fifth-floor bar closes; final patrons released; sidewalk staff stand down; incident log completed.

Time Marker	Phase	Key Actions (Tier 3 / Tier 4)
Post-event	Wrap	Event Manager completes observation record within 24 hours; Pickup Coordinator submits FHV activity notes; incidents escalated.

Member and Guest Communications

Communications to members and event guests are the primary mechanism for shaping arrival and departure behavior. The Plan specifies the following standard confirmation language:

Standard Confirmation Language (Tier 2 and above): *"Please use 427 Broadway (between Canal and Howard Streets) as the drop-off and pickup address for rideshare and car service. Our Broadway entrance is equipped for continuous passenger loading. We ask that you do not direct drivers to Howard Street, which is not configured for pickup and is adjacent to residential uses."*

Additional Language for Tier 4 Special Events: *"This event is expected to be well attended. To help us manage the departure flow and keep the Broadway frontage clear, we will be announcing a staggered release at event close. You are welcome to remain in the Fifth Floor lounge for an additional 20 to 30 minutes if you would like to continue the evening. Please plan your rideshare pickup for approximately [time range] rather than immediately at [event close time]."*

On-site signage at the coat check, elevator bank, and lobby displays the Broadway pickup directive in a consistent visual style. The Front-of-House Supervisor confirms signage placement during the T−90 minute staff huddle.

Monitoring and Community Board Liaison

The Plan provides for ongoing operational accountability through three mechanisms:

- **Incident log.** The Event Manager maintains a written log of any curbside, sidewalk, or noise incident. Incidents are classified as observed (no complaint filed) or reported (third-party complaint received). The log is reviewed at a monthly operations meeting.
- **Observation record.** For each Tier 3 and Tier 4 event, the Pickup Coordinator submits an observation record within 24 hours of close documenting: peak FHV cadence observed, any double-parking or Howard Street incidents, any patron-driver coordination issues, and any deviations from the Plan.
- **Community Board 2 liaison.** The Venue provides a semi-annual summary to Community Board 2, covering number of events held by tier, observed patron mode of arrival, any incidents or complaints received, and any adjustments made to the Plan. The summary is made available on request and is the accountability mechanism supporting the SLA license.

Escalation

- **Curbside overflow.** If the primary 427 Broadway curb becomes saturated with more than two vehicles simultaneously, the Pickup Coordinator directs incoming vehicles to the adjacent frontage (one block north or south) and radios the patron to walk to the vehicle. If saturation persists more than 5 minutes, the Event Manager is notified and may pause the release schedule on upper floors.
- **Noise incident.** If a noise concern is raised or observed by staff, the Event Manager documents the concern, visits the source floor, and adjusts sound system settings if applicable. The incident is logged and communicated to the acoustic consultant for review if repeated.
- **Medical or emergency.** Standard building emergency protocols apply; the Event Manager serves as incident commander and coordinates with 911. The Broadway frontage is cleared of FHV staging to allow emergency vehicle access.

Conclusions and Recommendations

Summary of the Traffic and Patron Operations Management Plan

The Operations Management Plan set out in the preceding section translates the analytical forecasts into concrete operational commitments that will govern the Venue's day-to-day and event-day activity. The key elements are summarized below.

- **Four operational tiers** keyed to concurrent occupancy (Tier 1: Private Club Baseline ≤ 226; Tier 2: Typical Catering ≤ 225; Tier 3: Large Catering 226–400; Tier 4: Special Event 401–864, limited to no more than 10 per year). The tier is determined at event booking and scales staffing, check-in protocols, and departure management accordingly.
- **Mandatory QR-only check-in** for Tier 3 and Tier 4 events (2–3 seconds per guest throughput), required to process the peak-15-minute arrival surge at the worst-case event without building a sidewalk queue.
- **Mandatory staggered-departure protocols** for Tier 3 and Tier 4 events — post-event bar service, coat-check sequencing, and floor-by-floor release — which extend the effective departure window and reduce peak FHV cadence from one vehicle per 22 seconds unmitigated to one vehicle per 28 seconds at the corridor level.
- **Dedicated Pickup Coordinator** role for Tier 3 and Tier 4 events, with defined metrics (zero double-parked vehicles, zero vehicles idling greater than 30 seconds at the primary curb) and active management of patron-vehicle matching and adjacent-frontage redirect.
- **Broadway-only directive** for all for-hire vehicle activity, reinforced through event confirmation language, on-site signage, and the Tier 4 Howard Street Monitor role. Patrons and drivers are not directed to Howard Street for pickup or drop-off under any circumstances.
- **Delivery and service operations** confined to the Howard Street commercial-vehicle window (8 AM – 2 PM) and scheduled outside event hours; event load-in completed two hours before doors

open; Tier 4 load-in completed by 4 PM on event day with no event-related delivery activity thereafter.

- **Semi-annual Community Board 2 reporting** covering event counts by tier, observed patron mode of arrival, incidents or complaints received, and any adjustments made to the Plan. This establishes the ongoing accountability mechanism supporting the SLA license.

With these measures in place, the forecasts developed in the preceding sections translate directly into operational practice. The balance of this section restates the overall traffic conclusions and identifies additional recommendations that complement the Plan.

Additional Recommendations

Broadway and Howard Street feature adequate sidewalks, available curbside space for drop-off and pick-up within direct proximity to the facility entrance and can process the traffic volumes the Center would generate. The key metric for assessing curbside impact is not the aggregate number of for-hire vehicle trips but the rate at which individual vehicles arrive, dwell, and depart. At the forecast level of 108 for-hire vehicle trips per hour; one vehicle approximately every 30 seconds on average - the Broadway No Standing Anytime zone functions as a continuous, self-clearing drop-off corridor. Individual vehicle dwell times for TNC and car service passengers in this context are typically 15 to 25 seconds, meaning that at any given moment the curbside holds at most one to two vehicles simultaneously, well within the available frontage.

To manage and minimize sidewalk queuing, it is recommended that catered events use contactless registration. Multiple staff should be deployed on the Broadway sidewalk, and inside the building, to manage the queue and direct visitors to available entrance locations.

The Center's programming profile, a private membership club oriented toward arts, culture, and literature is fundamentally different from a nightclub or general admission venue and is associated with a patron culture of orderly, coordinated arrival rather than spontaneous or mass congregation at the entrance. This distinction is material to the traffic assessment and should inform the Board's evaluation of comparable venues. Management would, as an operational standard, insist that drop-off vehicles or cabs are not permitted to idle in front of the site, and would instruct members to direct their rideshare and taxi drivers to the Center's Broadway frontage. Center staff would be available at entrance and exit times to ensure that patrons are quiet and respectful of the neighborhood.

As a private membership club, the Center for Emerging Culture would incorporate standards for directing car service drivers regarding pick-up and drop-off, and polite conduct when walking in the neighborhood, as requirements of continued membership in good standing.

To maximize the Center's locational advantages and ensure that patron traffic flows smoothly, the facility's operator should make efforts to provide members with timely information on parking, traffic conditions including construction and subway service changes, and phone numbers for local cab/limo companies. It is likely that the learned experience of management would inform their arrival and departure methods to minimize traffic related issues. For large planned events and in particular for holiday and winter events when for-hire vehicle utilization is expected to be elevated due to weather and formal

attire - the Center should communicate a designated Broadway vehicle arrival and departure point as part of all event confirmations, specifying that rideshare and car service pickups and drop-offs are directed to the Broadway frontage and not to Howard Street. Pre-event digital communications should include TNC drop-off instructions, suggested arrival time windows to stagger demand, and transit directions from Canal Street station. Staggered departure programming; for example, post-event receptions, bar service, or coat check sequencing that distribute egress over a 20-to-30-minute window will reduce peak curbside demand during the concentrated departure period and should be incorporated into event planning protocols as a standard operational practice.

