Knowledge Exchange Plan 2022-26

Final Draft Mar 2022

Contents

Welcome

Knowledge Exchange (KE) is a term used to encompass a wide variety of activities that connect staff and students to external communities and enable the expertise and knowledge to make a difference in the world, and improve the quality of our research and education.

The [achievements](#) of our last KE Plan demonstrated that organising ourselves at the institutional level can play a decisive role in the success of KE – focusing resources on key societal challenges, building scaleable opportunities for engagement, and capturing the attention and support of valuable external allies.

The plan builds on that approach by setting out the key areas of focus for institutional development over the period 2021-25 – strategic projects that we and our key partners commit to resourcing and delivering.

There will always be a variety of engagement between academics and external partners that sit outside these areas. We must enable this to flourish and grow too, developing and maintaining an institutional environment that recognises and rewards it as a valuable part of successful academic career.

Our Objectives

- **Local economic growth.** Realise the next phase of Keele's contribution to local economic growth, further growing high value jobs on the Science and Innovation Park, continuing to work at scale to support large SMEs to undertake first time R&D, intensifying R&D relationships at the local level.

- **Future skills needs.** Further strengthen our role in addressing future skills needs through flexible models of education, apprenticeships, professional development, micro-credentials and T-levels.

- **Net Zero.** Play a central role in accelerating the transition to net zero, mobilising our expertise, student and graduate talent, civic, industrial and academic partnerships and assets to transform energy systems, and build skills and knowledge in wider communities.

- **Recovery and resilience**. Follow through on the commitments of the Keele Deal | Recovery, working across a range of arenas to support post-pandemic recovery and address the underlying problems exposed by the pandemic.

- **Health and wellbeing.** Strengthen our role in addressing regional and national health and care challenges through contributions to service transformation through education, research and open innovation.

- **Building on our strengths.** Support our four Institutes (Social Inclusion, Sustainable Futures, Global Health and Digital Society) in growing vibrant multi-sector communities for open enquiry, co-produced research, innovation, professional development and societal impact.

- **Student and Graduate outcomes.** Grow and diversify student and graduate opportunities for experiential and employment based learning, enabling up to 80% of students to take up these opportunities. Build an employer appetite for graduate skills.

- **Policy influence.** Grow our influence on public policy at the local, regional and international level, and build the skills of researchers at all levels to engage effectively with policymaking.

Key Project Areas

1. SME Innovation

▪ Maintain a focus on the development of a strong place-based innovation alliance to drive forward progress on the UK Government's 2.4% target for R&D investment, ensuring this is appropriate to the local context and adequately resourced.

▪ Continue to deliver a programme of support for SME innovation in the local business base, with the aim of helping a further 500 SMEs transition to or sustain R&D and innovation between 2021 and 2025, driving up business investment in R&D.

This includes:

▪ Further expanding Keele's portfolio of innovation support for local businesses into advanced data analytics, smart energy supply chain development and digital health.

▪ Developing our programmes of leadership skill-building for SME owner managers and senior teams to better respond to the demands of the recovery period through product and process innovation.

▪ Building on the foundations of SME innovation put in place over the last HEIF period to develop our portfolio of collaborative industrial innovation projects, supporting an increased number of businesses to attract significant government funding into industrial Research, Development and Innovation with the University. The aim is to seed an additional 15 projects over the next four years.

▪ Further development of the Business Gateway to improve partner experience and facilitate increasing intensification of RD&I relationships

2. Science & Innovation Park

▪ Continue to develop Keele Science and Innovation Park as high value employment growth site, attracting and developing sectors able to benefit from Keele's research and expertise. Innovation Centres 7 & 8 (advanced digital and veterinary science) to be completed by 2022, and a further two expected to be completed before 2025 (Innovation Centre 9 - Materials for Sustainability and Health is currently in early stages of development).

▪ Further develop the research, student, graduate and technician engagement with Science Park companies.

3. Smart Energy

▪ Realise the full benefits to the local area of Keele's pioneering Smart Energy Network Demonstrator developed with Siemens UK, working with partners to deliver a programmed roll-out of localised smart

energy systems, including the completion and initial implementation of Zero Carbon Rugeley, and the design and early delivery of a system in Newcastle-under-Lyme. Keele will contribute programmes of applied collaborative research, innovation, KE and evaluation.

