



UCL

UCL Sustainability Bond Impact Report



CONTENTS

- 2 **Introduction**
- 3 **Allocation of funds**
- 5 **Management of Proceeds**
- 5 **Unallocated proceeds**
- 5 **Future Capacity**
- 6 **Impact Reporting**
- 6 **Featured Projects**
 - **Green Buildings**
 - 7 **UCL East**
 - 9 **UCL East – Marshgate**
 - 11 **UCL East – Pool Street West**
 - 13 **Institute of Neurology – Dementia Research Institute (IoN – DRI)**
 - 16 **Project Oriel (Joint Venture)**
 - 18 **Pearl – CAVE**

Introduction

Sustainability research has a long history at UCL; we undertake research into everything from the health impacts of climate change to novel plastic polymers and provide sustainability-related education on subjects from global health, to the natural and physical sciences. In many ways, this continues the disruptive thinking that has been the status quo at UCL since 1826. But to truly embed sustainability into UCL, we believe that we should be practising what we preach – and implementing higher standards of sustainability throughout our core activities and operations.

The UCL Sustainability Bond supports the delivery of the ambition which we set out in our Sustainability Strategy. It reinforces our commitment to sustainability, a hugely important facet of the University's activity, and supports our role as a catalyst for sustainable change across wider society.

This report covers the finance period June 2021 to July 2021. It covers a shorter period in order that we can align future Bond Impact Reports with the UCL financial year. The next report, due in early 2023, will cover the period August 2021 to July 2022.

In line with the governance process set out in our Sustainability Finance Framework, the report has been approved by UCL Council, which is UCL's governing body and oversees the management and administration of the University and the conduct of its affairs. It has also been reviewed by the University Management Committee (UMC) which has a key governance role in the process: to assess spend allocation, assess the projects and investments to be allocated or financed under the Framework for ongoing eligibility, and ensure that projects that have been discontinued - or are no longer considered to be eligible - are replaced on a best-efforts basis.

Allocation of funds

The £300 million Sustainability Bond was issued in June 2021 and proceeds from the bond will be allocated to the financing of eligible projects. The main requirement for a project to be eligible within the Sustainability Finance Framework was that it must make a positive environmental or social impact against a number of key criteria.

Table 1 below provides the details of the UCL Bond, including the total value allocated to eligible sustainability projects in the two month period June 2021 to July 2021 (in £ sterling).

Total Fund Size	£300,000,000
Currency	GBP
ISIN	XS2343114331
Issuance Date	June 2020
Allocated in June - July 2021	£54,521,000
Percentage of fund allocated	18.17%
Unallocated funds	£245,479,000

Table 1 – Details of the UCL Sustainability Bond

The projects which have been allocated in this initial period were identified as contributing towards the ‘Green Buildings’ category. Under this category, the Finance Framework notes that the UCL Sustainability Bond funds will be used to deliver ‘new construction projects, existing buildings and major refurbishment projects’ achieving or aiming to achieve at least one of:

- For new builds: Construction in line with the UK Green Building Council’s (UKGBC’s) Net Zero Carbon Building Framework; BREEAM ‘Excellent’ or higher; giving due regard for life cycle value
- For major refurbishments: Construction in line with the UK Green Building Council’s (UKGBC’s) Net Zero Carbon Building Framework; BREEAM ‘Excellent’ or higher; giving due regard for life cycle value
- For minor refurbishments: Construction in line with RICS SKA HE(18)17 with a target assessment level of Gold

The table below details the allocation of Sustainability Bond proceeds for the 2020/21 financial year to 31 July 2021 and the current BREEAM rating for the respective projects.

The report has been subject to audit and certification by a specialist ESG assurance provider, DNV: the same firm as used to certify UCL's Sustainability Finance Framework. A copy of their Assurance Report accompanies this report

Eligible Project	Allocation of Sustainability Bond Proceeds Amount*	BREEAM Certification Rating
Green Buildings UCL East	£44,791,000	Excellent (Marshgate - Interim Certification) Outstanding (Pool Street - Academic Facilities) Excellent (Pool Street Residences) (Interim Certification)
Green Buildings ION	£6,785,000	Outstanding (Interim Certification)
Green Buildings Oriel	£1,508,000	Excellent (Projected)
Green Buildings Pearl	£1,434,000	Outstanding
Green Buildings Cave	£4,000	Excellent (Projected)

*Note: Based on accepted UK GAAP accounting principles on the recognition of expenditure.