The following protocols or practices are recommended

- Notify members of expected standards of conduct when arriving and departing from the Center, and that compliance with these standards is a requirement to maintain membership in good standing
- Center for Emerging Culture management would establish relationships with area garages to assure that parking is available within a short walk.
- During peak hours, staff will be deployed to provide active management of drop-off and pick-up traffic to assure that conflicts with buses, pedestrians, and vehicular travel lane movements are minimized.
- All queuing would take place on Broadway. Queues are actively managed by staff to maintain adequate room for passing pedestrians. Staff on the sidewalk communicate with reception staff to direct guests into the building as capacity becomes available.
- Center staff can assist with the smooth and quiet exit of members and guests at closing times, and direct them to the Center's Broadway exit.
- The Center's staff are aware of the location of taxi ranks, bus stops, subway stations and can advise members and guests accordingly.
- For all large, planned events, particularly those scheduled during cold-weather months (October through April) when for-hire vehicle utilization is expected to be elevated, event confirmation communications to members shall include explicit instructions directing rideshare and car service vehicles to the Broadway frontage for drop-off and pick-up, and expressly prohibiting use of Howard Street for vehicle staging.
- For events expected to draw 200 or more attendees, the Center will implement staggered departure programming - including post-event bar service, coat-check sequencing, or floor-by-floor release to distribute vehicle pick-up activity over a minimum 20-to-30-minute window, reducing peak curbside demand and preventing a concentrated surge of for-hire vehicle requests at event close.[3]

[3] **The three mechanisms mentioned, and how each works in practice:**
Post-event bar service is the simplest. Rather than the bar closing at the same moment the event formally ends, it stays open

- The Center should commit to periodic review of observed transportation patterns, including patron mode of arrival, any curbside incidents, and staff observations of vehicle behavior and provide a summary to the Community Board upon request. This transparency mechanism demonstrates ongoing operational accountability and provides a basis for adjusting management protocols as actual utilization data becomes available.

With these measures in place, we believe the Proposed SLA-licensed spaces associated with the Center for Emerging Culture can operate without substantial impact to the neighborhood or traffic network. The forecast of 108 for-hire vehicle movements per peak hour represents a manageable and well-precedented level of curbside activity on Broadway, a corridor that already accommodates nearly 900 vehicles per hour at peak. The No Standing Anytime designation provides the regulatory framework for efficient, continuous passenger loading and unloading without vehicle queuing or lane obstruction. The Center's membership model, programming character, and the operational protocols described above collectively ensure that vehicular activity will be managed, coordinated, and respectful of the surrounding neighborhood - including during higher-demand cold-weather events when for-hire utilization may exceed the baseline forecast. The Center for Emerging Culture represents a use that is consistent with and complementary to the cultural and commercial character of Manhattan Community District 2, and the traffic conditions it will generate are proportionate to that distinction.

for 20–30 minutes afterward at a reduced, casual level. Guests who want another drink or are in no rush stay - and those guests are statistically the ones who will walk to the subway or share a cab with someone.
Coat-check sequencing works by releasing coats in batches rather than opening the coat check to everyone simultaneously. A simple ticket number or floor-based system - floors 5 and 4 first, then 3 and 2 five minutes later - means the lobby and exit don't fill at once. It also prevents the bottleneck at the door that makes the curbside situation worse, because patrons tend to call their car when they have their coat in hand and are standing at the exit.
Floor-by-floor release is more formal and works best for large structured events where the Center has control of the programming. The host or MC announces at event close that "the Fifth Floor bar will remain open for those who'd like to continue, and we'll begin releasing floors starting with the Second Floor." This is standard practice at large corporate galas and award dinners and feels natural rather than managed to attendees.

If you have any questions, please do not hesitate to contact me at gene.bove@gza.com or (973-534-4090).

Very truly yours,

GZA GEOENVIRONMENTAL, INC.

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Associate Principal, Vice President

Attachments:

Limitations

LIMITATIONS

The analysis and conclusions presented in this report are subject to the following limitations:

1. Scope of analysis. This report is an SLA Traffic and Utilization Analysis prepared in support of the Venue's New York State Liquor Authority license application and Manhattan Community Board 2 review. It is not a City Environmental Quality Review (CEQR) traffic impact study, a NYC Department of Transportation curbside management study, or a Transportation Impact Assessment under the CEQR Technical Manual. The analytical depth, study area, intersection selection, and scenario testing reflect the standard of practice appropriate for SLA and Community Board review and should not be substituted for, or compared to, studies prepared under more intensive regulatory frameworks.

2. Basis of projections. Trip generation, mode split, for-hire vehicle cadence, and queuing forecasts rely on operational information provided by the Client (occupancy caps, programming types, event frequency, hours of operation) and on GZA's professional judgment informed by observations at comparable Manhattan membership and cultural venues. The forecasts represent reasonable worst-case estimates for the purposes of SLA review and are not operational minimums, guarantees, or ceilings.

3. Worst-case assumption. The 864-person special-event scenario assumes simultaneous full occupancy of all licensed spaces, one-hour arrival concentration, and 25 percent for-hire vehicle mode share (with sensitivity to 30–35 percent for cold-weather or formal events). These conditions are conservative for SLA/CB review purposes and are not expected to be representative of day-to-day operation. Special events are contractually limited to no more than ten per year.

4. Observation period. Field observations of traffic and curbside conditions were conducted during the evening of Friday, February 13, 2026 (8:00–10:00 PM peak window). Observations during a single period may not capture all possible operating conditions, including event-day conditions at nearby venues, construction-related detours, adverse weather, or major special events affecting the surrounding neighborhood.

5. Third-party data. Traffic volume data was derived from NYS Department of Transportation AADT records for the most recent year available (2025). Off-street parking capacity, hours, and pricing were compiled from current public operator information. These sources are assumed to be accurate as published; independent verification of real-time availability or operator status was not conducted.

6. Operations Management Plan dependency. The curbside cadence, queuing, and sidewalk conclusions in this report assume that the Traffic and Patron Operations Management Plan (Section 7) is adopted and operationally implemented by the Venue's operator. Material deviations from the Plan — including departure from the Broadway-only for-hire vehicle directive, staggered-departure protocols, QR-only check-in throughput for Tier 3 and Tier 4 events, or the tier-based staffing matrix — may produce different operational outcomes than those forecast herein.

7. Not a substitute for agency approvals. This report does not constitute, and should not be relied upon as, approval or permitting by the New York City Department of Transportation, the New York City Taxi and Limousine Commission, the New York City Department of City Planning, the Fire Department of New York, or any other regulatory agency. It is a professional analysis supporting the SLA license review process and Community Board 2 consultation; any operational change requiring agency permitting remains the responsibility of the Venue's operator.

8. Reliance and professional standard. This report has been prepared for the exclusive use of the Center for Emerging Culture, Inc. and its counsel in connection with the SLA license application and Community Board 2 review. Reliance by any other party is neither intended nor authorized without GZA's prior written consent. The services rendered have been performed in accordance with generally accepted planning and transportation engineering principles for analyses of this type; no warranty, express or implied, is made.

NYS SLA Acoustic Analysis

45 Howard Street

Manhattan Community District 2

PREPARED FOR:

Center for Emerging Culture
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1. OVERVIEW

GZA GeoEnvironmental (GZA) performed an acoustic investigation to evaluate the potential impact of noise generated by the proposed catering facility and private membership club at 45 Howard Street in New York, NY ("Venue"). The Venue is at the southeast corner of Howard Street and Broadway in the SoHo section of Manhattan Community District 2. The Project Site is shown in **Figure 1** below.

To evaluate the potential collective impact of music and patron generated noise on adjacent sensitive residential receptors, GZA has performed the following work:

1. Monitored existing noise levels outdoors at 8:30 – 9:00 PM at the street level and roof of 45 Howard Street. This period was determined to represent a conservative average background noise level from which to evaluate the potential impact of noise emissions from the Venue.
2. Evaluated the construction and insulation properties of the building's exterior walls and windows, both the existing construction (already acoustically upgraded with new window seals and gasketing) and a new high-performance window proposed for the Fifth Floor; Estimated the Sound Transmission Class (STC) for each façade based on the composition of the windows/exterior wall.
3. Estimated interior sound levels based on space usage and their increase over ambient levels at nearby noise sensitive receptors with reference to the type, location, and volume of music anticipated on each floor live acoustic music with amplified reinforcement on the 2nd and 3rd floors; live amplified music on the 4th and 5th floors; soft background music on the rooftop.
4. The number of people speaking simultaneously on each floor at worst-case occupancy;
5. A 3 dB safety margin built into all calculations to account for real-world conditions being less perfect than laboratory tests.
6. Compared results to NYC Noise Code.

