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09 March 2023

Laura Dorbeck
Planning and Regeneration
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5 Pancras Square
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London
WC1H 9JE

Dear Laura,

University College London Institute of Education, 20 Bedford Way, WC1H 0AL
Full Planning and Listed Building Consent for the installation of new plant equipment (Planning Portal reference: PP-11848157)

On behalf of our client, University College London ('UCL' or the 'Applicant'), we hereby submit to the London Borough of Camden (the 'Council') an application for Planning and Listed Building Consent for the installation of new plant equipment on the Service Road at Level 2 and 3 of the UCL Institute of Education ('IoE'). The proposals are for a fuel tank and associated wall mounted control panel ('fuel tank') at Level 2, a refrigerant condenser and refrigerant tray ('condenser unit') at Level 3, three new bollards, and an internal shaftwall within the riser from Level 2 to Level 12. The description of development is:

"Installation of new plant equipment comprising bulk fuel tank and control, condenser unit, and three new bollards to the rear of the Institute of Education at service yard level and associated works."

The Site

The building is Grade II* listed (listing reference 1246932) and is located within the Bloomsbury Conservation Area (Sub-area 3: 'University of London/British Museum'). The IoE was designed by Architect Sir Denys Lasdun and Partners and completed in 1977. It is divided into three addresses, 17 Bedford Way (occupied by the Institute for Advanced Legal Studies), 20 Bedford Way (occupied by UCL's Institute of Education) and 26 Bedford Way (occupied by UCL Psychology and Language Sciences). It is located in the wider UCL Bloomsbury Campus on Bedford Way in the London Borough of Camden.

It is bounded to the north by Gordon Square, to the east by Bedford Way and the Royal National Hotel, to the south by Russell Square and to the west by Woburn Square and the School of Oriental and African Studies (SOAS), another Lasdun designed building. Nearby, are a number of listed buildings, including Numbers 21-24 Russell Square (Grade II) the southwest, numbers 10-16 Woburn Square (Grade II) to the west, and numbers 55-59 Gordon Square (Grade II) to the northwest.

The proposed external works are contained to the service road at Level 2 of the Site. The internal works are contained within an existing store and riser area rising vertically through the building from Level 2 to Level 12 located next to the service road. The service road is accessed from Woburn Square and is located below ground level to the rear of the building.

Context to the Application

The IoE comprises a large building of circa 27,000 sqm of F1(a) (higher education) and associated ancillary floorspace and is Grade II* listed. This building has been subject to numerous planning and listed building consent applications in recent years as part of a phased masterplan to update its facilities. Pursuant to the roll out of the masterplan, the works to the building, as well as major internal refurbishment and reconfiguration, also include upgrades to services to ensure the building provides adequate spaces for learning and teaching.

This application is to install a bulk fuel tank and control unit, new condenser unit, three new bollards and an internal shaftwall. The proposal represents the continuing efforts to refurbish the building to ensure that a high-quality environment is delivered for the future users of the building, including students and staff. As part of the Phase 2 masterplan, a new life safety generator is being installed in Core B at Level 12 resulting in a need to provide a fuel dump tank located separately for fire safety purposes. A new Comms room is to be created in Zone C at Level 5 which will require refrigerant cooling, resulting in a need to provide a new outdoor condenser unit.

Planning History

The site has an extensive planning history and details of previous applications at the IoE are set out in Appendix A. An application for the installation of three condenser units at Level 2 and 3 on the service road (ref. 2021/5115/L and 2021/5006/P) was approved on 30 November 2021.

Proposed Development

This proposal is for a bulk fuel tank and control at Level 2, a new condenser unit at Level 3, and three new bollards on the service road of the IoE building; alongside an internal shaftwall from Level 2 to Level 12.

The tank is required to serve a new generator at Level 12 as there is a need to dump fuel into a separately located storage tank in case of a fire within the generator room. This bulk fuel tank is located externally, at Level 2 adjacent to the IoE service road to prevent the need for the generator to be refilled manually and manhandled through the building to Level 12. The fuel line is to be distributed via a riser, Riser 9 (R293D) from Level 2 in Room 271 to Level 12 in Room 406, where the generator is located.

As Zone C Level 5 will have a new Comms room, this requires refrigerant cooling. An outdoor condenser is to be located at the IoE service road at Level 2, where there are a number of cooling condensers of similar types and purpose already located.

