



## Plimsoll Building Penthouse: Contemporary Design with Comprehensive Control

The Plimsoll Building in London's King's Cross is a striking contemporary development of 178 apartments, designed by David Morley Architects. Named after Victorian politician Samuel Plimsoll, renowned for championing maritime safety and with historic ties to the area's former coal industry, the building was completed around 2013 as part of the wider King's Cross regeneration. It features high-end residential homes, communal gardens, and a refined architectural aesthetic that blends modern living with the heritage of the surrounding neighbourhood.

### Family Destination Apartment

The owner wanted a home that was not only beautiful, but also effortless to live in, lighting that adapts to mood, comfort that works quietly in the background, and shading that responds to the sun.

With panoramic views and open-plan living, the space lends itself perfectly to intelligent control, yet day-to-day usability and comfort were missing.

AVINU were appointed to elevate the existing KNX installation, enhance aesthetics and functionality, and create a London retreat that feels intuitive, secure and inviting, whether entertaining, relaxing as a family or away from home.

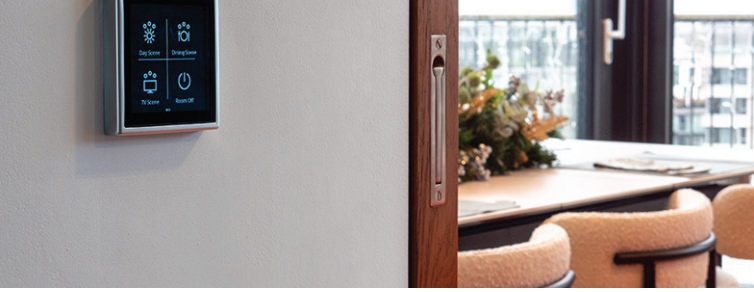


### Design Vision

AVINU were contacted by the client shortly after he purchased one of the penthouse apartments at the Plimsoll Building in spring 2025. Although the property featured an existing KNX system, functionality was limited and poorly configured, offering only basic control and leaving several areas outside the platform altogether.

HVAC lacked coordination between heating and cooling, lighting control was inconsistent with no defined scene logic, and the wall controls were dated and unresponsive. The system did not reflect the quality or lifestyle potential of the apartment.

AVINU undertook a full audit of the installation and developed a clear rectification strategy, providing the client with a single point of contact for both technical design and project management. The brief was to enhance performance, usability and aesthetics, extending intelligent control throughout the property to create a cohesive home where all services work seamlessly together.



Regrettably, the previous owners and the building maintenance team had retained very little documentation, so the first priority was to support our client with a detailed audit of the home's BMS functionality. This included reviewing the mechanical and electrical schematics for communal heating and cooling, lighting, shading, remote access and automation. An EICR safety exercise was also undertaken to ensure all mains power supplies were appropriate for the intended upgrades.

With this clarity, we were able to guide the client through what improvements were possible, what benefits they would deliver, and any additional opportunities that could be explored. This factual foundation allowed decisions to be made confidently, with full visibility of cost, performance and future potential.



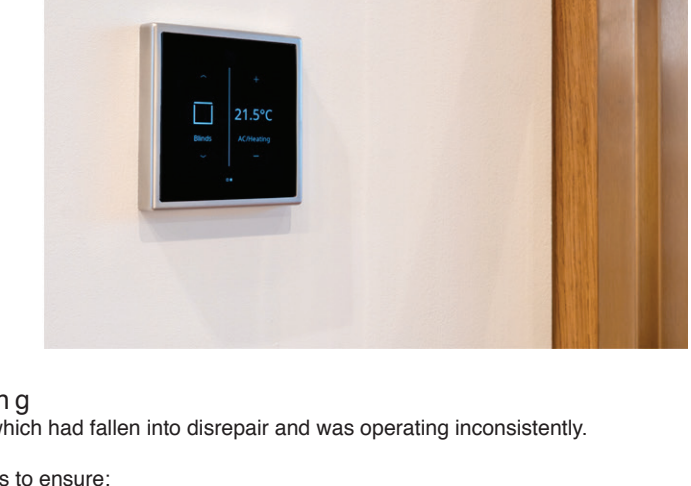
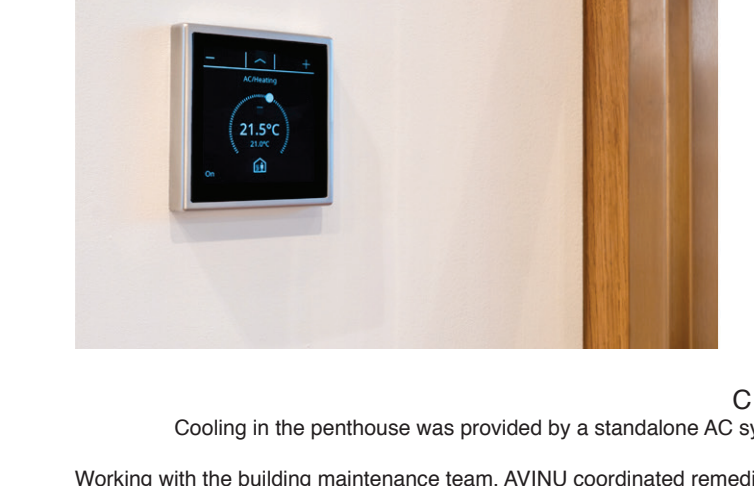
### Heating