Findings Summary

The question the analysis answers is whether the combined sound arriving at the windows of the nearest sensitive residential receptors exceeds the limits set by the New York City Noise Code or be perceptible to residents. Under every scenario tested; each floor individually at full capacity, and the entire building, predicted sound levels at neighboring residences remain within the NYC Noise Code limits and produce increases over existing background noise levels that are imperceptible to the human ear. The NYC Noise Code prohibits sound that is 7 dB(A) or more above background levels after 10 PM. The National Hearing Conservation Association classifies a 3 dB change as "barely perceptible" and a 5 dB change as "clearly noticeable." The venue's worst-case contribution across all floors combined is 0.6 dBA for overall levels is well below the threshold at which people would notice any change at all. For individual 1/3 octave bands, the highest change is 3.8 dB which is between a barely perceptible and clearly perceptible change for the whole building peak case. With outdoor queuing, the overall increase in sound level is predicted to be as much as 7 dB(A), which complies with New York City Noise Code provided that queuing does not occur after 10 PM. Recommendations are provided at the end of this report that assure GZA's compliance findings can be achieved.

1.1 Operations

The Center for Emerging Culture will provide its members and their guests with a variety of spaces for cultural events, socializing, formal and informal gatherings, and co-working. The proposed facility will operate under two separately issued State Liquor Authority (SLA) licenses: a catering establishment occupying the second and third floors, and a private members club occupying the fourth and fifth floors together with the rooftop, all within the building at 45 Howard Street a/k/a 427 Broadway. The individual spaces are described below.

Ground Floor: The primary entry to the venue is via 45 Howard Street, where patrons enter the Entry Lobby and access an elevator and staircase serving the second floor through the rooftop. A secondary entry point is provided via 427 Broadway, with a staircase to the second floor.

Second Floor (Catering Establishment): The second floor includes the Entry Vestibule, Event Space, and Service Pantry. The Event Space can be rented for private use. Under the worst-case scenario, acoustic live music with amplified reinforcement is possible in this space; otherwise, background music is played through in-house speakers. The maximum physical occupancy of this floor is 200 persons.

Third Floor (Catering Establishment): The third floor consists of a Reading Room, Listening Room, Coffee Bar, and Storage/Food Prep area. The Reading Room is a lounge and co-working space in which acoustic live music with amplified reinforcement is possible under the worst-case scenario; otherwise, background music is played through in-house speakers. The Listening Room houses a sound system and record player for patron use and does not face any exterior windows. The physical maximum occupancy of this floor is 261 persons.

Combined operational occupancy of the second- and third-floor catering establishment would be up to 225 persons during typical events, and up to 400 persons during Special Events (limited to no more than ten per year).

Fourth Floor (Private Members Club): The fourth floor includes four Meeting Rooms and a Commissary space with a bar. Under the worst-case scenario, live music is possible within the Large Conference Room; otherwise, background music is played through in-house speakers. The physical maximum occupancy of this floor is 238 persons.

Fifth Floor (Private Members Club): The fifth floor contains a Members Lounge, Bar, Entry Vestibule, and Kitchen. This floor is proposed to offer sit-down dining with live entertainment, which may include a live band or a DJ. The physical maximum occupancy of this floor is 200 persons.

Rooftop (Private Members Club): A terrace is located on the rooftop and is operated under the private members club license. Background music is anticipated for this space. The physical maximum occupancy is 26 persons, and the rooftop is proposed to close no later than 10:00 PM daily.

Combined operational occupancy of the fourth- and fifth-floor and rooftop private members club would be up to 226 persons during typical events, and up to 464 persons during Special Events (limited to no more than ten per year).

To represent the worst-case scenario, it is assumed that all spaces are occupied simultaneously. Building-wide occupancy would be up to 451 persons during typical operation and up to 864 persons during Special Events, which are limited to no more than ten per year across the entire facility.

Proposed Hours of Operation

Catering Establishment (2nd and 3rd Floors):

- **Regular operation:** 8:00 AM – 11:00 PM, Sunday through Thursday; 8:00 AM – 12:00 AM (midnight), Friday and Saturday.
- **Special Events:** 7:30 AM – 12:00 AM (midnight), Sunday through Thursday; 7:30 AM – 2:00 AM, Friday and Saturday.

Private Members Club – 4th and 5th Floors (regular operation and Special Events):

- 10:00 AM – 12:00 AM (midnight), Sunday and Monday.
- 9:00 AM – 12:00 AM (midnight), Tuesday through Thursday.
- 9:00 AM – 2:00 AM, Friday.
- 10:00 AM – 2:00 AM, Saturday.

Private Members Club – Rooftop (regular operation and Special Events):

- 12:00 PM (noon) – 10:00 PM, daily.

1.2 Site Context and Nearby Land Uses

The SoHo neighborhood in which the venue is proposed to operate features an eclectic mix of commercial, residential, institutional, and cultural land uses. This highly walkable neighborhood, shown in **Figures 1 and 2,** features an active commercial streetscape offering restaurants, boutique and destination retail, and commercial and professional office uses that is well served by mass transit and off-street parking.

An analysis of the nearest sensitive noise receivers was completed. **Figure 2** provides a map showing land use near the Venue. The buildings immediately adjacent to the Venue are multifamily residential directly to the west at 47 Howard Street, and commercial directly to the south at 425 Broadway. It was confirmed via active rental listings that 425 Broadway is functioning as a commercial building, and not as a residential building. Additional nearby residential or mixed-use buildings include 49 Howard Street, 50 Howard Street, 53 Howard Street, 12 Mercer Street/54 Howard Street, and 401 Broadway.

Figure 1 – Aerial View of 45 Howard Street and the Surrounding Area

Figure 2 – Land Uses Near 45 Howard Street

2. NEW YORK CITY NOISE CODE

The local noise code is set forth in Title 24, Chapter 2 of the New York City Administrative Code.

2.1 § 24-218 General Prohibitions

Section §24-218 addresses unreasonable noise that is not covered by another section of the code. The following sound levels are prohibited by this section:

- Non-impulsive sound measured at 7 dB(A) or more above the ambient sound level at the receiver between the hours of 10:00 P.M. and 7:00 A.M.
- Non-impulsive sound measured at 10 dB(A) or more above the ambient sound level at the receiver between the hours of 7:00 A.M. and 10:00 P.M.
- Impulsive sound measured at 15 dB(A) or more above the ambient sound level at the receiver.

2.2 § 24-231 Commercial Music

Section §24-231 addresses music originating from commercial establishments, when measured inside dwelling units. The following limits are provided in this section:

- 42 dB(A) overall sound level.
- 45 dB sound level in any one-third octave band from 65 hertz to 500 hertz.
- 6 dB(C) increase over ambient level, provided that ambient is in excess of 62 dB(C).

There is an accepted practical exemption to the NYC Noise Code that when ambient sound levels exceed the levels specified in the Code the new benchmark becomes the ambient level plus 4 dB.

Perceptibility of Ambient Changes

Another factor for consideration is the National Hearing Conservation Association's (NHCA) Loudness Comparison Chart. Their guidelines are as follows:

NHCA specifies in the figure for Perceptions of Increases in Decibel Levels overall increases that will or will not be noticeable to an average listener with regular hearing. In community noise perception, increases equal to or greater than "clearly noticeable change" will likely elicit community noise complaints, even if below other noise code guidelines shared above.

