

## 1. Institutional context and mission

#### 1.1. Institutional mission

The University of Brighton (UoB) has established its reputation on a heritage of practice-based teaching, research and scholarship. We create knowledge through academic, professional and artistic practice and put that knowledge to work through our network of engaged partners. We seek to attract people who share our core values of inclusivity, sustainability, creativity and partnership. We are deeply committed to creating a workplace that is open, fair, inclusive and set in an institution that respects the value of staff who possess varying blends of research, scholarship and professional practice.

#### 1.2. Size and structure

Awarded university status in 1992, UoB has grown to a community with 19,000 students, 900 FTE academic and research staff and a doctoral (PGR) cohort of 520. UoB has an annual turnover of £197m and research and knowledge exchange income of c. £7m and £5m respectively.

UoB comprises 13 Academic Schools including a joint Medical School created in 2003 with the University of Sussex. A £85m expansion of our main campus in Brighton is scheduled for completion in 2021 and will host the new Business and Law School and a Plus X Innovation Hub.

UoB has been a member of the University Alliance (UA) since 2015 where our Vice-Chancellor serves as Chair of the Board and our Pro-Vice-Chancellor as National Director of the UA Doctoral Training Alliance (DTA).

#### 1.3. Economic and demographic context

Our main campus is in the Greater Brighton Economic Area with an economy of £21bn that has grown 10% in the past five years, and a population that is expanding 3% more than the national average. Population growth is highest among those aged over 50 and in most areas the 16-24 population has declined, creating skill shortages outside the metropolitan area.

UoB's estate straddles both the South East and Coast to Capital Local Enterprise Partnerships (LEPs), respectively the second and seventh largest economies in England. The SMEdriven economy has particular strengths in high-value, knowledge-intensive sectors including engineering/manufacturing, creative/digital, financial services and health/life sciences. UoB has forged long-standing strategic partnerships with business in these sectors including embedded bilateral relationships with corporates such as Ricardo, Southern Water and Plus X.

We lead Clean Growth UK (£3.5m, Research England) a national university-led businessinnovation network with over 1,800 members. Our regional hub, the Green Growth Platform, supports research-informed innovation for SMEs with a green/low carbon focus. Gatwick Airport is a key partner in our £1.3m EU and Arts Council-funded DRIVA projects, providing big data to regional SMEs through live flight and operational data to develop next-gen products, services and experiences.

UoB leads significant research-based components of the annual Brighton Fringe, Brighton Digital Festival and Cinecity Film Festival, contributing to the city's thriving digital, tourism and cultural economies. In the heart of the city, our Centre for Contemporary Arts engages the public with research through exhibitions and performances from our staff and international artists. Our research-led work with marginalised local communities includes a UoB-led Housing Forum on affordable accommodation and a range of collaborative public-health programmes for people with sexually-transmitted diseases (STDs), hepatitis-C infections and diabetes.

## 1.4. Institutional research focus

Our research contributes to disciplines and interdisciplinary fields from the arts, humanities and social sciences to the physical, life and health sciences, technology and engineering. Since



RAE1992, we have targeted investments towards building research capacity and culture in a focused group of research fields. This strategy has given stability and continuity to our RAE/REF submissions. So, for REF2021 we are again submitting to the same cohort of disciplines represented by 10 Units of Assessment (UoA) from across all four Main Panels. UoB has long-standing strengths and reputations in Art and Design, Humanities, Sports Studies, Allied Health Professions, Engineering and Business Studies but also provides opportunity for the emergence of maturing disciplines such as Geography, Education, Social Sciences, Computing and Media.

UoB's historical origins are in interdisciplinary arts and humanities including creative practices, technology, design, cultural history and theory. Our submissions in REF2021 to UoA32 and UoA34, with 118FTE, continue to reflect a community that stimulates radical debate and produces inspirational art, design, media and public performance. We are also making a second successive Joint Submission with the University of Sussex to UoA3 returning 120FTE researchers from across the health sciences.

