

12 Stephen Mews, W1T 1AH

Planning and Conservation area Consent Installation of Comfort Cooling

Dear Sir/Madam at Camden Borough Council,

Neat have been appointed on behalf of Moresand Ltd. to submit a planning application for the installation of a comfort cooling system at 12 Stephen Mews, a four-storey 1950s brick warehouse currently being reconfigured, refurbished, and extended under the approved planning application no. 2024/2451/P.

12 Stephen Mews is situated within the boundary of the Charlotte Street Conservation Area and is therefore subject to its guidelines. As a result, only minimal alterations are being proposed to the existing facades to preserve the area's historic character. The majority of alterations related to the cooling strategy at 12 Stephen Mews will be implemented internally and on the roof, ensuring that they remain hidden from street-level view.

This statement has been prepared in support of proposals for replacement and new plant at 12 Stephen Mews. This statement has been prepared with input from consultants and specialists who are providing services advice on the project. Camden Council's 'Planning Guidance – Energy efficiency and adaptation' report is referenced throughout.

Cooling Hierarchy – Design Principles

The following is a summary of the passive design features applied to the existing building, with the aim to minimise the need for cooling.

- Secondary Glazing is being introduced into the existing building, the secondary glazing is openable allowing natural ventilation for cooling during warm but not hot weather. During hot weather the cavity formed between the secondary glazing and existing glazing will act as a buffer to thermal gains, and during cold weather will act as an additional insulation. (See Camden Planning Guidance – Energy Efficiency and Adaptation, 3.7 Natural Cooling).
- Existing high ceilings are proposed to be left untouched, to promote natural ventilation. (See Camden Planning Guidance – Energy Efficiency and Adaptation, 10.7 Cooling Hierarchy, Point 1).
- The existing concrete soffit to each floor is to be left exposed (no suspended ceiling is to be installed), providing exposed thermal mass which will help slow the rise of internal temperatures during the summer months.
- LED lighting and energy efficient services have been specified throughout the building, reducing the internal heat gains within the spaces. (See Camden Planning Guidance – Energy Efficiency and Adaptation, 8.18 Generating Energy).
- The inefficient existing 10 x Comfort Cooling Units and connected 6 x Condenser Units are to be removed.

These measures will significantly enhance energy efficiency without altering the building's external appearance, aligning with conservation guidelines that prohibit external shading and facade material changes. (See Charlotte Street Conservation Area Appraisal and Management Plan, 2008).

The following is a summary of the design features proposed for the Fourth Floor Extension, which aim to minimise the need for cooling.

- Excessive glazing was omitted from the designs, before the approval of planning app no. 2024/2451/P, reducing solar thermal gains. All proposed new glazing to the additional floor is double glazed, with opening external doors on both north and south sides of extension. (See Camden Planning Guidance – Energy Efficiency and Adaptation, 10.7 Cooling Hierarchy, Point 2).

- U-Values suggested by Camden Council have not only been met but exceeded. (See *Camden Planning Guidance – Energy Efficiency and Adaptation*, 8.8 Insulation).
- External insulated render is proposed to be used on the façade of the extension, and the colour of the render, once approved by Camden Planning Authority will [James can you check this is a condition (I think it is) and also if it is please can we look at getting some samples of colours from Greg so that we can discharge this condition) also improve thermal performance during warmer months. (See *Camden Planning Guidance – Energy Efficiency and Adaptation*, 10.7 Cooling Hierarchy, Point 2).

In order to maintain adequate comfort levels, acoustics and indoor air quality, and improve energy efficiency the existing condensers are proposed to be replaced. The number of condensers required is proposed to reduce from 6 units to 4 units. No additional capacity is proposed as the design proposed design meets all of the new building owner and occupier's needs. The new units specified will be significantly more energy efficient and quieter than the existing units.

Conclusion

The applicant recognises that office environments generate heat primarily from computers and occupants, and whilst substantial steps have been taken to reduce the cooling demand, complete elimination is not feasible given the nature of office use, the inherent thermal performance of the existing building and the restrictions imposed by the requirements of the conservation area. Therefore, we propose to replace the existing air conditioning and roof-mounted condenser units with a modern, more efficient system. This upgrade will ensure enhanced energy efficiency and reduced environmental impact, ensuring comfort standards for the intended (and any future) occupants and residents.

The Cooling Hierarchy has been fully considered, and all appropriate passive measures have been implemented to reduce the cooling demand before consideration has been given to energy efficient comfort cooling system. Given the location of the building and to maintain adequate comfort levels, acoustics and indoor air quality, all spaces within the building are intended to be comfort cooled to offset remaining heat gains using a highly efficient system.

On behalf of the applicant, we appreciate your consideration of our application and look forward to continuing our collaborative efforts to enhance the sustainability and functionality of 12 Stephen Mews.

References

Camden Planning Guidance, *Energy efficiency and adaptation*, January 2021, Camden Council
<https://www.camden.gov.uk/documents/20142/4823269/Energy+efficiency+CPC+Jan+2021.pdf/96c4fe9d-d3a4-4067-1030-29689a859887?t=1611732902542>

Camden Planning Guidance, *Charlotte Street Conservation Area Appraisal and Management Plan*, July 2008, Camden Council
<https://www.camden.gov.uk/documents/20142/7323179/Charlotte+Street.pdf/9ac63c8a-4be2-2dd3-879d-3553e43317c2>

The Building Regulation 2010, *Approved Document L – conservation of fuel and power*, 2021 edition incorporating 2023 Amendments – for use in England, HM Government
https://assets.publishing.service.gov.uk/media/63d8edbd90e0773d8af2c98/Approved_Document_L_Conservation_of_fuel_and_power_Volume_2_Buildings_other_than_dwelling_2021_edition_incorporating_2023_amendments.pdf

Noise Impact Assessment – 12 Stephen Mews, Camden, 3rd October 2024 – Clarke Saunders Acoustics