- Imperceptible Change - 1dB
- Barely Perceptible Change - 3dB
- Clearly Noticeable Change - 5dB
- About Twice as Loud - 10dB
- About Four Times as Loud - 20dB

3. ACOUSTIC ANALYSIS

The proposed catering establishment will occupy space in the second and third floors, and the private membership club will occupy space in the fourth, fifth, and rooftop spaces at 45 Howard Street. The main access to the premises is via a set of double doors on Howard Street. These doors would open into a lobby, which provides direct access to elevators. Our analysis assumes no queuing of patrons at entry. A secondary entrance on Broadway provides access, via a small vestibule, to stairs leading to the 2nd floor. The rooftop houses an exterior terrace which will have seating areas and background music.

As discussed previously, there are several residential or mixed use residential/commercial spaces near the Venue. However, the closest residential building at 47 Howard Street was utilized at the nearest receiver for the analysis performed. It was determined that if sound levels received at 47 Howard Street demonstrated compliance, then sound levels at additional nearby residences would also comply.

3.1 Ambient Sound Level Measurements

Measurements of the ambient airborne sound pressure levels were performed at the Venue on February 13, 2026 at 8:30 PM for a period of 20-minutes using a Casella Model 63X Type 1 Sound Level Meter with a Casella Model 251 Microphone. The analyzer automatically recorded statistical A-weighted and spectral sound level data. The system calibration was verified in the field before and after measurements using a Casella Model 251 acoustic calibrator. A windscreen was placed over the microphone for all measurements.

Data was collected at street level outside the Venue as well as at the Rooftop level. A summary of the relevant data collected can be found below in **Table 1**. A diagram showing the location of the measurements collected can be found in **Figure 3**, and pictures of the sound level meters can be found in **Figures 4** and **5.**

Table 1 – Summary of Octave Band Sound Level Data Collected

Description	Overall (dBA)	Overall (dBC)	63 Hz	125 Hz	250 Hz	500 Hz	1000 Hz	2000 Hz	4000 Hz	8000 Hz
Leq at Street	76.4	78.7	71.9	65.2	70.4	65.5	76.2	63.1	60.1	53.2
Leq at Rooftop	60.2	67.3	65.6	58.9	56.9	54.6	58.6	47.1	39.2	31.6
L10 at Street	69.4	76.5	75.1	67.8	65.1	66.5	65.6	61.6	55.4	50.4
L10 at Rooftop	58.2	68.8	68	60	58	56	54	48	39	36
L90 at Street	58.7	65.5	62.6	59.6	56.1	55.8	54.8	50.4	42.1	35.9
L90 at Rooftop	52.6	61.9	60	55	53	51	48	42	31	20

Note: All spectral sound levels are flat weighted, and all sound levels are dB re: 20µPa

The Leq represents the sound energy average over the period of measurement, while the L10 and L90 are statistical sound levels. The L90 represents the level exceeded for 90% of the time during the measurement period and the L10 is the level exceeded 10% of the time during the measurement period.

Although Leqs and L90s are often used to characterize background sound levels, the L90 no longer includes transient sources and is therefore more indicative of a worst-case scenario extending later into the night as sound levels are reduced further. Although readings at the roof were the lowest collected, there are inherent sound level reductions because the edge of the roof breaks the line of sight of the road. Therefore, it was determined that the L90 measured at the street would be the best descriptor of ambient sound levels for the nearby residences since their windows face the street.

Figure 3 – Ambient Measurement Locations

Figure 4 – Photo of Sound Level Meter at Rooftop

Figure 5 – Photo of Sound Level Meter at Street

3.2 Basis for Sound Generation

To determine compliance with the NYC Noise Code, each individual floor was evaluated in its anticipated worst-case scenario for occupancy and sound generated from music. Assumptions for occupancy and levels of music as a worst-case scenario for each individual floor can be found below in **Table 2**. Sound levels for people speaking were used per ANSI standards for vocal efforts ranging from Normal, Raised, Loud, and Shout.

Table 2 – Assumed Occupancy, Vocal Effort Levels, and Music Levels for Individual Floor Worst Case

Floor Description	Occupancy	People Speaking Simultaneously	ANSI Vocal Effort Level	Music Level (dBA)	Live or Background
Second Floor	200	140	Loud	80 @ 10 Feet from Source	Live
Third Floor	261	185	Loud	80 @ 10 Feet from Source	Live
Fourth Floor	238	167	Loud	85 @ 10 Feet from Source	Live
Fifth Floor	200	140	Loud	85 @ 10 Feet from Source	Live
Rooftop	26	18	Raised	67	Background

Note: Sound levels are dB re: 20µPa

The occupancy per floor in **Table 2** was identified by the Client via email as the maximum occupancy per DOB plans. It should be noted that the sound levels noted above for music were identified as possible worst-case scenarios based on the Client's intended utilization for the Venue. These are significantly higher than would be expected on a day-to-day basis for normal operation of the Venue. The sound levels utilized for analysis of sound levels would make it difficult for speech between patrons. As identified by the Client, it is important for the utilization of the Venue that patrons can converse and communicate with each other. In addition to individual floors, a separate analysis was completed for sound transmission from the entire building in an anticipated case where 225 patrons would occupy the catering establishment and 226 people could occupy the private club for a total of 451 people total in the building as defined by the Client. In this scenario, it is possible that music performances could simultaneously occur at multiple floors. For the purposes of this analysis, performances were assumed to be at all floors. A basis for calculation based on occupancy by floor can be found below in **Table 3.**

Table 3 – Assumed Occupancy, Vocal Effort Levels, and Music Levels for Maximum Regular Operation Worst-Case

Floor Description	Occupancy	People Speaking Simultaneously	ANSI Vocal Effort Level	Music Level (dBA)	Live or Background
Second Floor	100	70	Loud	80 @ 10 Feet from Source	Live
Third Floor	125	88	Loud	80 @ 10 Feet from Source	Live
Fourth Floor	50	35	Loud	80 @ 10 Feet from Source	Live
Fifth Floor	150	105	Loud	85 @ 10 Feet from Source	Live
Rooftop	26	18	Raised	67	Background

Note: Sound levels are dB re: 20µPa

In addition to the whole-building use case during regular operation, a whole-building use case during a special event was also analyzed. Assumed sources during special events were also analyzed. The sound sources for that analysis can be found below in **Table 4**.

Table 4 – Assumed Occupancy, Vocal Effort Levels, and Music Levels for Maximum Special Event Worst-Case

Floor Description	Occupancy	People Speaking Simultaneously	ANSI Vocal Effort Level	Music Level (dBA)	Live or Background
Second Floor	200	140	Loud	85 @ 10 Feet from Source	Live
Third Floor	200	140	Loud	80 @ 10 Feet from Source	Live
Fourth Floor	238	167	Loud	80 @ 10 Feet from Source	Live
Fifth Floor	200	140	Loud	85 @ 10 Feet from Source	Live
Rooftop	26	18	Raised	67	Background

Note: Sound levels are dB re: 20µPa

It is important to distinguish between live and background music levels as background music levels will be generated from speakers distributed throughout the building at as uniform a sound field as possible, while live sound levels will be generated from a single area, such as a band. These differences in propagation have been included in the analysis.

People speaking were to be evenly distributed throughout the floors in the calculations. **Figures 6-9** show the locations for live music included in the analysis for Floors 2, 3, 4, and 5**.** It should be noted that the floorplan for the Fifth Floor has been specifically designed to have back of house spaces and hallways near the 47 Howard Street, with live music locations as far away on the floorplan as possible.