The fuel pipes will enter the Level 2 service area through two newly formed penetrations of 100mm diameter into the Level 2 riser. A control panel will be mounted on the wall. Three new bollards will be installed around the fuel tank, adjacent to existing bollards. These will be like for like with the existing bollards located further up the road next to the door. Figure 1 presents the fuel tank, the two 100mm penetrations into the Level 2 service area and the three new bollards. Figure 2 shows the existing bollards

of which the new bollards will be like for like. Figure 3 presents the new condenser unit located on the return wall at Level 3. Figure 4 shows the existing condenser units on the return wall. The new condenser unit will be installed above these and be of similar appearance and size.

Two 75mm diameter penetrations will be made through the floor slabs located in the room behind the new fuel tank, from Level 3 to Level 12. These will then be contained by the installation of a new shaftwall with a 300x300mm access panel, from Level 2 to Level 12. Figure 5 presents the two 75 mm penetrations into the Level 3 to 12 floor slabs, Figure 6 presents the shaftwall that will be installed on from Level 2 to 12, in relation to the location of the fuel tank. Two 100mm diameter penetrations will be made through the return wall at Level 3, and two 100mm diameter penetrations will be made through an internal wall at Level 5 only. Figure 7 shows these wall penetrations.

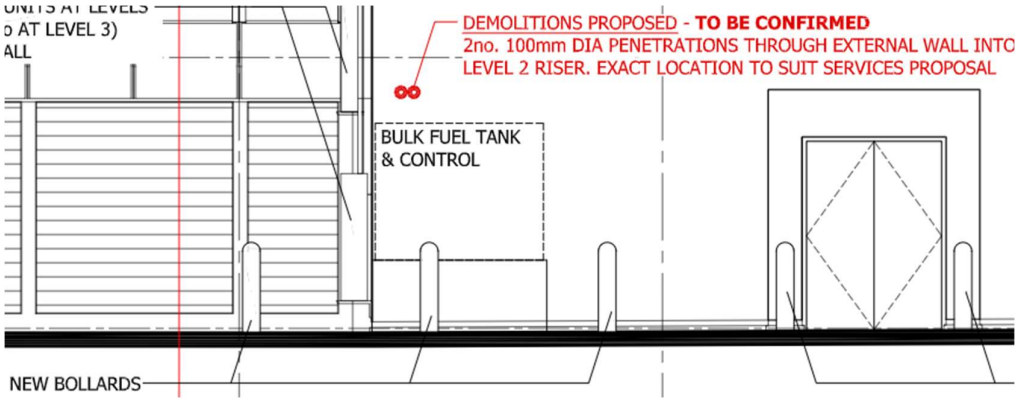

Figure 1 - Elevation showing the proposed fuel tank, new bollards and penetrations at Level 2 (Source: Architon LLP)

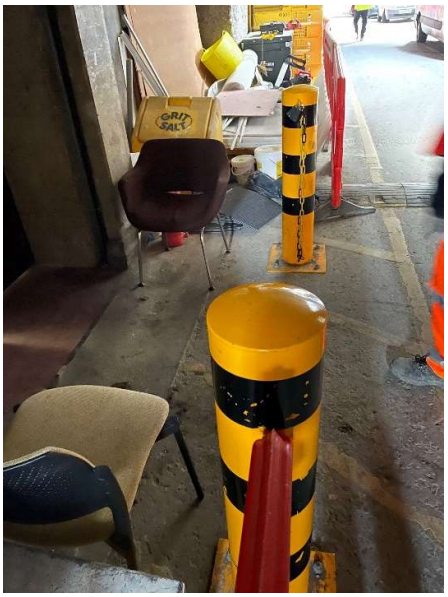

Figure 2 – Photo showing the existing bollards (Source: Arcadis)

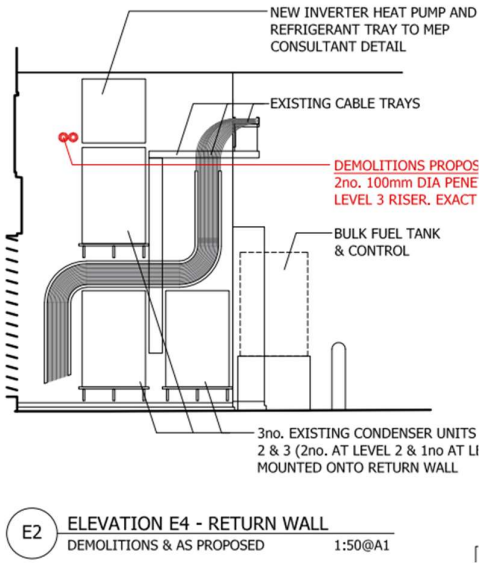

Figure 3 - Elevation showing the proposed condenser unit at Level 3 (Source: Architon LLP)