- To support the Region's ambitions to build on its comparative advantage in the energy sector by stimulate green growth through strategic economic development and inward investment. This will include the potential development of an Innovation Centre at Keele aimed at the clean energy sector.

- Develop improved pathways for skills development linked to smart energy management, building on the national analysis being undertaken by the EnergyRev consortium, and local analysis with partners in SEND and Rugeley.

4. Skills, Progression & Mobility

- Develop a local skills and progression strategy aligned to the role of the University in supporting the area's recovery, innovation, inclusive green growth and social mobility.

- Agree a further programme of degree and higher level apprenticeships and related professional learning in this context.

- Support the development of T-level skills in the local area through the Institute of Technology proposal with Newcastle and Stafford College (subject to approval of full business case).

- Develop Keele's response to increasing job losses, the changing labour-market and skills needs in the aftermath of the pandemic. The early focus will be the creation of a welcoming front door and bespoke guidance for mature and professional learners, to be followed by a full portfolio review to further develop Keele's flexible vocational education and lifelong learning offer, including further online, part-time and 'microcredentials'

- Extend Keele's role in local careers guidance, working with the Skills Hub to offer Keele's digital careers service to local jobseekers looking for professional and management roles.

5. Digital Society

- Create a Digital Society Institute that will provide a gateway to expertise in advanced digital expertise, collaborative research and student and graduate capacity.

- Enable over 500 SMEs to benefit from a Keele data analytics transformation programme, backed by graduate talent.

- Enter into new partnerships with the FE sector to develop the longer term skills pipeline for digital and data-driven industries, including a focus on communities most at risk of missing out from digitally-enabled working futures.

- Work with Staffordshire County Council and other partners to complete cross-organisational proof-of-concept projects in public policy and practice data analysis, moving towards the establishment of a Staffordshire Centre for Data Analytics during 2022.

6. Arts, Culture & Creativity

- Demonstrate the value of collaboration with the local cultural sector established under *Keele Deal | Culture* by playing an increasingly active role in major projects with local cultural anchors, supporting their competitiveness in funding applications by offering Keele's academic and professional expertise, and assets, into projects.

- Maintain a focus on urgent priority areas for local communities such as animating town centres.

- Reach a wider audience for Keele's cultural offer through increased online engagement, outdoor and neighbourhood-based arts activities in partnership with other cultural anchors.

- Use the unique ability of creative methods of engagement as part of our research to provide a voice for the lived experiences of local communities, relaunching this as 3CM in June 2021.

7. Accelerating Net Zero

- Mobilise Keele's expertise in sustainability and our student and graduate talent to accelerate place-based transitions to net zero, working within an alliance of local authorities, businesses and purpose-led organisations. This will include:

- Carbon literacy training for 600 SME and not for profit employees and trustees*

- Leadership in sustainability CPD for 100 owner-managers and senior teams*

- Significant R&D development with 20 partners where transition to zero carbon requires this*

*subject to additional project funds being secured

8. Keele Deal | Health

- Deliver a Keele Deal I Health that responds to both the enduring health challenges in the region and emerging needs relating to post pandemic recovery and resilience, focusing this on supporting place-based workforce development, service transformation and sector innovation and growth, including:

- Local care planning through collaborative research on the long-term implications of the pandemic for primary care providers, and supporting identified clinical education needs.

- Work with health and social care providers to develop responses to the legacy for health and care staff, both those

working in acute settings and primary and community care.

- Inclusive development of digital health technologies through research trials, open innovation, and public and patient involvement.

- Support for local partnerships in their post-pandemic review processes, drawing on expertise in ethics, law and policy in medicine and healthcare, infection control, civil contingencies, clinical leadership and chronic inflammatory conditions and rehabilitation

- contribute to the understanding of place-based population health locally and its implications for health prevention responses, contributing expertise in data analysis, health informatics and epidemiology to address the enduring challenges of health inequalities.

- Scope proposals for a community-based, research-led Wellbeing Insititute in this context, with a focus on bringing research, practice, education and the patient voice closer in key areas of expertise.