Figure 6 – Modeled Location of Live Music at Floor 2

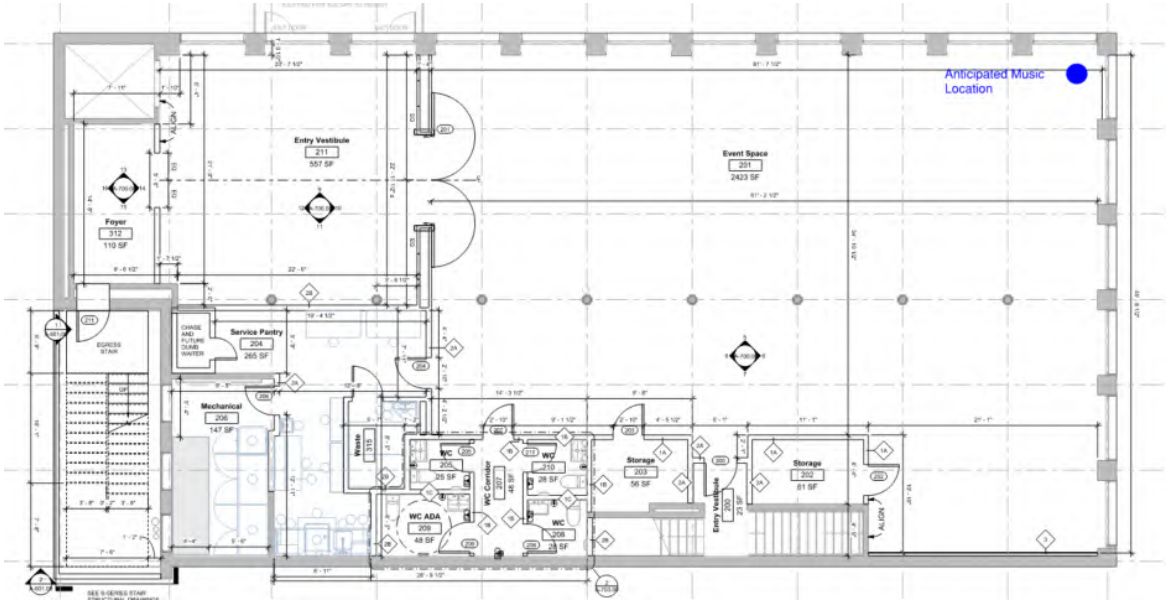


Figure 7 – Modeled Location of Live Music at Floor 3

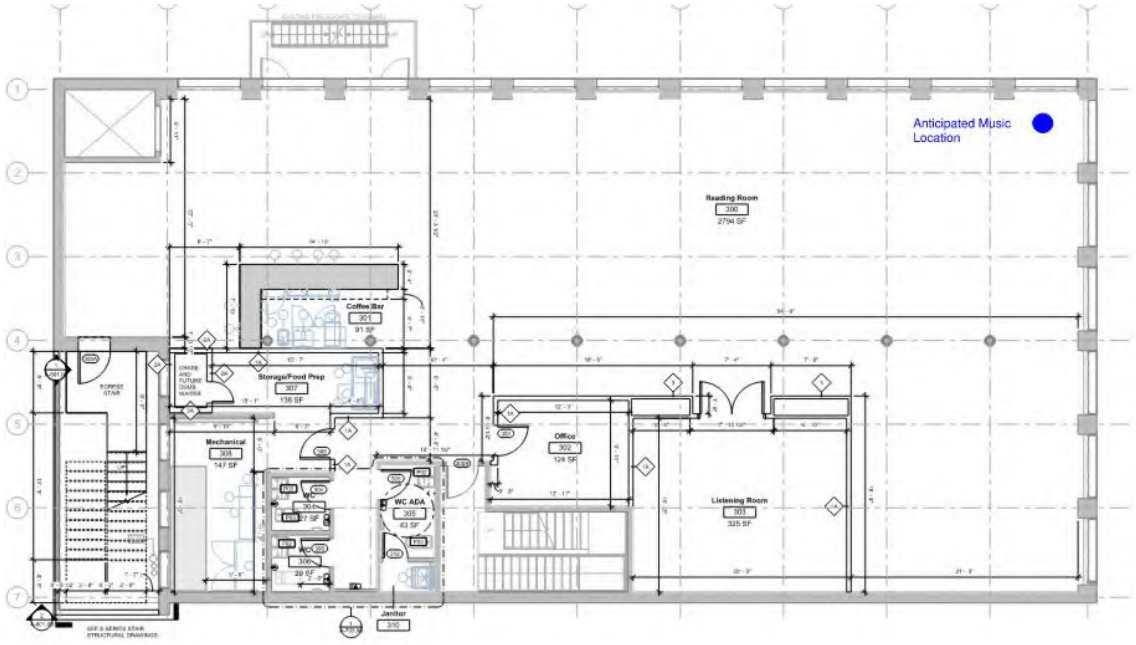


Figure 8 – Modeled Location of Live Music at Floor 4

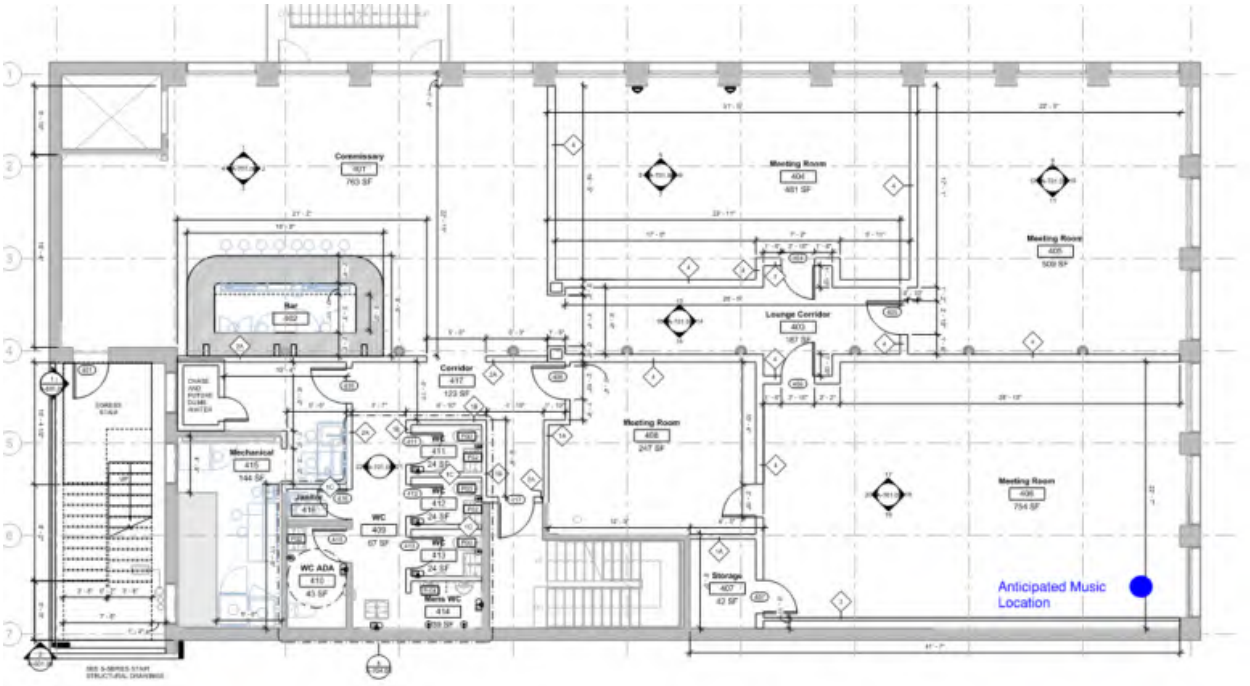
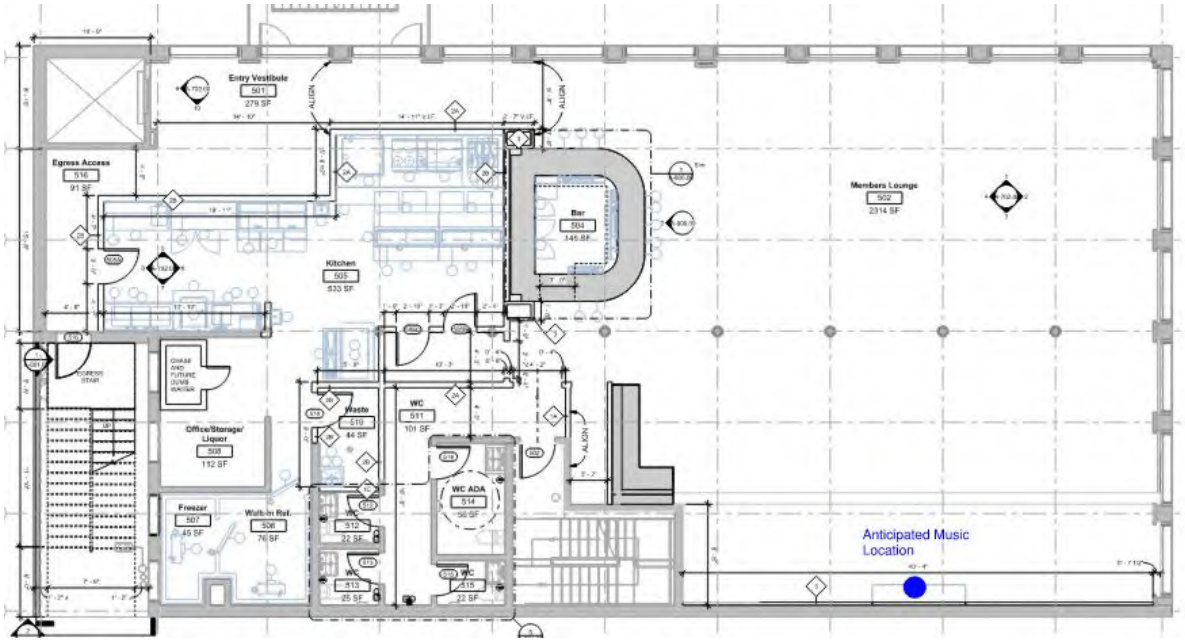