#### 2. Institutional research and impact strategy

## 2.1. Achievement of strategic goals during the REF2021 census period

Our Research and Enterprise Strategic Plan that extends to mid-2021 delivered on four main research and impact goals:

#### 2.1.1. Invest in a sustainable research infrastructure

We established five cross-institution research and enterprise themes to stimulate interdisciplinary research and communicate with partners and the public. Collectively, the five 'Brighton Futures' (Connected, Creative, Healthy, Radical, Responsible) offer a framework that overarches our 14 specialist Centres of Excellence (termed COREs) that provide focussed teams who address critical global challenges and contemporary societal agendas. Alongside COREs, we encourage Research and Enterprise Groups (REGs) to serve as incubators for research excellence and build connections and capacity in both emerging and established themes.

Each CORE and Brighton Future is led by a quality-related (QR) funded 0.2FTE academic, a dedicated non-staff budget and professional support. REG investments are also supported by QR that is held within Schools. These research structures offer a first touch-point and network for new appointees, early-career researchers (ECRs) and PGRs as well as a critical mass to stimulate interdisciplinary thinking and external grant bids.

#### 2.1.2. Empower staff and reward research excellence

Since 2015, there has been no institutional top-slicing of any QR components and we have invested it all into front-line research effort and initiatives. We operate a transparent QR distribution model and can trace and evaluate every £ of QR expenditure, as demonstrated in our selection as a case study in the UKRI Review of QR spend (RSM Consulting, 2019). 55% of annual QR (£3m) is distributed directly to Academic Schools and monitored against an agreed plan of yearly actions and deliverables. The remaining QR contributes to a portfolio of research funding schemes (Section 3).

#### 2.1.3. Support all career stages

In 2016, we appointed a Research Mentoring Lead in each School and commissioned an external agency (KMP+, Copenhagen) to deliver a high-level mentor training programme. These Leads are responsible for embedding our Research Mentoring Framework and ensuring all staff can access one-to-one support from other trained colleagues using franchised materials from KMP+. We have a 0.2FTE ECR ambassador who provides peer support and organises bespoke training and networking events. We also devised a Research Leadership Programme specifically targeted at empowering mid-career researchers (52 participants, 10 since promoted to readers/professors).



## 2.1.4. Increase Doctoral Training partnerships

We have pursued our REF2014 ambition to expand Doctoral Training Programmes (DTPs and equivalents), increasing membership from two to six during this REF period and are now a member of more DTPs than any other university in our UA mission group. These have provided 132 doctoral studentships funded by EPSRC (29), AHRC (61), ESRC (32) and University Alliance DTA (10). We have also received studentships from STFC (4), MRC (2), NERC (1) and AHRC Collaborative Doctoral Partnerships (8).

#### 2.2. Future strategic research and impact goals

The 'Brighton 2025' strategic programme launched in 2021 defines our next five-year research and enterprise roadmap to:

- Focus QR investment to ensure maximum financial return. We will allocate QR funds to beacons of excellence recognised in REF2021, to facilitate growth of emerging areas and provide more autonomy to our Centres of Excellence. We will allow research ideas to flourish through additional open calls for pump-priming investment, and will match-fund more large grants and consortia bids.
- Strengthen and expand our global influence. Using QR funding we will establish a new programme of short-term Visiting Research Fellowships to attract global research leaders and provocateurs who will share new networks and communities. We will also initiate a formal two-way secondment scheme that will facilitate exchange with industry and public bodies both in the UK and overseas, especially with our Global South partners from existing and new consortia.
- Grow the volume and diversity of our PGR cohort. We will instigate a recruitment drive to increase PGR numbers building on the platform of our successful DTPs. We will reinforce the talent pipeline from undergraduate through to PhD and promote new access opportunities for PGRs with protected characteristics and unconventional backgrounds. UoB will commit to doubling the number of match-funded UoB studentships to encourage external supervision and provide work placements for PGRs.
- **Prepare our PGRs and Research Fellows for the future.** We will invest further in one-toone research mentorship by training more externally-accredited mentors within the university. We will continue to provide ring-fenced, pump-priming support for our ECRs and will use our new Visiting Research Fellowships to deliver a series of specialist PGR and early career workshops. We will initiate a PGR secondment scheme into business and the arts with our 130 external supervisors and DTP partners.