9. Keele Deal | Inclusion

Develop and agree shared priorities with external partners for a Keele Deal Inclusion, with the aim of launching this during 2021.

10. Policing, Security & Justice

- Continue to work with local, regional,

national and international policing partners to improve research-based knowledge and evidence-based practice across a range of different areas of operational practice.

- Broaden our partner base on future challenges relating to security and governance, including UK Government, building on UKRI-funded research with Staffordshire's Civil Contingency Unit and Fire & Rescue Service.

- Develop a programme of research with DfT and the Highways Agency on the impacts of technological change on road safety and policing.

- Actively pursue the expansion of the Collaborative Legal Outreach Network in the UK and India, and explore responses to demand in Botswana and other areas of the Global South.

We envisage at least a further 200 student opportunities (across the wider university network).

11. Food Security

- Deliver an agreed programme of co-produced research to position the Keele Centre for Food Security as a UK leading model of challenge-led collaborative inquiry, and build the presence and voice of external partners within the Centre.

12. Influencing Policy

- Continue to support increased engagement in policy-making by Keele'e research community at the regional, national and international levels.

Enabling Framework

During 2021 Keele undertook a self-evaluation and gap analysis of the environment for knowledge exchange, ahead of a peer review as part of the sector-wide [KE Concordat](#), an agreement between Sector bodies and Research England setting out a commitment to, and framework for, continuous improvement in the institutional environment enabling academics to work with external partners. The self-evaluation included:

- Document and web review;

- Independently facilitated workshops;

- Online feedback; and

- A review of existing feedback.

The approach to the assessment recognised that it is an important means not just of gathering evidence, but also of fostering a healthy culture of open reflection, learning and development, building ownership of institutional improvement priorities across academic and professional communities.

Our aims for continuous improvement include:

- To enable significantly more academics carrying out high quality research to work with external partners, framing and undertaking research together, and achieving impacts beyond the research period (spanning all domains including policy, law, culture, environment, communities of place and interest, economy, organisations, technology);

- To achieve a shift in academic attitudes to working with external partners building a broader understanding that impact is integral to high quality research, and that the knowledge of non-academic partners enhances research quality;

- To build the skills of researchers at all levels to work confidently in external arenas, building fluency in understanding and navigating external networks, finding and building relationships with valuable external partners;

- To extend Keele's contributions to addressing EDI challenges through collaboration with external partners, incentivising development work that surfaces EDI considerations as part of all areas of research;

- To grow contributions within the remit to policy at the regional, national and international levels, encouraging engagement with resources and knowledge across UPEN.

- To increase the number of proposals for research funding with the formal involvement of external partners. This includes a focus on increasing collaborative doctoral projects, KTP applications linked to AHRC disciplines, and 'non-traditional' funding such as Arts Council and UK Government funding.

- To innovate:

  - in the tools available to support

academics and partners to achieve

- impact, reviewing and modifying the suite of mechanisms used in the future; and

- in discipline/impact relationships – encouraging contributions in unexpected areas.

- To develop and grow external networks to support relevant disciplines in contributing to largescale challenge-based interdisciplinary research facilitated via Keele's four Institutes (Social Inclusion, Digital Society, Global Health and Sustainable Futures).

- To enable better management and development of high value strategic relationships where the University has multiple touchpoints.

- To ensure that the proposed academic development framework for KE has relevance for AHRC disciplines, achieving this through the piloting and evaluation of new approaches to identifying and addressing individual development needs.

Priority actions

Priority 1: Create a researcher development framework for KE, with the aim of strengthening understanding, skills and ownership of KE across academic communities.

Priority 2: Make significant progress in promoting Equality, Diversity and Inclusion in KE activities through awareness-raising, active monitoring, and recruitment.

Priority 3: Continue to improve the coherence and communication of the Professional Services offer to support academic colleagues with Knowledge Exchange, with an early focus on scaling student KE, and the efficiency of data collection for HE-BCI.

Priority 4: Develop KE dashboards at the Faculty or School level to support achievement of an Institutional KPI on KE.

Priority 5: Develop a simple toolkit for feedback from external partners, and build evaluation into future learning and development programmes.