The apartment benefits from a wet underfloor heating system which had not been serviced for some time. To ensure long-term reliability and performance, AVINU arranged a full system service for the UFH manifolds, pumps and valves.

During our audit it became clear that temperature control in each room was limited and inconsistent. The original KNX configuration offered only basic on/off control, with no room sensing in key areas. As part of the upgrade:

- Additional room temperature sensors were installed
- Individual zones were created and mapped
- Control logic was refined within the KNX system

This provided far greater granular control over comfort and energy usage, ensuring that each living space achieves its desired temperature setpoint efficiently.



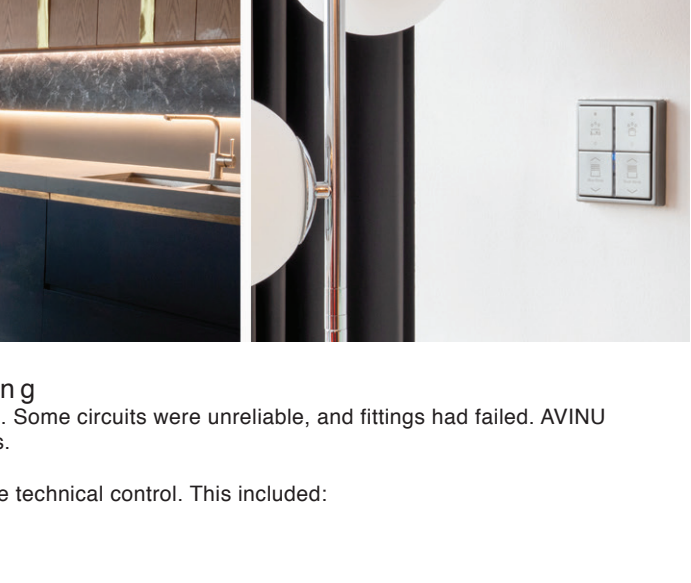
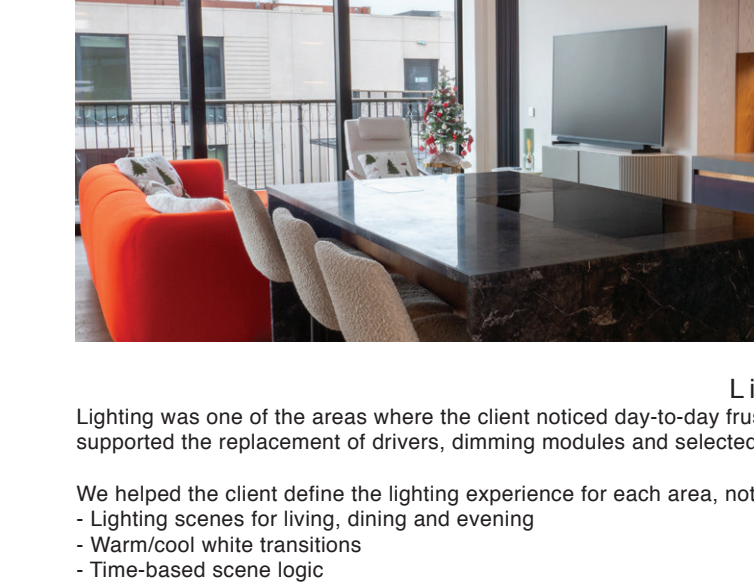
### Cooling

Cooling in the penthouse was provided by a standalone AC system which had fallen into disrepair and was operating inconsistently.