## 2.3. Enabling and facilitating impact

Our distinctive and sector-leading approach to impact is to build long-term strategic alliances that co-design projects with local communities that can then be scaled-up with global partners. For example, our Community University Partnership Programme (CUPP) has operated since 2003 and is responsible for the initiation and deepening of a series of long-standing relationships between UoB and community partners. The Inclusive Arts research within CUPP, defined and established with local learning-disabled artists at the Rocket Artists' Studios, is now developed with some of the world's most excluded peoples in Nepal, Vietnam and Myanmar. Resilience research and training developed for disadvantaged and marginalised communities in Brighton and Blackpool is now applied to drought-stricken communities in South Africa. The CUPP model has influenced global approaches to knowledge mobilisation such as through our invited membership of the Research Impact Canada (RIC) network that led to a successful £445k UKRI I3 grant with York University (Ontario).

Mechanisms for the generation and capture of research impact are part of the academic and PGR inductions and specialist staff development modules. We have stimulated impact on policy-making through creation of an *Informing Policy Fund*, now supplemented by QR-Strategic Priorities Funding (SPF), which supports researchers to navigate the policy landscape and shape decision-making (eg projects with the World Health Organization and International Monetary Fund). We also



provide direct funding from QR to individual staff to help optimise all forms of impact from their research. This includes an *Impact Development Fund* to support stakeholder engagement and the pursuit of unforeseen impact opportunities arising from existing projects, and an *Accelerator Scheme for International Networks* to expedite impact that benefits developing countries.

## 2.4. Interdisciplinary research

Our Brighton Futures, COREs and REGs are the catalysts for facilitating interdisciplinary research and growing external partnerships. For example, every term, Healthy Futures brings together our researchers and 50 businesses, charities and local authorities across the health and social care sectors to seek innovations for healthier living. A recent success from these interactions is the €4m EU-Interreg project EMPOWERCARE on the detection of cyber-attacks on healthcare information infrastructure. Our CORE in Advanced Engineering has established an 'Impact Factory' that addresses 'wicked problems' arising from society's transition to a sustainable economy. Researchers from a range of disciplines have worked together to secure £627k of Innovate UK funding to tackle challenges in the energy and combustion industries. Our DTPs promote interdisciplinarity through access to a pool of cultural and industrial partners (eg V&A, Smithsonian, Fraunhofer Society).

Two strategic funding initiatives support interdisciplinary research and international collaboration. An *International Fellow Scheme*, funded through our QR-GCRF allocation, supports bilateral exchanges with partners on the Development Assistance Committee (DAC) list. Five were awarded in 2019 – 20 including partnership with the Mumbai Ministry of Agriculture and Water Resources and the Iraq Groundwater Directorate. An *Interdisciplinary Research Initiative Scheme* seeds collaborations across disciplines that lead to substantial grant applications. Funding has spurred work between hydrographers, toxicologists and marine conservancy groups on aquatic contaminants (leading to an EU Interreg award of £484k), and brought together atmospheric and medical scientists to quantify the impact of air pollution on health during COVID-19 (leading to two grants from NERC and HDRUK/UKRI totalling £115k).

## 2.5. Engagement with the wider community

Our award-winning Community University Partnership Programme (CUPP) leads on our engagement with a range of local and international communities through research programmes embedded in our Public and Community Engagement strategy. We share UoB's expertise, resources and facilities with over 100 community partners to address social disadvantage including school, pupils and teachers in Africa (UoA23) and the response to COVID-19 in the tourism and SME sector in Kenya (UoA24).

We have used two UKRI grants for £106k to develop the CUPP Ignite programme that in 2018-19 co-produced research engagement projects in marginalised communities, and also supported the 'Brains at the Bevy' series, that provides a space for sharing our research ideas in a deprived area of Brighton.

## 2.6. Integrity, ethics and open research

Our commitment to acting in accordance with the *Concordat to Support Research Integrity* is underpinned by key policies and procedures including our Policy on Research Integrity, Research Ethics Policy and Research Misconduct Procedure. Training in research integrity and ethics is provided through our Researcher Development Programme and is mandatory for PGRs. We operate a three-tier ethics review system for all research from undergraduate dissertations to staff projects, which is overseen by a University-level policy committee.