Figure 9 – Modeled Location of Live Music at Floor 5



3.3 Properties of Demising and Exterior Walls

To determine the acoustic properties of the exterior and demising walls, the transmission losses of the windows and walls were calculated using INSUL 9.0 acoustic modeling software and laboratory acoustic reports. With the transmission loss values calculated for all individual components, composite transmission loss values were calculated to characterize the entire façade based on the square footage for each of the building elements.

The Client provided GZA with details regarding the windows and exterior walls throughout the building. Details for the walls are consistent throughout the building. Details for windows vary by floor.

Demising Wall (STC 65)

- (2) Layers 5/8” G.W.B. with staggered and sealed seams
- 3-5/8” 20-Gauge Steel Studs Framed @ 16” O.C. attached to the brick facade
- R-13 (Typically 3”) Fiberglass or Mineral Wool Insulation
- 10” Thick Brick Non-Party Wall
- Assumed Minimum Exposed 4” Thick Brick at Neighboring Building

Since the 10” thick brick wall is a non-party wall, we can safely assume that the adjacent building has its own concrete/brick/CMU wall structure. The street view of the building also shows a stone structure, supporting the assumption of a masonry superstructure for the building. For the assumption of worst-case scenario, that wall is assumed to be fully in contact with the 10” thick brick wall and be exposed.

Exterior Wall (STC 63)

- (3) Layers 5/8” G.W.B. with staggered and sealed seams
- 3-5/8” 20-Gauge Steel Studs Framed @ 16” O.C. with no attachment to the cast iron facade
- R-19 (Typically 5”) Fiberglass or Mineral Wool Insulation
- Cast Iron Façade (Assumed minimum 1/2")

Window 1 (STC 45)

Window 1 was identified as a 1/2” IGU with an additional storm window to be installed 6-8” inside the 1/2" IGU. Typical composition for a 1/2” IGU is noted below.

- 1/8” Monolithic Glass
- 1/4” Airspace between panes
- 1/8” Monolithic Glass
- 6-8” Airspace
- 1/4” Laminated Glass

Window 2 (STC 45)

Window 2 was identified as a 1/8" Single Pane window with an additional storm window to be installed 6-8" inside the single pane of glass.

- 1/8" Monolithic Glass
- 6-8" Airspace
- 1/4" Laminated Glass

The client noted that gasketing and seal replacement has been completed at many of the windows at the Venue and will be done at all existing windows. Window 1 is used on the Second Floor, Window 2 is at the remainder of the floors.

The calculations performed assume that all constructions are airtight and follow common practice acoustic guidelines. These include, but are not limited to:

- Caulking and sealing all perimeters/seams of gypsum board with a non-hardening acoustic sealant
- Sealing all penetrations through the gypsum board with a non-hardening acoustic sealant
- Ensuring that no penetration is larger than 1/4"
- Sealing all outlets and light switches with acoustic treatment such as Pac International Putty Pads or an equivalent

An existing 7-foot-high barrier was also included in the analysis for the Rooftop. It is assumed that this barrier is airtight. If the barrier is not airtight, an acoustic barrier should be applied to the interior or exterior of the existing barrier. If needed, GZA can provide additional details on a barrier material depending on the final aesthetic design of the Rooftop.

In addition to the above, a high-pass audio filter was included for the Fourth Floor and Fifth Floor audio systems. Although this was included in the analysis as a basis of calculation, the final settings for a low-pass filter should be based on real-world measurements after the sound system has been installed and is being tuned by the Venue's AV Consultant. This is important because using audio controls after the construction has been completed means that only the necessary mitigation is implemented. For the basis of the analysis performed, this low-pass filter would be a gradual reduction of 3 dB per octave starting at the 200 Hz 1/3rd octave band.

3.4 Acoustic Modeling Results

Using the information noted above, predicted sound levels were calculated to within 3 feet of an open window at a neighboring residential unit. As discussed previously, the residential building used for the analysis is 47 Howard Street. For each individual floor evaluated as a source, the same floor is evaluated at 47 Howard Street. For example, if the 5th Floor of 45 Howard Street is evaluated, the 5th Floor of 47 Howard Street is also evaluated as the receiving location. For the evaluation of the entire building, the 5th Floor was used as the receiving location since the 5th Floor of 45 Howard Street is anticipated to have the highest sound levels from music and low frequency sound.

Per NYSDOT standards, a 10 dB reduction for outdoor to indoor sound levels was carried through the calculations for an open window. This 10 dB reduction was applied both to the ambient L90 sound levels

as well as the predicted sound levels from the Venue. A 3 dB safety factor was also included in the calculations. This factor includes standard allowances for differences between laboratory test results and field conditions. This safety factor was added directly into the sound from the Venue only.

Tables 5–11 show that the predicted indoor ambient sound levels at nearby residences already exceed the NYC Noise Code limits of 42 dBA and 45 dB in the 63–500 Hz one-third-octave bands, independent of the proposed venue. In such cases, the practical exemption of limiting project-related noise to no more than 4 dB above existing ambient levels is applied.

Table 5 – Calculated Sound Levels Received at 47 Howard Street for the Second Floor Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Sound Level at Façade (dB)	89.0	97.9	89.8	87.8	89.8	89.9	90.2	86.0	84.8	83.6	83.5	82.5
Expected Transmission Loss (dB)			17	21	27	31	34	36	38	40	41	43
Transmitted Level (dB)	28.1	49.6	48.5	42.5	38.5	34.6	31.9	25.7	22.5	19.3	18.2	15.2
Exterior Ambient (dB)	58.7	65.5	58	56	55	56	53	51	52	51	50	51
Predicted Interior Ambient (dB)	48.7	55.5	48	46	45	46	43	41	42	41	40	41
Interior Transmitted + Ambient (dB)	48.8	56.5	51.2	47.6	45.9	46.3	43.3	41.1	42.0	41.0	40.0	41.0
Increase Over Ambient (dB)	0.0	1.0	3.2	1.6	0.9	0.3	0.3	0.1	0.0	0.0	0.0	0.0

