

50-52 Commonwealth Avenue

21.0067 BB

Introductions

- **Asma Rashid, MD MPH:** Applicant and owner of the unit; resident and small business owner in the Back Bay for over decade.
- **J. Michael Sullivan, A.I.A., LEED AP:** Architect; Principal, BEACON ARCHITECTURAL ASSOCIATES 145 South Street, Boston, MA 02111

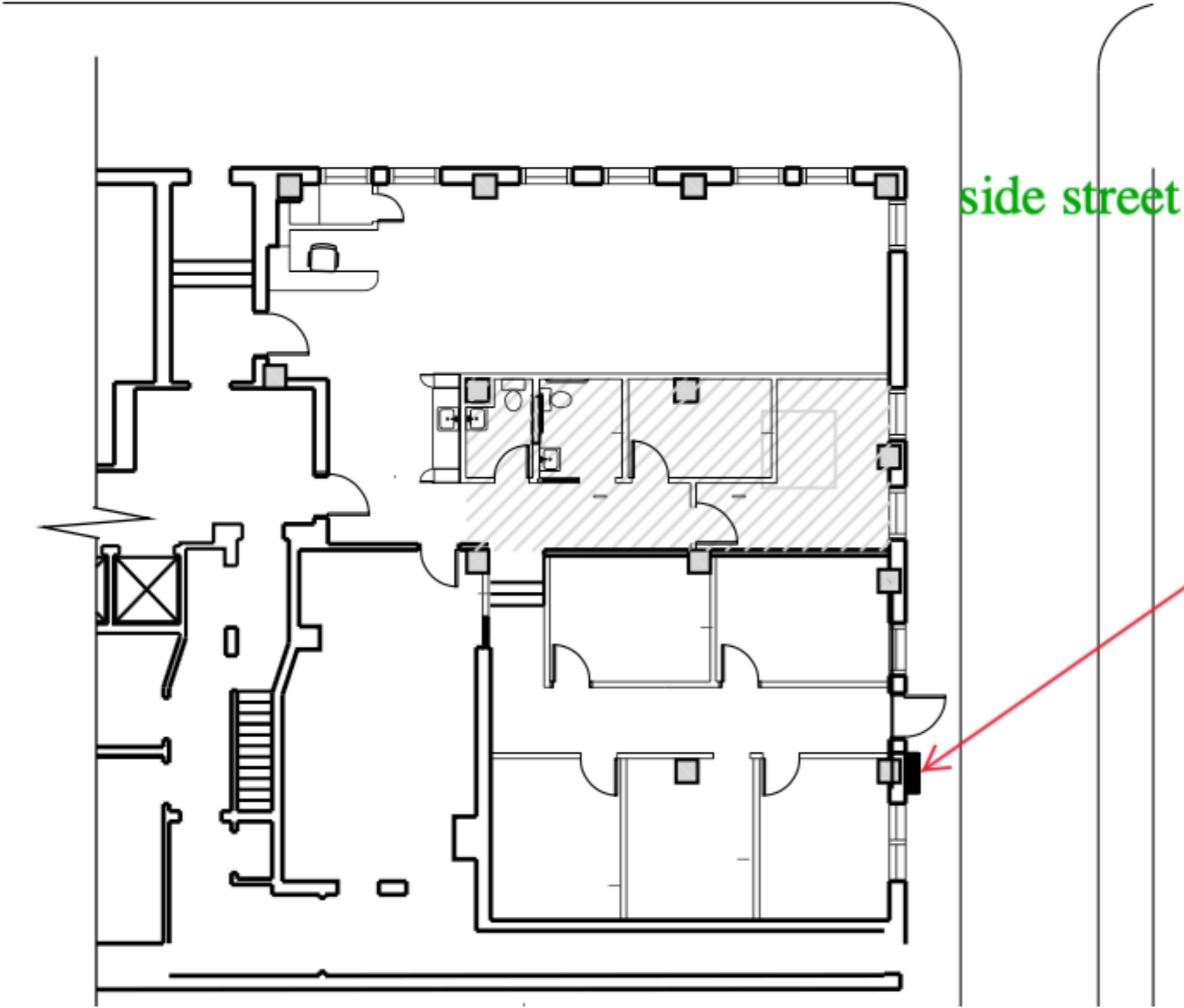
Proposed Work:

At rear elevation attach air-conditioning condenser to rear wall.