Figure 4 – Photo showing the existing condenser units located on the return wall (Source: Arcadis)

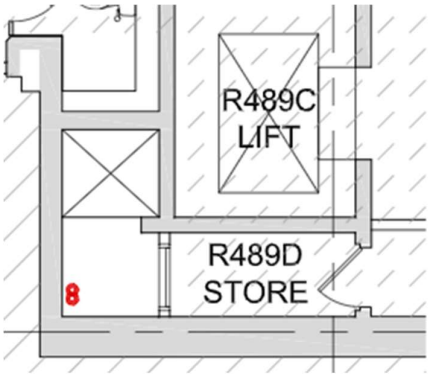

Figure 5 - Floor plan showing the penetrations into the floor slab (shown in figure at Level 5 but applies to Levels 3 to 12) (Source: Architon LLP)

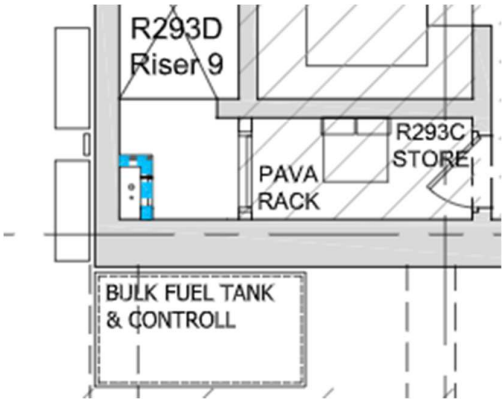

Figure 6 - Floor plan showing the shaftwall, in relation to the fuel tank (shown in figure at Level 2 but applies to Levels 2 to 12) (Source: Architon LLP)

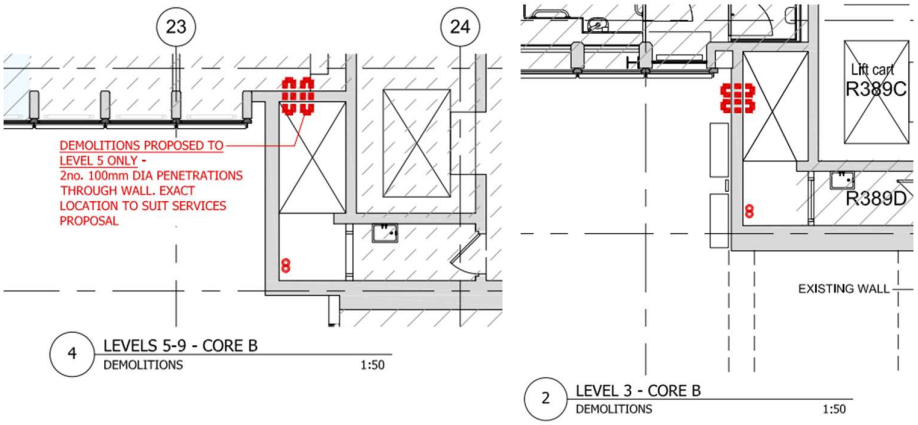

Figure 7 - Floor plan showing the wall penetrations at Level 5 and Level 3 (Source: Architon LLP)

Planning Policy Considerations

This section of the letter sets out the key planning considerations for the proposal. These are: design and heritage; noise; energy and, sustainability.

Relevant Planning Policy Documents

- National Planning Policy Framework (2021)
- The London Plan (2021)
- Camden Local Plan (2017)
- Bloomsbury Conservation Area Appraisal and Management Strategy (2011)
- Camden Planning Guidance: Design (2019)

The London Borough of Camden has conducted initial engagement on their Draft Local Plan. This consultation sought to identify key issues for the Plan moving forward. Given the early stage in the production of the new Local Plan, the consultation carries limited weight in the decision-making process.

Design and Heritage

The relevant design and conservation policies are as follows:

London Plan Policy HC1 Heritage conservation and growth: states that development proposals impacting heritage assets should be sensitive so as to preserve and enhance their significance, mitigating any potentially harmful effects.