Note: Sound levels are dB re: 20µPa

Table 6 – Calculated Sound Levels Received at 47 Howard Street for the Third Floor Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Sound Level at Façade (dB)	86.3	90.5	70.7	70.9	72.5	74.9	80.2	80.3	80.9	82.2	82.1	80.7
Expected Transmission Loss (dB)			15	16	21	25	29	33	36	39	42	44
Transmitted Level (dB)	21.1	36.4	31.4	30.6	27.1	25.6	26.9	23.0	20.6	18.9	15.8	12.4
Exterior Ambient (dB)	58.7	65.5	58	56	55	56	53	51	52	51	50	51
Predicted Interior Ambient (dB)	48.7	55.5	48	46	45	46	43	41	42	41	40	41
Interior Transmitted + Ambient (dB)	48.7	55.6	48.1	46.1	45.1	46.0	43.1	41.1	42.0	41.0	40.0	41.0
Increase Over Ambient (dB)	0.0	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.0	0.0	0.0	0.0

Note: Sound levels are dB re: 20µPa

Table 7 – Calculated Sound Levels Received at 47 Howard Street for the Fourth Floor Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Sound Level at Façade (dB)	88.8	93.5	75.1	74.3	77.6	80.1	84.6	83.9	83.8	84.6	84.5	83.0
Expected Transmission Loss (dB)			17	18	23	27	31	35	38	41	44	46
High Pass Speaker Filter (dB)			6	5	4	3	2	1	0	0	0	0
Transmitted Level (dB)	27.1	42.7	38.2	36.4	34.7	33.2	33.7	29.0	26.1	23.7	20.6	17.1
Exterior Ambient (dB)	58.7	65.5	58	56	55	56	53	51	52	51	50	51
Predicted Interior Ambient (dB)	48.7	55.5	48	46	45	46	43	41	42	41	40	41
Interior Transmitted + Ambient (dB)	48.7	55.7	48.4	46.5	45.4	46.2	43.5	41.3	42.1	41.1	40.0	41.0
Increase Over Ambient (dB)	0.0	0.2	0.4	0.5	0.4	0.2	0.5	0.3	0.1	0.1	0.0	0.0

Note: Sound levels are dB re: 20µPa

Table 8 – Calculated Sound Levels Received at 47 Howard Street for the Fifth Floor Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Sound Level at Façade (dB)	84.5	93.4	85.0	86.0	85.0	85.0	84.1	82.1	79.7	79.8	80.3	79.6
Expected Transmission Loss (dB)			17	18	23	27	31	35	38	41	44	46
High Pass Speaker Filter (dB)			6	5	4	3	2	1	0	0	0	0
Transmitted Level (dB)	27.2	49.4	46.1	44.1	39.1	34.2	28.3	21.9	19.1	16.5	13.0	9.4
Exterior Ambient (dB)	58.7	65.5	58.0	56.0	55.0	56.0	53.0	51.0	52.0	51.0	50.0	51.0
Predicted Interior Ambient (dB)	48.7	55.5	48.0	46.0	45.0	46.0	43.0	41.0	42.0	41.0	40.0	41.0
Interior Transmitted + Ambient (dB)	48.8	56.5	50.2	48.2	46.0	46.3	43.1	41.1	42.0	41.0	40.0	41.0
Increase Over Ambient (dB)	0.0	1.0	2.2	2.2	1.0	0.3	0.1	0.1	0.0	0.0	0.0	0.0

Note: Sound levels are dB re: 20µPa

Table 9 – Calculated Sound Levels Received at 47 Howard Street for the Rooftop Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Sound Level at Rooftop Terrace (dB)	81.4	87.2	69.4	68.7	70.6	74.1	78.7	78.3	79.5	79.1	77.7	75.5
Barrier Insertion Loss (dB)			16.8	12.5	9.3	7.8	7.5	7.8	8.4	9.2	10.1	11.1
Transmitted Level (dB)	34.5	42.1	17.1	20.3	25.2	30.3	35.2	34.5	35.1	33.9	31.5	28.4
Exterior Ambient (dB)	58.7	65.5	58	56	55	56	53	51	52	51	50	51
Predicted Interior Ambient (dB)	48.7	55.5	48	46	45	46	43	41	42	41	40	41
Interior Transmitted + Ambient (dB)	48.9	55.7	48.0	46.0	45.0	46.1	43.7	41.9	42.8	41.8	40.6	41.2
Increase Over Ambient (dB)	0.2	0.2	0.0	0.0	0.0	0.1	0.7	0.9	0.8	0.8	0.6	0.2

Note: Sound levels are dB re: 20µPa

Table 10 – Calculated Sound Levels Received at 47 Howard Street for the Regular Operation Whole Building Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Transmitted Level (dB)	38.4	53.5	48.4	43.4	38.5	38.9	40.3	38.4	38.5	37.2	34.7	31.6
Exterior Ambient (dB)	58.7	65.5	58.0	56.0	55.0	56.0	53.0	51.0	52.0	51.0	50.0	51.0
Predicted Interior Ambient (dB)	48.7	55.5	48.0	46.0	45.0	46.0	43.0	41.0	42.0	41.0	40.0	41.0
Interior Transmitted + Ambient (dB)	49.1	57.6	51.2	47.9	45.9	46.8	44.9	42.9	43.6	42.5	41.1	41.5
Increase Over Ambient (dB)	0.4	2.1	3.2	1.9	0.9	0.8	1.9	1.9	1.6	1.5	1.1	0.5

Note: Sound levels are dB re: 20µPa

Table 11 – Calculated Sound Levels Received at 47 Howard Street for the Special Event Operation Whole Building Worst-Case Scenario at 45 Howard Street

Description	Overall (dBA)	Overall (dBC)	63 Hz	80 Hz	100 Hz	125 Hz	160 Hz	200 Hz	250 Hz	315 Hz	400 Hz	500 Hz
Total Transmitted Level (dB)	38.5	54.0	49.5	44.2	39.6	39.4	40.7	38.6	38.7	37.3	34.8	31.7
Exterior Ambient (dB)	58.7	65.5	58.0	56.0	55.0	56.0	53.0	51.0	52.0	51.0	50.0	51.0
Predicted Interior Ambient (dB)	48.7	55.5	48.0	46.0	45.0	46.0	43.0	41.0	42.0	41.0	40.0	41.0
Interior Transmitted + Ambient (dB)	49.1	57.8	51.8	48.2	46.1	46.9	45.0	43.0	43.7	42.5	41.1	41.5
Increase Over Ambient (dB)	0.4	2.3	3.8	2.2	1.1	0.9	2.0	2.0	1.7	1.5	1.1	0.5

Note: Sound levels are dB re: 20µPa

As shown in **Tables 5-11**, there are no increases in A-weighted sound levels greater than 1 dBA, and no increases in C-weighted sound levels greater than 3 dBC. Octave band sound levels are also either less than 45 dB or in cases where they are above 45 dB, do not raise ambient sound levels above ambient by more than 3.8 dB. Therefore, it is found that the proposed use would comply with the NYC Noise Code.

3.5 Queuing Analysis

Per the Client, outdoor queuing associated with the catering establishment is possible during special events while no outdoor queueing is expected for Private Members Club operations. Since the outdoor queuing would not have any music, the appropriate benchmark for evaluation would be the General Prohibitions in the NYC Noise Ordinance. The General Prohibitions note that sound levels cannot be raised by more than 10 dB(A) above ambient from 7:00 AM to 10:00 PM and 7 dB(A) from 10:00 PM to 7:00 AM. Given the hours of the Catering Establishment, it is assumed that no queuing would occur past 10:00 PM, meaning that sound levels cannot be raised by more than 10 dB(A). Alongside this acoustic report, GZA is also preparing a traffic analysis discussing recommendations for patron flow and expectations for traffic impact based on occupancy. The traffic analysis recommends that any queueing for the catering establishment occur on Broadway and that patrons enter on Broadway. If necessary, patrons could be brought over in small groups to the entrance on Howard Street.

Small groups talking while approaching the Howard Street entrance is anticipated to be the worst-case scenario for noise generation to the second floor at 47 Howard Street. It is assumed that 10 patrons would be brought over at a time. For the purposes of the analysis, GZA assumed that all 10 patrons could be speaking simultaneously at a Raised vocal effort level per ANSI Standards. The analysis also included all sound levels from inside 45 Howard as well for the worst-case scenario. Results of the analysis can be found below in **Table 12**.