We take positive action to share our research findings and data through our *Open Access and Data Management* policies. Guidance on Open Access publishing, open data and reproducibility is provided through university-wide workshops that have engaged over 400 staff. Open Access compliance rates across UoB have risen from 73% in 2016 to 87% in 2020. In 2017 UoB adopted a policy on the responsible use of metrics for judging the quality of research outputs that is based on



the Leiden Manifesto and DORA principles. Researchers deposit open-source datasets on the Brighton Open Research repository and with Research Council data centres. We also participate in group data and model code sharing via professional and community groups (eg GitHub) and have ensured non-text based practice and output is converted to digital format and accessible to all through our research repository.

# 3. <u>People</u>

## 3.1. Staffing strategy and staff development

Prioritising an inclusive, diverse and safe workplace is a core institutional value. In 2020 our Human Resource Strategy increased focus on staff health, wellbeing and skill development. Key priorities for the next five years include delivering our Race Equality Action Plan, securing an institutional Athena SWAN Silver award and fully implementing a bespoke leadership programme for female and BAME staff initiated in 2020.

We support staff with caring responsibilities, ill-health or other equality-related circumstances through statutory policies. We adjusted working arrangements for 166 staff with caring responsibilities in 2018-20. Support for staff well-being is provided by an Occupational Health and Wellbeing Department, a counselling service, online mental health resources and awareness training.

102 (24%) of staff returned in this submission are on part-time contracts compared with a national average (HESA, 19/20) of 34%. 62% of part-time contracts identify as female. UoB has reduced the proportion of staff on fixed-term contracts (FTC) by 4% since 2014; only 1.85% FTE of staff are on FTC in this submission compared with a national average (HESA, 19/20) of 33.4%

All UoB academic contracts have 20% time allocated for research and scholarship activities. External funding of staff time for research is allocated on top of this core workload allowance. UoB uses QR to fund its own annual research sabbatical scheme for all academic and research staff, including those on fractional and fixed-term contracts. Since 2014, sabbaticals have been awarded to 89 staff and tracked outcomes show they have resulted in production of 299 outputs and £1.9m income. We also provide fee-reductions for staff to undertake PhDs and grow our research capacity with 126 staff taking this opportunity since 2014.

The Academic Staff Promotion Procedure provides opportunity for staff-initiated applications at any stage of their career. Since 2014, 580 staff applied for promotion and 367 (63%) were successful, including 27 (68% success rate) research-only contracted staff. An Equality Impact Assessment (EIA) for 2019 showed there was no significant difference by ethnicity or contractual status in the success rates for promotion and 80% of females were successful.

UoB offers a set of mentoring schemes to help staff develop their skills and realise their full potential. A university-wide scheme is available to all and introduced at induction for new staff. This is complemented by a research mentoring framework that is led by accredited mentors in each School. A BAME mentoring scheme is offered to PGRs. In July 2020 291 academic and research staff were engaged in the research mentoring framework.

## 3.2. Concordat to Support the Career Development of Researchers

UoB was one of the early adopters of the Concordat and retained the HR Excellence in Research Award for the fourth successive time in May 2020. Our Concordat Implementation Plan is managed by a Steering Group that includes the PVC, ECR ambassador and three School-based ECRs. Over the past eight years, this group has led on the annual monitoring of recruitment and promotion metrics to assess bias. The Steering Group has instigated positive change to the ECR experience by recasting the Researchers Development Training Programme and through introducing EIAs for all of our internally-funded research schemes so we can take positive action to support our ECRs.



# 3.3. Early Career Researchers

12% of staff returned to REF2021 are ECRs and we have not requested output reduction for any staff or UoA. We ask staff to self-identify as ECRs if they believe they are at a point in their career where they could benefit from institutional support. This inclusive approach ensures we encourage staff to seek support if they want to re-engage with research, have joined us from a period of employment outside the HEI sector, or have had a career break that has impacted on their research trajectory. QR is used to fund a 0.2FTE ECR Ambassador who leads our ECR network that has representatives embedded in all our Schools to ensure needs are identified and then solved. The ECR ambassador serves on all university-level research committees.

*Future's Bright*, a biennial University-wide conference, focuses on the personal, professional and career development of ECRs. UoB's *Rising Stars Scheme*, designed to support staff make a step-change in their research career and experience project leadership, gives priority to those at the beginning of their career. Since 2015 £648k has been awarded to 78 staff with a 3:1 return on investment.