Camden Local Plan Policy D1 Design: seeks to ensure that development proposals meet the highest standards of design, sustainability, respect local context and character, and resist development that would cause harm to any listed building or Conservation Area. Building services equipment should be in a visually inconspicuous position.

Camden Local Plan Policy D2 Heritage: maintains the need to protect and preserve Camden's heritage assets through developments of high-quality design that respects the local context and character. It recognises the need to consider the relative weight of public benefits when assessing development proposals which results in substantial harm to listed buildings. It is emphasises that the Council will resist any alterations or extensions which would cause harm to the special architectural and historic interest of a listed building.

Camden Design SPD (2021): states that building services equipment should be incorporated into the host building aesthetically and not harm listed buildings and conservation areas.

Bloomsbury Conservation Area Appraisal and Management Strategy (2011): states that efforts should be made to find discrete solutions to locate plant equipment appropriate to the character of the area, having regard to protect local amenity and preserve the appearance of the Conservation Area.

Applicant Response

The site is located within the Bloomsbury Conservation Area and is Grade II* listed. As such, UCL has carefully considered the design of the proposals to ensure it has limited impact on the Grade II* listed building and Conservation Area. The unit and bollards will not be visible from the public realm, as they are

concealed in the service yard to the rear of the building below ground level. The bollards are like for like of the existing bollards located adjacent (Figure 2) and the condenser unit is of similar appearance and scale to the existing condenser units (Figure 4). Consequently, the proposed works will have no impact on views from within the Conservation Area nor on views of the listed building from the public realm. The service yard area of the building is of low significance and was designed by Lasdun to be a back-of-house area. The area already contains existing services, and the proposed additions will be consolidated and sensibly located. Therefore, the proposals will not impact on significant areas of fabric of the building.

The proposals require very small portions of floors and walls to be removed to accommodate new penetrations through the fabric. These are considered to be extremely minor and will not impact on the significance of the wider building.

The proposal forms a vital part of the wider masterplan for the refurbishment of the building. Installing the fuel tank and shaftwall will provide public benefits through creating a pleasant environment for users of the building. The proposals will ensure this building and its services are suitable for its ongoing purpose as a university building, and will be in line with modern expectations of suitable working spaces.

Overall, the proposed works are considered to comply with the policies outlined above.

Noise

The relevant noise policies are considered below.

London Plan Policy D14 Noise: states that developments need to consider noise-sensitive uses in the surrounding area where new development is proposed and address the specific local context in an acoustic assessment when detailing mitigating efforts.

Camden Local Plan Policy A1 Managing the Impact of Development: resists development that will be harmful to the amenity of occupiers and nearby properties. When assessing proposals against this policy, the Council will consider a range of factors, including overshadowing and outlook, as well as noise and vibration levels. In relation to these factors, the policy explains that the Council will also consider the inclusion of appropriate attenuation measures.

Camden Local Plan Policy A4 Noise and vibration: sets out Camden's aim to ensure that noise and vibration is controlled and managed, and states that planning permission will not be granted for development likely to generate unacceptable noise and vibration impacts. Recognition is given to the need to guard against harm to local amenity, health, and quality of life. This requires an applicant to mitigate any potential impacts upon sensitive uses in the surrounding area and may necessitate preparation of an acoustic report to accompany the application. The installation of plant equipment will require demonstration of proof that it is clearly needed.

Applicant Response

A Plant Noise Break-Out Assessment has been prepared by Buro Happold which concludes that the level of noise is in accordance with the thresholds set by the Council (which state that new plant noise emissions should be 10db below the background noise levels).

Given the limited impact on noise levels, the condenser unit will pose no impact to the amenity and quality of life of local residents and neighbouring sensitive uses as the plant equipment is located in a service yard separated and insulated from these sensitive uses. As such, the proposals will not cause harm to the neighbouring amenity, as set out in Camden policy requirements and the proposal complies with policy.

Please refer to the Plant Noise Break-Out Assessment submitted in support of this application for further information.

Sustainability and Energy

The relevant sustainability and energy policies are considered below:

Camden Local Plan Policy CC1 Climate Change Mitigation: requires development to minimise the effects of climate change and encourages all developments to meet the highest feasible environmental standards that are financially viable during construction and occupation.

Camden Local Plan Policy CC2 Adapting to Climate Change: requires development to be resilient to climate change. All development should adopt appropriate climate change adaptation measures.