- Proposing to install a heat-non-portable air conditioning (HVAC) outdoor unit on side of building facing Public Alley 436.
- Air conditioning unit will be placed on a bracket, safely secured to the building side wall. The HVAC outdoor units have depth ranging from 13-14 inches e.g dimensions of one of such HVAC outdoor unit currently available in the market, Mitsubishi MXZ-3C30NAHZ2-U1 are following: Length 41.0 Inches (In) Depth 13.0 Inches (In) Height 48.0 Inches (In) (Kindly note the exact model will depend upon availability of unit in the market at the time of placement upon approval of this application).
- Per manufacture installation manual, above unit should be placed 3 inches away from the wall for proper air ventilation. Brackets used to secure the unit will only come 2-3 inches from outer edge of the unit. Unit will be tightly secured to brackets with bolts so it does not fall during any earthquake or gust.

Visualization of Proposed Work

Berkeley Street



Wall Mounted
HVAC Unit



Proposed HVAC Unit



Photo of building above proposed HVAC unit location



photo of building towards Berkeley Street

Existing Conditions

- Currently there is no adequate alternate cooling system or better heating option
- Location + Zone: 1 of 2 Commercial units on ground level in a 9-story residential condominium building/Residential zone
- Floor plan: 7 offices, waiting area, and conference room
- Purpose and Utilization of unit: Group mental health practice, closed door sessions
 - Up to 7 clinicians in 7 offices + clients
 - Up to 2 administrative staff
 - Individuals in waiting area

Suggested Options + Challenges

Condenser on rooftop

Ground unit in a 9 story building; condenser will not work and condo association does not allow

Window units

4 of 7 offices have no windows; requires open doors to cool all spaces, cannot because of nature of our services

Duct air conditioning

Requires dedicated physical space indoor; sound travel compromises privacy and confidentiality; multiple vents in the wall

Central Air

No central air in building

Evaporating units

Not advised for use in northeast due to increased humidity. Possibility of becoming a threat to public health.

- An evaporative cooler is a common place for mosquito breeding.
- Mold and bacteria may be dispersed into interior air from improperly maintained or defective systems, causing sick building syndrome and adverse effects for asthma and allergy sufferers.

50 Commonwealth Ave. Building



Board of Trustees Letter

50 COMMONWEALTH TRUST

Board of Trustees

50 Commonwealth Ave.
Boston, MA 02116

June 11, 2019

To whom it may concern,

In reference to the CERTIFICATE of APPROPRIATENESS-or-DESIGN APPROVAL-or-EXEMPTION application submitted by Ms. Rashid, owner of Suite 2 at 50 Commonwealth Ave, the Board of Trustees finds no reason to oppose the application, insofar as the proposal does not infringe on Common Area or the general integrity of the building. The Board is confident the Bylaws and Rules and Regulations provide sufficient protection to ensure final HVAC unit placement and specification, noise considerations, etc. will not compromise the integrity and well-being of the building and its residents.

As to the option of placing a private, single-unit HVAC system on the roof deck, the Board of Trustees respectfully declines the request. To do so would establish a precedent allowing all unit owners the same privilege, resulting in the possibility of 42 individual HVAC units, a degree of scale that is simply not feasible in the space provided for both the compressors on the roof deck and for the infrastructure (piping, etc.) required to feed the air to the various units.