#### 3.4. Training and support for research students

The Brighton Doctoral College (BDC) offers a comprehensive Postgraduate Researcher Development Programme to support knowledge and skill development including 27 online and face-to-face workshops and mandatory training in integrity, ethics and intellectual property. UoB uses experience gained from participation in six UKRI Doctoral Training Partnerships or equivalents to create a stimulating and interdisciplinary PGR training environment. We led both the AHRC Technē congresses in 2015 and 2019 and the ESPRC SEAHA PGR conference in 2017 and a residential training programme in 2018. The Doctoral Training Alliance (DTA) programme delivers a residential thematic training programme three times per year for over 250 PGRs that we oversee as the DTA Director.

The BDC manages the PGR research environment and maintains quality of the learning experience. School-based PGR Co-ordinators (PGRC) provide pastoral care and oversee progression. A termly forum of all School PGR representatives enables the wider student voice to be heard and has coordinated successful action on new PGR space, and additional stipend payments and fee-waivers required due to COVID-19. For well-being support, PGRs have access to a dedicated PGR counsellor and the online confidential forum 'Big White Wall'.

## 3.5. Equality, diversity and inclusion (EDI)

This submission has the following institutional EDI attributes on 31 July 2020:

		% of eligible staff (FTE)	% of submitted staff (FTE)	UK overall % (HESA 19/20)
Gender Profile	Female	52.3*	43.7	46.7
	Male	45.3	54.7	53.1
	Other/not declared	2.4	1.6	0.2
<b>Disability Profile</b>	Disability declared	6.9	8.0	4.6
	No Disability	91.8	90.5	95.4
	Not known	1.3	1.4	0.0
Ethnicity Profile	Asian	4.3	5.5	9.9
	Black	1.8	1.0	2.1
	Not known	2.3	1.9	8.7
	Other/mixed	5.0	5.7	4.5
	White	86.7	86.0	74.9

Table 1. Gender, disability and ethnicity profiles of eligible staff, submitted staff and UK overall

\* 22% of staff at Brighton are in the traditionally female-dominated disciplines of Health Sciences/Nursing and Education that are practice-based and have fewer staff with a significant responsibility for research



We have narrowed the median pay gap from 16.3% to 11.2% in the last three years and 44% of new professorial appointments since 2017 have been female compared with a current M/F split of 72/28% for our 60-strong professoriate. 38.5% of senior staff (Grade 10 or above on HESA codes 2 and 3) identify as female including 50% of the UoB Executive. All staff on interview panels undertake mandatory online training in unconscious bias and our recruitment process uses both gender decoders for adverts and anonymous online shortlisting.

UoB is a Disability Confident Level 2 employer, is one of only 17 institutions to hold a Bronze Race Equality Charter award, is a signatory to the Technician Commitment, and in our most recent submission to the 2019 index, was a Stonewall Top 100 employer. UoB holds an Athena SWAN institutional Bronze and out of the 13 Schools, 2 have Silver, 8 have Bronze and 3 are awaiting decision from Advance HE. Since 2020, UoB has established BAME mentoring and allyship programmes and offers bespoke promotion workshops and leadership development programmes for BAME staff. Our latest CROS survey (2019) showed that 83% (sector norm = 71%) of our staff consider UoB treats them fairly irrespective of gender and 90% (sector norm = 73%) regardless of sexual orientation.

## 4. Income, infrastructure and facilities

#### 4.1. Strategy and support for research income generation

Our strategy for generating research income is threefold:

- be inclusive and ensure all researchers have the confidence to apply for external grants;
- provide financial and mentoring support so all new researchers can obtain their first external grant;
- encourage experienced staff to diversify their income sources whilst maintaining a bedrock of UKRI or EU funding.

Our targets for income generation are:

- maintain our annual grant income at a steady and sustainable level
- achieve a bid success rate of at least 25%
- achieve at least 25% of research income from Research Councils
- be a PI or CI on a successful large consortium bid (>£1m) each year
- obtain external first grants for our most talented ECRs

As a result of mechanisms in place to support these targets, our grant income has averaged £7m p.a. and we have used the indirects generated to sustain a pool of Research Fellows and Technicians, particularly in the physical sciences. In 2017, we established an internal Peer Review College (129 staff) to review proposals prior to submission and this has helped maintain our overall grant success rates at 27% over the census period.