Working with the building maintenance team, AVINU coordinated remedial works to ensure:

- The AC platform was fully operational
- All FCU units were serviced
- Valves and controls were checked and recalibrated

Once operation was restored, it became apparent that cooling was not integrated with heating, resulting in inefficient operation. AVINU engaged with MyKNX to explore integration strategies to synchronise heating and cooling logic. Temperature data from the new room sensors is now shared to provide unified control.



### Lighting

Lighting was one of the areas where the client noticed day-to-day frustration. Some circuits were unreliable, and fittings had failed. AVINU supported the replacement of drivers, dimming modules and selected fittings.

We helped the client define the lighting experience for each area, not just the technical control. This included:

- Lighting scenes for living, dining and evening
- Warm/cool white transitions
- Time-based scene logic

The original switches were dated and non-intuitive, so switches from the JUNG F40 and LS Touch ranges were selected in a metallic finish, offering elegant tactile control over all services.



### Window Dressing

With floor-to-ceiling glazing, window finishes were important for privacy and comfort. AVINU introduced:

- Automated internal blinds
- External awnings for solar shading

These were integrated into the KNX system to provide intelligent control routines:

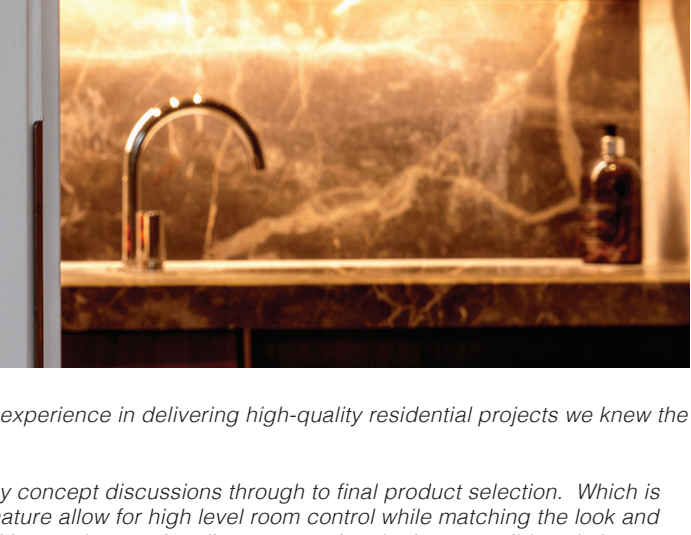
- In summer: awnings maintain cooler internal temperatures
- In winter: blinds allow solar gain for natural warmth
- At night: blinds close for privacy and heat retention

### Central Control

The JUNG SV-Server was added to give the client an over-view of the entire property, on their personal devices both in and out of the home.

Bringing in control and feedback on the now controlled items, lighting, heating, cooling blinds. Schedules and scenes can be set and activated easily by the client without the need for additional call outs. As well as any additional logic for more custom controls not natively in the keypads.

With DATA secure there is confidence that turning on the heating or cooling on the way home from work/holiday or making sure the lights were turned off in the morning is safe and easy to do.



*Plimsoll always enjoying working with AVINU, with the wealth of knowledge and experience in delivering high-quality residential projects we knew the Plimsoll Building Penthouse was in good hands.*

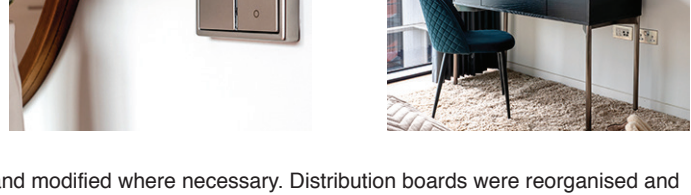
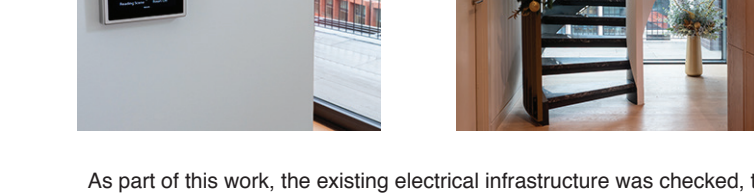
*The importance of design and functionality led our conversations, from early concept discussions through to final product selection. Which is highlighted perfectly with the LS-touch. The seamless finish and discrete nature allow for high level room control while matching the look and feel of the property. Working with AVINU on product selection, and capabilities made sure the client was getting the best possible solution, keeping both function and design at the forefront. We knew with AVINU the client would end up with the system they wanted and needed.*