Camden Local Plan Paragraph 8.42 states that active cooling (air conditioning) will only be permitted where dynamic thermal modelling demonstrates there is a clear need for it after all of the preferred measures are incorporated in line with the cooling hierarchy.

The Energy and Efficiency and Adaption CPG (2021) provides information on key energy and resource issues within the borough and supports Local Plan Policies CC1 (Climate Change Mitigation) and CC2 (Adapting to Climate Change).

Applicant's Response

UCL has explored passive cooling and has deemed it unsuitable due to the Comms room orientation with a single external wall. It is not possible to provide natural cross ventilation or stack ventilation system to dissipate heat gains within the space.

If a single sided natural ventilation system was to be proposed on the single wall, large air flow would be required to dissipate heat gains. Therefore, high and low level louvres would be required and they would also need to be large in size. Within the space available, there would not be enough space to separate the high and low louvres and as such this option is not feasible.

At times of high external temperatures, a natural ventilation system would not be able to keep the room within the desired temperature range which discounts this option. Free cooling systems have also been discounted as unviable due to lack of space for free cooling plant externally and costs constraints considering the relatively small cooling capacity required for the Comms room.

In light of this, the condenser unit is deemed to be the most appropriate method to keep the Comms room cool. The Comms room forms essential infrastructure for the education space within the building.

Application Submission

Deloitte.

In addition to this covering letter and policy assessment, this application comprises and is supported by the following documents:

Document Type	Document Reference	Prepared by
Application Forms and Certificates	N/A	Deloitte
Plant Noise Break-Out Assessment	0052516 Rev P02	Buro Happold
Site Location Plan	3147-P5-2001 P1	Architon LLP
Site Plan	3147-P5-2002 P1	Architon LLP
Existing Floor Plan	3147-P5-2201 P1	Architon LLP
Demolitions Floor Plan	3147-P5-2202 P1	Architon LLP
Proposed Floor Plan	3147-P5-2205 P1	Architon LLP
Existing External Elevations	3147-P5-2210 P2	Architon LLP
Proposed External Elevations and Demolitions	3147-P5-2220 P2	Architon LLP
Schedule of Works	Included in drawings	Architon LLP

The application fee of £462.00 has been paid online via Planning Portal at the time of the submission.

We trust that you have all the information you need to validate the application. Should you have any queries or require any further information, then please do not hesitate to contact my colleagues Eleanor Bird (020 7007 3891 / efbird@deloitte.co.uk) or Alex Welby (020 7303 5201 / awelby@deloitte.co.uk).

Yours sincerely

Deloitte LLP

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Appendix A – Table of Planning Application History

Application Reference	Description	Status
2023/0291/L	Refurbishment and reconfiguration of Level 5 of Zone C of the Institute of Education, 20 Bedford Way comprising: the removal and replacement of existing partitions to create new workspaces; works to ceilings; installation of new lighting; installation of secondary glazing, new flooring and doors; and other associated works.	Validated 01.02.2023 Target determination date 15.03.2023
2022/3263/L	Proposed internal works to third floor, involving the removal and the installation of replacement lighting and associated controls, fixtures and fittings.	Approved 02.08.2022
2022/1846/L	Refurbishment and reconfiguration of Level 9 of Zone C of the Institute of Education, 20 Bedford Way comprising: the removal and replacement of existing partitions to create new workspaces; works to ceilings; the installation of secondary glazing; new flooring and doors; thermal upgrades to the roof and portions of the external wall at Level 9; and other associated works.	Approved 10.05.2022
2022/1037/L	Refurbishment and reconfiguration of Level 5 of Zone C of the Institute of Education, 20 Bedford Way comprising: the removal and replacement of existing partitions to create new workspaces; works to ceilings; the installation of secondary glazing; new flooring and doors; and other associated works.	Approved 24.03.2022
2021/6242/L 2021/6235/P	Refurbishment and reconfiguration of selected areas comprising: a new extended entrance at Bedford Way, a reconfigured entrance at Thornhaugh Mews; insertion of a new platform lift at Level 3 and a platform lift serving Level 3 and 4; refurbishment of the foyers at Levels 1, 3 and 4 including the installation of fixed furniture and security gates; replacement of doors to the IALS building at Levels 4-9; and other associated works.	Approved 22.12.2021
2021/5115/L 2021/5006/P	Installation of one condenser unit at Level 3 and two condenser units at Level 2 on the Service Road of the Institute of Education and associated works.	Approved 30.11.2021
2018/3322/L	Refurbishment involving internal and external changes to Levels 2, 4 and 5 of Wing A of the GII* listed Institute of Education building, including: a new student bar, new teaching and study spaces, staff offices and associated facilities, the installation of secondary glazing and a new servicing strategy, new louvres to external facade; new doors to access external terraces at Levels 4 and 5; the replacement of a roof light at Level 4; and the insulation of the terrace at Level 4 and 5.	Approved 14.11.2021
2020/1787/L	Refurbishment of the lifts within the Cores B and C including the upgrade of landing indicators, evacuations intercoms, landing stations, fire control switches, landing doors, service stations, header/overgate panels and other associated works.	Approved 05.08.2021