Management of Proceeds

The net proceeds of finance raised under the Framework is managed by UCL’s Sustainability and Finance Teams, who track Sustainable Projects to which Net Proceeds are to be allocated, or have been allocated, with associated investments recorded in UCL’s financial accounting systems.

Unallocated proceeds

Pending full allocation to Sustainable Projects, UCL may use any unallocated funds for either debt repayment and/or other transactions in line with its treasury policy – which may include cash deposits, investments in money market funds or otherwise for temporary refinancing purposes.

Future Capacity

The table below sets out the expected levels of spend for each of the eligible projects identified in this report and therefore the capacity to allocate the full proceeds of the bond across those projects over the subsequent three financial years.

Project	2021/22 £k	2022/23 £k	2023/24 £k	Total £k
UCL East	166,262	33,455	3,057	247,565
IoN DRI	44,497	83,409	70,314	205,005
Oriel	35,200	600	26,700	64,008
Pearl	345	-	-	1,779
Cave	7,201	1,800	-	9,005
Total	253,505	119,264	100,071	527,361

Impact Reporting

Featured Projects – Green Buildings

The following section details the environmental and social features impact of each the projects against which proceeds have been allocated in this report.



UCL East

UCL East – Marshgate

UCL East – Pool Street West

**Institute of Neurology
– Dementia Research Institute
(IoN – DRI)**

Project Oriel (Joint Venture)

Pearl - CAVE

UCL East



UCL East

UCL East represents a new phase in UCL's development and an expansion of our campus to the east of London. It builds on our progressive history, positive impact, and disruptive spirit. We are bringing together UCL academics, students, local communities, and industry to solve the biggest challenges affecting people's lives and the planet – today and into the future. The first phase includes a new academic building (Marshgate) and a new residential building (Pool Street West). The first phase of the new UCL East campus will open in 2022.



UCL East – Marshgate



UCL East – Marshgate

The building currently known as Marshgate will feature predominantly academic uses, but will also include retail, community and engagement uses.

At the heart of the building is a central atrium that is openly accessible to encourage inclusivity and community engagement, with the use of ‘Fluid Zones’ at ground and first floor level to draw people into the building. Floor space above these levels has been designed to encourage collaboration and engagement between academic uses through largely open plan and circulatory spaces.

Marshgate will house spaces for the Experiential Learning and Research Hub, the Advanced Propulsion Lab, the Manufacturing Futures Lab, the Urban and Built Environment Co-Labs, as well as the Institute of Finance and Technology and the Global Business School for Health, which will cater to leading professionals’ needs. The Institute of Making, a multidisciplinary research hub for those interested in the made world, will also occupy space on the ground and first floor levels; as will the

School for Creative and Cultural Industries, which will comprise a media lab, an object-based learning laboratory, and a suite of conservation facilities.

Sustainability features

The project has achieved an interim certification award of BREEAM Excellent, reflecting the following features:

- Energy efficiency: highly efficient building fabric; LED lighting; mechanical ventilation with heat recovery; 1200m² solar (PV) array
- Energy/ Carbon Performance:
 - 40.7% improvement over Part L Building Regulations 2013 (predicted)
- Water saving sanitary equipment
- Focus on active transport with extensive cycle storage
- Life cycle materials analysis focussed on reducing embodied carbon (e.g., through use of high levels of cement replacement)
- 17.3m³ of project-related timber waste saved to date (diverted to community projects)
- 99% of construction waste diverted from landfill (to date)

UCL East – Pool Street West



UCL East – Pool Street West

The building currently known as Pool Street West will feature a range of uses, including student accommodation, academic, retail, community and engagement uses.