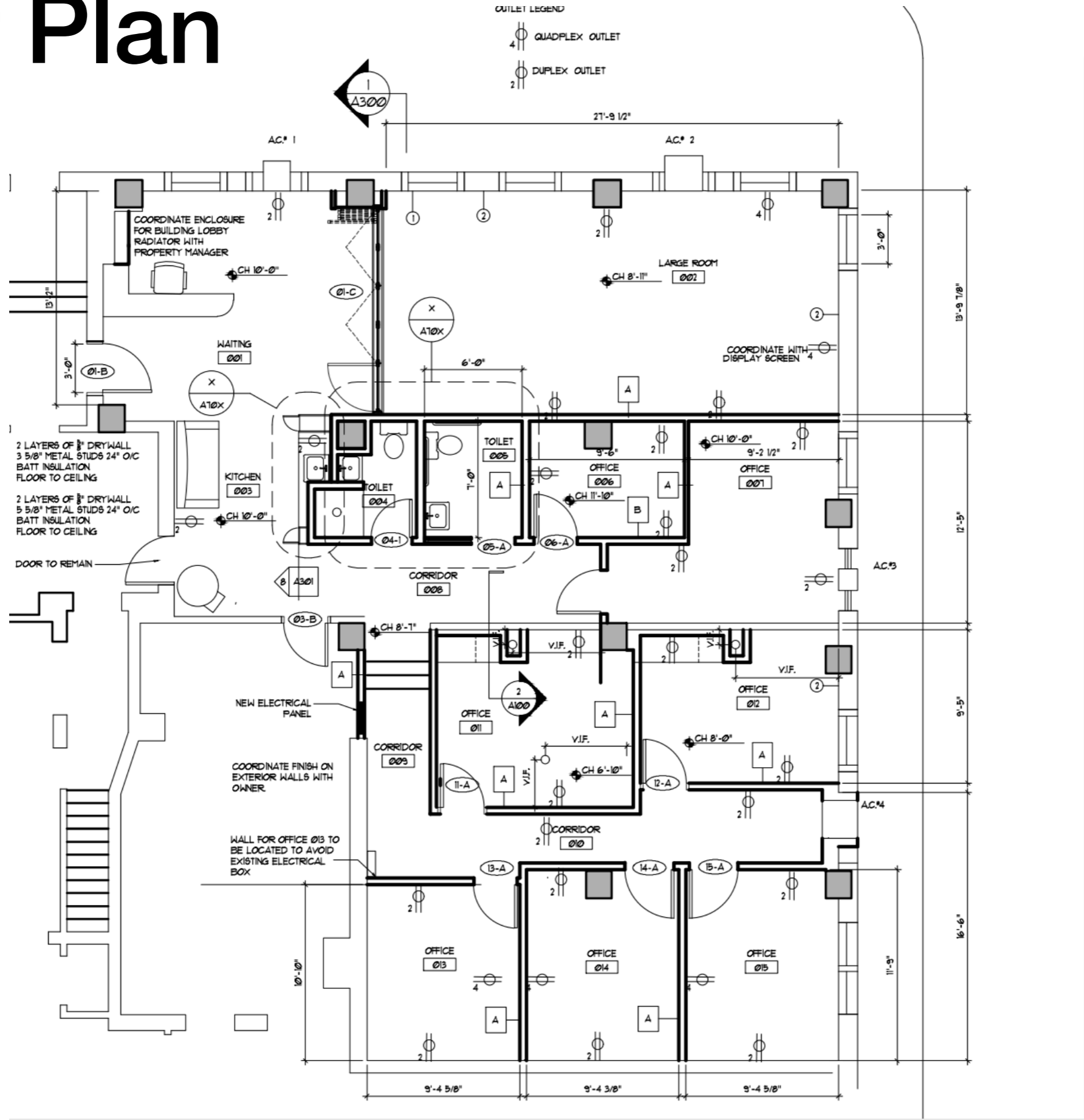
Thank you for your consideration in this matter.