Table 12 – Calculated Sound Levels as Received at the Second Floor of 47 Howard Street with Outdoor Queuing

Description	Ovr (dBA)
Total Transmitted from Inside Building dB(A)	39.8
Total Transmitted from Speech at Howard Street Entrance dB(A)	54.6
Interior Ambient dB(A)	48.7
Total Combined with Ambient dB(A)	55.7
Increase Over Ambient dB(A)	7.0

Note: Sound levels are dB re: 20µPa

As seen above, adding sound from outdoor queuing has the potential to increase sound levels by 7 dB(A). Provided that queuing does not occur past 10 PM, the activities are compliant with NYC Noise Code. However, this does represent more than a clearly perceptible increase per the NHCA Loudness Chart. Best efforts should be made by the Client to have only necessary patrons use the Howard Street entrance for the catering facility and that those patrons be urged to be respectful of nearby neighbors to reduce noise impact to the greatest extent possible.

4. RECOMMENDATIONS AND CONCLUSIONS

4.1 Recommendations

Although the proposed use is anticipated to comply with NYC Noise Code, it is recommended that best practices be followed to ensure the best results and minimize acoustic transfer. Recommendations include:

- Indoor speakers should be directed downward toward patrons so that sound can be absorbed by patrons and receive direct sound waves from the speaker system.
- Speakers should be evenly distributed throughout the rooms and as close to patrons as possible. Placing speakers closer to patrons will result in lower and more evenly distributed sound levels. Locating speakers in ceilings may help to facilitate this.
- Speakers at the rooftop terrace should be placed as low as possible and preferably against the seven-foot-high barrier. There are speaker options which can be placed into planters so that they are integrated into the landscaping plan. Placing the speakers low and near the barrier will maximize the efficacy of the barrier so that it functions as designed.
- Speakers should not be rigidly attached to any building structure. Rigidly attached speakers can result in additional sound transfer above and beyond the calculations in this document. Details regarding speaker attachment should be provided by the Client's AV consultant and submitted to GZA for approval.
- It is recommended that the Venue consider installing a volume limiter on the speaker systems installed. A volume limiter ensures that sound levels from the speakers cannot be higher than an amount specified by the AV consultant, providing the operator with a tool to control total sound level creation even if they are not on site.
- For the Fifth Floor, it is recommended that a volume limiter and high-pass filter be installed on any speakers to be used, including the in-house speaker system. If any PA speakers will be used in conjunction with a live band or DJ performance, those speakers should be owned by the Venue so that the high-pass filter and limiter can be applied to those speakers as well. The limiter and high-pass filter settings should be set by the AV Consultant after construction has been completed so that it can be ensured that sound from the speakers meet NYC Noise Code.
- If any demising walls have not yet been constructed, they should be installed with no rigid connection to the 10" brick wall to improve the acoustic efficacy of the wall.
- As noted in **Section 3,** all construction must be airtight with penetrations and outlets and light switches acoustically treated.
- During queuing for the catering establishment, queuing should occur on Broadway and patrons only brought over to Howard Street if necessary to minimize impact to lower floors at 47 Howard Street. Queuing should stop by 9:30-9:45 PM so that it is compliant with the General Prohibitions section of the NYC Noise Code.

It is the responsibility of the Client to ensure that all construction is performed to specification and that activities are monitored to ensure that the Venue remains in compliance with NYC Noise Code.

4.2 Conclusion

The results of the acoustic measurements and simulation of potential noise generation associated with the proposed membership club indicated that even under worst case noise generation assumptions, the sound generated from the he sound generated from the sound generated from the proposed catering establishment and private members club would not result in exceedance of the New York City Noise Code at residential dwelling units near the Project Site. The evaluation of potential noise impact was developed on a worst-case basis to assess potential impact, i.e. the combination of the lowest outdoor ambient noise monitored and the consideration of continuous noise levels at maximum occupancy of the proposed establishment.

If you have any questions, please do not hesitate to contact me at sean.harkin@gza.com or (631-847-1607).

Very truly yours,

GZA GEOENVIRONMENTAL, INC.

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Attachments:
Limitations

USE OF REPORT

1. GZA GeoEnvironmental, Inc. (GZA) has prepared this report on behalf of, and for the exclusive use of Client for the stated purpose(s) and location(s) identified in the Report. Use of this report, in whole or in part, at other locations, or for other purposes, may lead to inappropriate conclusions; and we do not accept any responsibility for the consequences of such use(s). Further, reliance by any party not identified in the agreement, for any use, without our prior written permission, shall be at that party's sole risk, and without any liability to GZA.

STANDARD OF CARE

2. The conclusions presented in this report were based solely upon the services described in this report, and not on scientific tasks or procedures beyond the scope of described services or the time and budgetary constraints imposed by Client. Conditions at the facility are subject to change, therefore the compliance status at any given time could differ from the status at the time of ourreport.

3. This report describes the compliance status with respect to the environmental regulatory program(s) outlined in the report. Compliance with regulatory programs or specific regulatory requirements other than the program(s) outlined in this report have not been evaluated.

4. Information pertaining to the facility, structures, and operations and activities conducted at the facility was provided to GZA by Client as indicated within the report. In performing the services described oin the report, GZA has relied on the information provided by Client, including the accuracy and completeness thereof.

5. The purpose of this study was to review the regulatory compliance of current operations and activities conducted at the facility within the limits of the objective and scope of work described in our proposal and/or report. We did not attempt to assess the compliance status of present or past owners or operators of the facility.

6. Unless otherwise specified in the report, GZA did not perform testing or analyses to determine the presence or concentration of any chemicals, oils, asbestos, or polychlorinated biphenyls at the site, within site buildings, or in the environment at the site. Where such analyses have been conducted by an outside laboratory, GZA has relied upon the data provided, and has not conducted an independent evaluation of the reliability of these data.

COMPLIANCE WITH CODES AND REGULATIONS

7. The regulatory compliance status described in this report has been evaluated based on our interpretation of regulations, and where appropriate, the interpretations provided by the applicable regulatory authority personnel at the time of our study. In some cases, these interpretations require subjective judgment and we cannot guarantee that all applicable regulatory authority personnel will interpret the regulations in the same manner as we have, or in the manner that the agency personnel we may have spoken to have. Applicable regulatory authorities' interpretations, requirements, and enforcement policies vary from district office to district office, from state to state, and between federal and state agencies. In addition, statues, rules, standards, and regulations may be legislatively changed and inter-agency and intra-agency policies may be changed from present practices from time to time.

8. In preparing this report, GZA has relied on certain information provided by federal, State, or local applicable regulatory authorities and other parties referenced herein, and on information contained in the files of federal, State, and/or local applicable regulatory authorities available to GZA at the time of our compliance study. Although there may have been some degree of overlap in the information provided by these various sources, GZA did not attempt to independently verify the accuracy or completeness of all information reviewed or received during the course of the study. Where information provided by Client was not complete, representations regarding the regulatory compliance of such operations and activities has not been made.

INTERPRETATION OF DATA

9. GZA's work was performed in accordance with generally accepted practices of other consultants undertaking similar studies at the same time and in the same geographical area, and GZA observed that degree of care and skill generally exercised by other consultants under similar circumstances and conditions. GZA's findings and conclusions must be considered not as scientific certainties, but rather as our professional opinion concerning the significance of the limited data gathered during the course of the study. No warranty, express or implied, is made. Specifically, GZA does not and cannot represent that the Site contains no hazardous material, oil, or other latent condition beyond that observed by GZA during its study. Additionally, GZA makes no warranty that any response action or recommended action will achieve all of its objectives or that the findings of this study will be upheld by an applicable regulatory authority.

NEW INFORMATION

10. In the event that the Client or others authorized to use this report obtain information on environmental regulatory compliance issues at the facility not contained in this report, such information shall be brought to GZA's attention forthwith. GZA will evaluate such information and, on the basis of this study, may modify the conclusions stated in this report.