The design of Pool Street West encourages innovative academic programming, as well as a range of events and activities. Performances, exhibitions, workshops and lectures will contribute to a lively and creative learning atmosphere. In addition to a centre for Robotics & Autonomous Systems, it will house the Urban Room, a major public and community space, but also School for Creative and Cultural Industries spaces - namely, a Slade studio and a London Memory Workshop. Meanwhile, the Nature-Smart Centre will use the Park as a 'living lab', and the Global Disability Innovation Hub will move there from its current home at Here East. The lower levels of the building will also feature a range of retail and food and drink units to cater to both the public and UCL students and staff.

Sustainability features

The project has received interim certification. For the academic facilities, the project is on track to achieve a BREEAM Outstanding rating. (Academic Facilities). For the residential buildings, the project is currently projected to achieve a BREEAM Excellent certificate. Some of the measures in the facility include:

- Energy efficiency: efficient building fabric; heat recovered from shower waste water; connection to local district heating network.
- Energy/ Carbon Performance: 47.74% carbon reduction over Part L Building Regulations 2013 (RIBA Stage 4 prediction)
- Healthy lifestyles – strong connections between indoors and outdoors, as well as surrounding facilities. Provides scope for a wide range of outdoor activities.
- Healthy building design – maximising natural daylight, thermal comfort and acoustic performance.
- Water saving sanitary equipment

Institute of Neurology – Dementia Research Institute (IoN – DRI)



Institute of Neurology – Dementia Research Institute (IoN – DRI)

This is a new world-class environment to fight neurological disease through the IoN-DRI programme. The centre of excellence will support 500-600 people with a 200-seat versatile seminar theatre, six new MRI scanners as well as new public spaces and a café, open to the whole community. It will be designed with patients in mind, offering bright and welcoming spaces to move away from traditional institutional design.

First class conferencing facilities will be included in the building to allow the centre to host international events in dementia care and research. As well as offering a modern space for work and collaboration, the new facility will have excellent sustainability credentials.

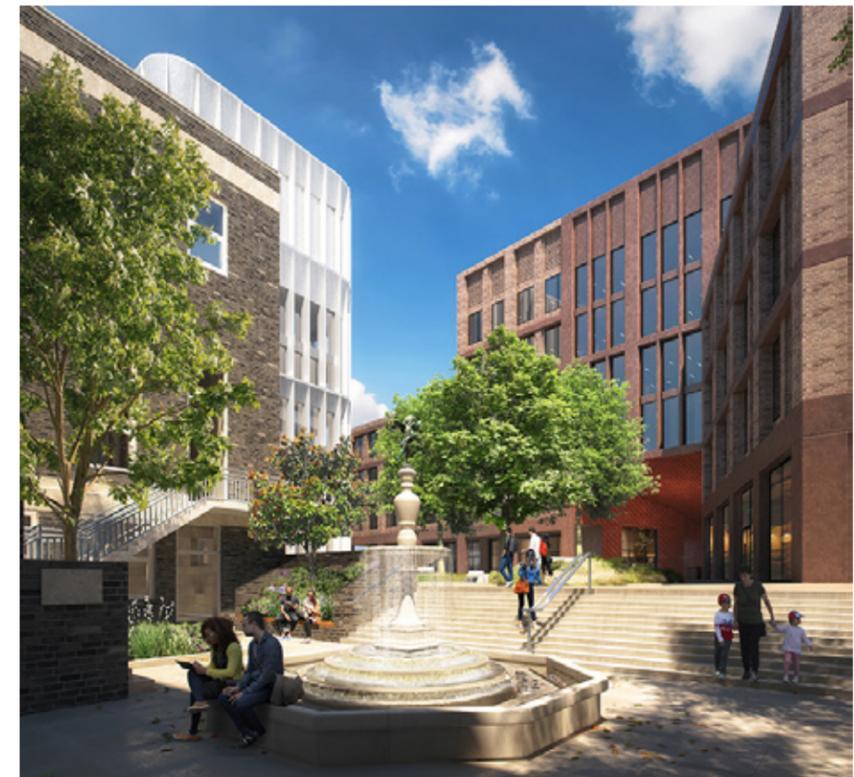
The design of the building is forward-thinking. It has longevity and it will be able to adapt to ever-changing practices in scientific research and modern ways of science. There are some elements that will always be required, such as wet labs, but the building works will take approximately four years and we cannot predict where science will be when the building opens. Therefore, we are designing it to be flexible and reconfigurable. It will be very technologically advanced and it will be cost effective because numerous researchers will share technology, laboratories and equipment rather than each department having its own.