We have maintained a stream of funding from Research Councils and enhanced this by acting as project or work package lead on prestigious grants and consortia (eg EU €2.5m Advanced Grant; lead on £4.5m EC INNOVATEDIGNITY programme; WP lead in £18m UKRI-GCRF Hub 'Action against Stunting'; WP lead on €3.4m MSCA-ITN-ETN 'WEGO'). To facilitate our consortia grants we have forged new partnerships with international NGOs and policy makers. For example, in 2017 we initiated a series of sand pits between UoB and the world-leading Institute of Development Studies that led to three new ESRC/British Academy awards worth over £2m.

Staff receive internal pump-priming funds to initiate pilot studies that will underpin high-quality applications for external independent fellowships. These have generated a £1.1m UKRI Future Leaders Fellow (UoA12); £449k EPSRC Innovation Fellowship (UoA12); £198k AHRC Leadership Fellow award (UoA34) and £174k AHRC Fellowship (UoA32). We also mentor ECRs through the first grant process (eg five successful New Investigator grants from EPSRC).



Researchers are supported by a specialist team of 16.9 FTE officers in our central Research Support team who horizon scan for funding opportunities and provide specialist advice including oversight of IP and contractual obligations.

#### 4.2. Infrastructure and facilities

Our investments in infrastructure are targeted to areas of research excellence based in our COREs and REGs. We use all our allocation from the Research Capital Investment Fund (RCIF), supplemented by QR, to support an annual open call for new research infrastructure and technology. Since 2014, we have invested over £3m in new capital across our disciplines. We also use the RCIF to match external capital bids (eg NERC Equipment Grants of £274k to establish an X-ray photoelectron spectroscopy facility and £212k to inaugurate a NERC Brighton Genomics lab).

We combine our investments with those of key alliances to support major new research facilities that we could not fund alone. The new Advanced Engineering Building (AEB) opened in 2018 as a result of a £14.5m investment (£2m from UoB) in partnership with Coast to Capital, HEFCE Science Infrastructure Fund and a £0.5m grant from the Wolfson Foundation. The global engineering consultancy Ricardo has since commissioned £0.9m of research using the new engine test bed established in the AEB.

As part of our current £85m campus redevelopment programme we have collaborated with property developer, U+I, to create a new home for the Business and Law School and a 50,000 sq. ft innovation hub for start-ups, scale-ups and research and innovation-led SME businesses. The U+I Plus X Innovation Hub, in collaboration with UoB, has secured a further £5m funding from Coast to Capital to provide academic-led research for SMEs to create new products and services.

UoB hosts nationally-acclaimed archives that are co-funded by key partners, including the Research England-supported Brighton Design Archives that in 2018 received the Sir Misha Black Award for Innovation in Design Education. We also host the Screen Archive South East funded by £1.7m from the British Film Institute. In 2019 we launched the Brighton Centre for Contemporary Arts that curates a programme of world-class exhibitions, projects and commissions from emerging and established international artists, each of whom links with research expertise in UoB.

We share our research facilities with the University Alliance mission group and advertise 50 items of equipment on the EPSRC/Jisc open portal 'equipment.data'. Researchers have benefited from accessing external specialist laboratories including receiving time equivalent to £1.2m from the UK Space Agency for zero-gravity parabolic flights, £264k from the CERN facility, £88k from the STFC-supported Diamond Light Source and £165k from the NERC Isotope Geosciences Laboratory.

## 4.3. EDI and access to funding and infrastructure

We make regular use of EIAs within research governance to monitor equalities and decisionmaking. Internal funding schemes have been subject to an annual EIA since 2017 that covers gender, disability and ethnicity. The EIAs indicate that over a three-year period, females made 54% of the applications to these schemes, received 61% of the awards and 60% of the funding. Our proactive support for females and those taking a career break has led to an increase in the proportion of female staff submitting applications for external funding from 20% in 2014/15 to 45% in 2019/20 and winning 51% of all new awards in 2019/20.