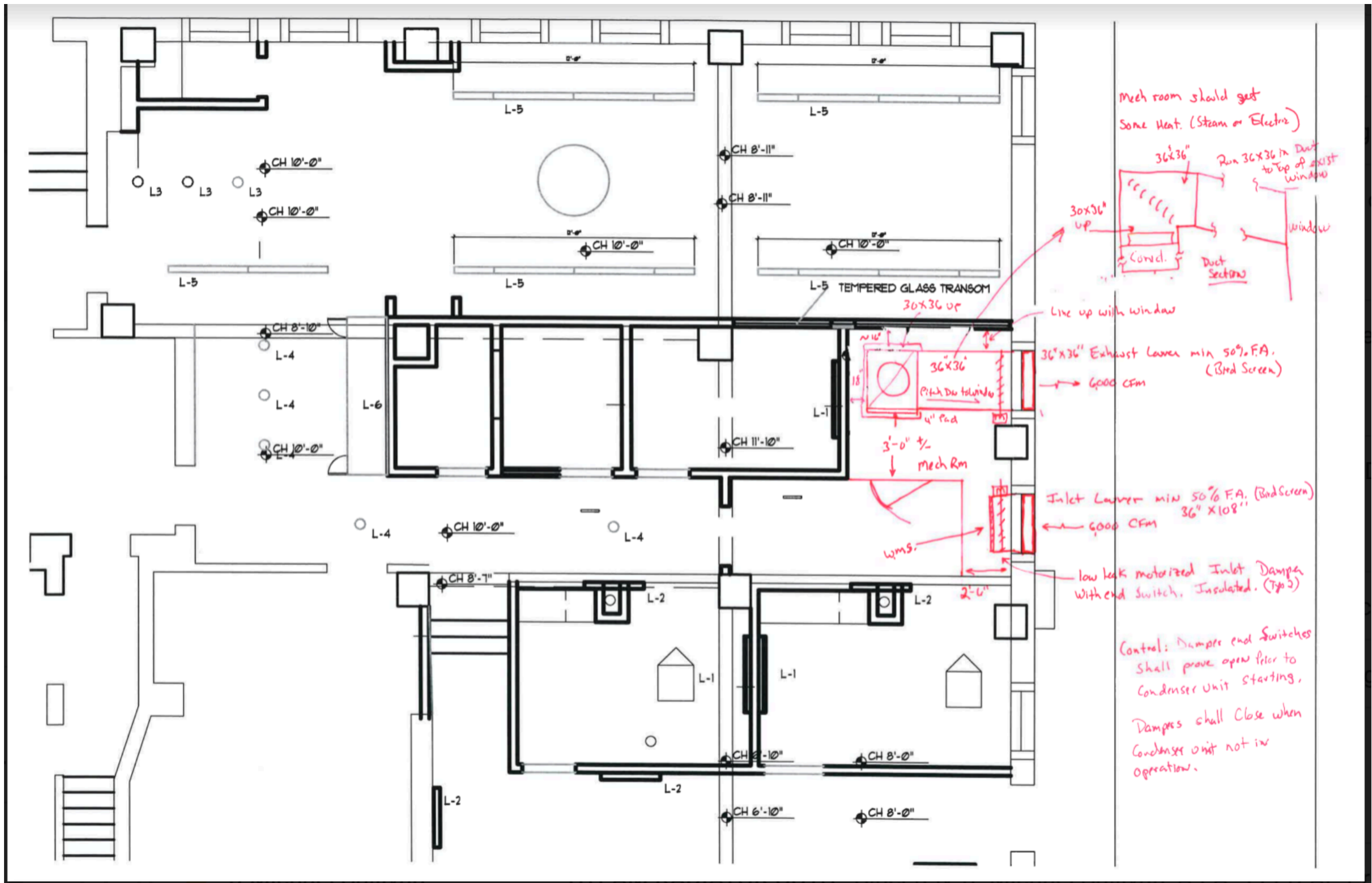
Signed by: Andrew McKay

On behalf of the Board of Trustees
50 Commonwealth Trust

Floor Plan



Duct air conditioning for unit



Evaporative Coolers



Do I live in the right climate for an Evaporative Cooler?

Zone A

Ideal for Evaporative Coolers

Zone B

Less than ideal, but optional

Zone C

Portable or Window Air Conditioners

Note: This is a general guide for using evaporative coolers inside. They're commonly used outdoors across the US.

Summary

- Commercial office space has different needs than residential
- Ductless mini split unit will provide a year round energy efficient and environmentally sound heating and cooling system through:
 - Temperature control (cooling and heating)
 - Humidity control throughout year

Thank you!