Respect for the environment and local community are key principles underpinning the development.

Sustainability features

The project has received interim certification. For the academic facilities, the project is on track to achieve a BREEAM Outstanding rating. (Academic Facilities). For the residential buildings, the project is currently projected to achieve a BREEAM Excellent certificate. Some of the measures in the facility include:

- Energy efficiency: efficient building fabric; heat recovered from shower waste water; connection to local district heating network.
- Energy/ Carbon Performance: 47.74% carbon reduction over Part L Building Regulations 2013 (RIBA Stage 4 prediction)
- Healthy lifestyles – strong connections between indoors and outdoors, as well as surrounding facilities. Provides scope for a wide range of outdoor activities.
- Healthy building design – maximising natural daylight, thermal comfort and acoustic performance.



Project Oriel (Joint Venture)



Project Oriel (Joint Venture)

Oriel is the joint initiative between Moorfields Eye Hospital NHS Foundation Trust, the UCL Institute of Ophthalmology (IoO) and Moorfields Eye Charity that would see services move from Islington to a new, integrated centre on part of the St Pancras Hospital site in Camden.

The new facility would create a world-leading centre for advancing eye health, harnessing the expertise of the partners under one roof to enable the delivery of the highest-quality care, research and education. It is being planned and funded jointly by Moorfields Eye Hospital NHS Foundation Trust, Moorfields Eye Charity and UCL, and is due to open in 2026.

Sustainability features

This project is currently aiming for a BREEAM Excellent certificate although no interim stage certification has taken place due to the stage of the project. Features of the project include:

- Strong circular economy/ material efficiency principles focussing on: design for flexibility/ adaptability, reusability and recover; minimising construction waste; waste segregation.
- Low and zero carbon technologies: heat pumps; solar (PV) panels
- Energy efficiency: 27% improvement over Part L Building Regulations 2013 (predicted)
- Water efficiency: sanitary equipment; leak detection; flow control devices
- Biodiversity net gain assessment used to plan for improvements to green infrastructure/ ecological value.
- Climate change adaptation: sustainable urban drainage strategy; drought resistant planting; thermal comfort modelling.

Pearl – CAVE



Pearl – CAVE

PEARL (Person-Environment-Activity Research Laboratory) is a unique facility to explore the ways in which people interact with their environment. It is a massive space – around 4,000m² and 10m high – in which we can create life-sized environments – a railway station, high street, town square – under controlled conditions, so that we can examine how people interact with the environment and other people in these types of places. We can change the profile, type and material of the floor, simulate lighting of any colour and intensity, create sound from the tiniest bird song to the most massive explosion, include other senses, such as smell, and much more. PEARL is the first net zero carbon building in the UCL portfolio.

The world's first Controlled Air Ventilation Environment (CAVE) will work adjacent to PEARL. It will allow scientists and engineers to understand how airborne particles – including viruses and pollution – move around transport systems and buildings from airports to theatres, enabling better designs that improve our health and well-being

Sustainability features

Pearl has achieved a BREEAM outstanding rating and the Pearl / CAVE project is proposing to achieve a BREEAM Excellent award. Features will include:

- Energy/ Carbon Performance: 14% carbon reduction over Part L Building Regulations 2013 (predicted)
- Renewable energy from solar (PV) array on the neighbouring PEARL – UCL's first net zero carbon building
- Internal environment – focus on healthy materials; thermal comfort; acoustics
- Building energy use – passive design analysis to minimise energy use intensity
- Active travel – close proximity to a range of amenities/ outdoor spaces, with facilities for cyclists on site (parking, showers)
- Water saving – anticipated 40% improvement over baseline typical new buildings

Pearl – CAVE