— Nikita, JUNG UK

### Infrastructure

To deliver the required functionality, the property underwent significant infrastructure upgrades. This was a vital stage in the project, ensuring that new services could be installed safely and cleanly, and that the existing infrastructure could support the enhanced KNX design.

The original cabling was insufficient in several areas, and some routes were inaccessible for the additional control. AVINU undertook a detailed investigation of the fabric of the building and created a strategy for new cable routes, which allowed us to extend control to blinds, awnings, sensors and relocated switches. New containment was discreetly installed where required, and surface finishes were reinstated to ensure a seamless appearance.



As part of this work, the existing electrical infrastructure was checked, tested and modified where necessary. Distribution boards were reorganised and labelled clearly, redundant circuits were removed, and protective devices were upgraded to ensure long-term safety and compliance. Earth bonding, RCD coverage and load balancing were all verified during this process.

By combining new cable infrastructure with thorough remediation of existing wiring, the project team ensured the apartment is now fully aligned with the new design intent and capable of supporting the client's requirements for many years to come. This foundational work was essential to the successful delivery of a robust, intelligent building management system and was carried out with care, precision and respect for the property.

*"It was a pleasure to collaborate once again with the AVINU team on another prestigious project. Upgrade projects like this require clarity and focused intent from the outset and AVINU clearly understood the client's key challenges and target areas, delivering maximum results with minimal disruption. Several elements required particular attention during product selection, deployment and commissioning stages to ensure the alignment of both functional and design requirements, delivering seamless control integration within the wider scope of works. It is a delight to see the end result."*

— Kit Holmes, My KNX

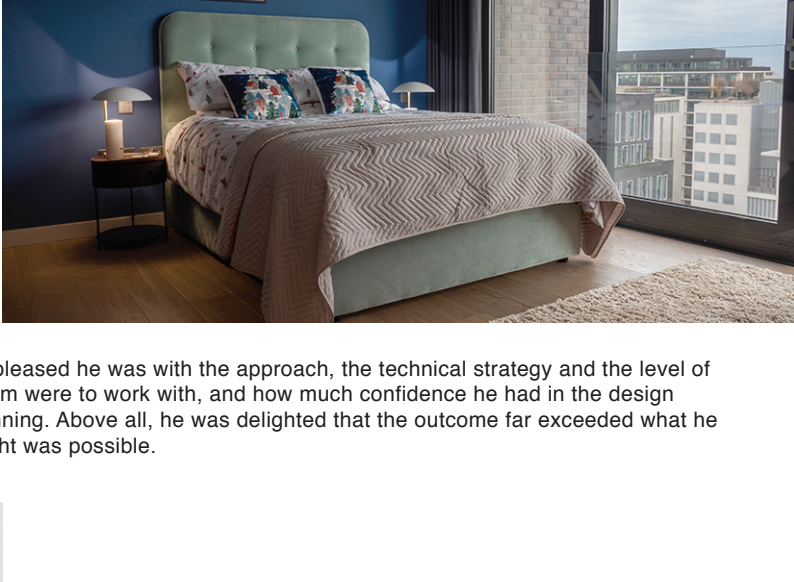
### Summary

The completed London retreat now provides our valued client with a high-end central apartment that is as elegant in daily use as it is technically capable. Everything, lighting, blinds, heating, cooling and remote access, is brought together into a single, intuitive control platform that responds to how the client actually lives.