2020/1567/L	Refurbishment and reconfiguration of selected areas of the Institute of Education comprising: refurbishment works to the Level 1 plantroom; reconfiguration and refurbishment of Levels 5-9 in the nib and wing connected to Core A, and the Lawton Room at Level 6 adjoining Wing A; repairs and installation of insulation to the external terraces connected to these areas; installation of secondary glazing to these areas; creation of a new plant room at Level 8 Wing A and installation of new louvres to serve this plant room; refurbishment and repairs to the lobby roof on level 4 and the roof at Level 10; installation of new external gate at Level 5 of Wing A; and associated works.	Approved 15.06.2020
2020/1520/P	Refurbishment and reconfiguration of selected areas of the Institute of Education comprising: repairs and installation of insulation to the external terraces; creation of a new plant room at Level 8 Wing A and installation of new louvres to serve this plant room; refurbishment and repairs to the lobby roof on level 4 and the roof at Level 10; installation of new external gate at Level 5 of Wing A; and associated works.	Approved 15.06.2020
2019/6410/L	Minor alterations and refurbishment works to Cores A, B and C including the provision of new sanitary facilities, replacement of servicing, addition of new risers and new access panels to the existing risers within the Cores and installation of secondary glazing and obscure film to selected glazing panels within these areas; alterations to the existing plant enclosure on the roof and the installation of a new chiller unit within this enclosure; and, replacing the existing mezzanine levels in the double height observation and archive rooms at level 4 and 5 with a new floorplate and associated works.	Approved 02.03.2020
2019/6386/P	Minor alterations and refurbishment works to selected areas, including Cores A, B and C and alterations to the existing plant enclosure on the roof and the installation of a new chiller unit within this enclosure.	Approved 02.03.2020
2019/5146/L	The installation of two pedestal floor boxes and brackets for wall-mounted TV displays, video conferencing hardware, and a sound bar in Committee Room 3 (Room 420) of 20 Bedford Way.	Approved 11.12.2019
2019/3900/L	Internal and external alterations associated with the conversion of existing garage area to office space including removal of mesh cladding and installation of curtain wall, glazing, louvre panels and double door and internal layout changes	Approved 23.10.2019
2019/3624/P	External alterations including removal of existing mesh cladding and installation of curtain wall, glazing, louvre panels and double door set associated with the conversion of existing garage area to create an internal site office to university (Use Class D1).	Approved 23.10.2019
2019/1721/P 2019/1793/L	Removal of no.3 existing and installation of no.7 new lamp posts around rear forecourt of University building (Use Class D1).	Approved 06.09.2019

2019/054/L	The reconfiguration and refurbishment of the Level 1 washrooms.	Approved 02.05.2019
2018/2874/P	Refurbishment of Levels 2, 4 and 5 of Wing A to provide a replacement students bar to lv.4 (Use Class A4) as well as new teaching and study spaces, staff offices and associated facilities (Use Class D1). External alterations incl. to additions/ relocation of external doors to terraces; replacement terrace rooflight; raising level of terraces to allow for added insulation; and to raise height of existing terrace balustrades. Replacement HVAC system involving the removal of existing plant to lv.4 terrace and relocation to new plant room with associated installation of external louvres.	Approved 14.11.2018
2017/2543/L	A new lift serving levels 2-4 within the west wing, and internal alterations and refurbishment works at levels 2-4 of the west wing, and at level 3 between Cores B and C, including the reconfiguration of internal layout, revised servicing arrangements and new secondary glazing.	Approved 30.10.2017