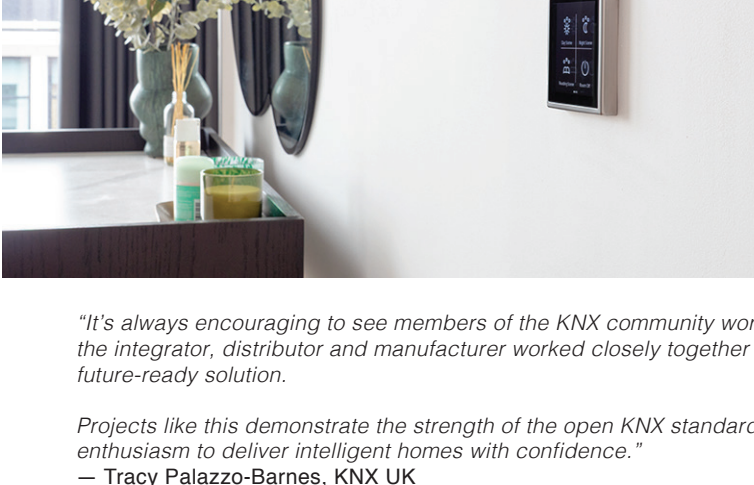
From the outset, this was a genuinely collaborative process. JUNG UK worked closely with the building maintenance team, AVINU and MyKNX to ensure every aspect of the system was understood, enhanced and assured. This approach allowed us to embrace the strengths of the existing KNX infrastructure, extend it intelligently, and introduce modern hardware where it was most beneficial. Legacy equipment was retained to manage budget, while new technology was added with confidence.

The client appreciated this clarity. At every stage, AVINU provided explanations, drawings, options and recommendations, helping him understand not just what could be done, but why it mattered. This created full transparency around choice, cost and functionality, and ultimately gave him the confidence to explore opportunities he had not initially considered. What started as a simple system upgrade grew into a comprehensive transformation of the apartment's intelligence, usability and appearance.

In addition to the technology, AVINU also undertook responsibility for remedial works and final finishing, including electrical corrections, repositioning of devices, and decorating to ensure the completed installation looked as if it had always been there. Switches, sensors and fittings were integrated sensitively, aligning with the interior design, and the final result is visually understated yet totally cohesive.



The client's feedback was overwhelmingly positive. He expressed how pleased he was with the approach, the technical strategy and the level of support throughout the journey. He commented on how easy the team were to work with, and how much confidence he had in the design decisions, knowing they were based on fact, experience and careful planning. Above all, he was delighted that the outcome far exceeded what he originally thought was possible.



Today, the apartment is a calm, effortless, intelligently managed home. It offers comfort, security, privacy, energy control and remote access, all wrapped in a beautifully finished space with premium materials, coordinated technology and a low-key elegance that belies the complexity behind it.

The result is more than a smart apartment; it is a complete experience. A wonderful London home that looks amazing, feels exceptional to live in, and will continue delivering performance and enjoyment for many years to come.

*"It's always encouraging to see members of the KNX community working collaboratively to deliver high-quality residential projects. In this case, the integrator, distributor and manufacturer worked closely together throughout the project lifecycle to ensure the client received a coordinated, future-ready solution.*

*Projects like this demonstrate the strength of the open KNX standard, bringing together specialist expertise, shared values and genuine enthusiasm to deliver intelligent homes with confidence."*

— Tracy Palazzo-Barnes, KNX UK

*"AVINU were outstanding from start to finish. They took the time to understand how we wanted to live in the building team, JUNG UK and MyKNX allowed us to embrace the existing KNX infrastructure, enhance it where it mattered most, and deliver a system that is both elegant and robust. I'm particularly proud of how our team supported every stage of the journey, from audit and design, through infrastructure, deployment and programming, right through to final finishing and decoration. The result is a home that not only looks exceptional, but truly supports how the client wants to live."*

— Client, Plimsoll Building Penthouse

*"This project perfectly reflects how we like to work at AVINU. From the outset, it was about providing clarity, understanding what was already in place, identifying what could be improved, and helping the client make informed decisions with confidence."*

*Collaboration was key to the success of this project. Working closely with the client, the building maintenance team, JUNG UK and MyKNX allowed us to embrace the existing KNX infrastructure, enhance it where it mattered most, and deliver a system that is both elegant and robust. I'm particularly proud of how our team supported every stage of the journey, from audit and design, through infrastructure, deployment and programming, right through to final finishing and decoration. The result is a home that not only looks exceptional, but truly supports how the client wants to live."*

— Darryl Roberts, AVINU