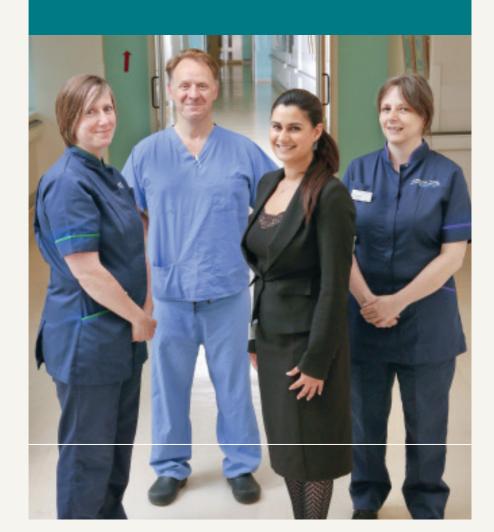
UCLH Innovation OfficeA staff guide



Who is this guide for?

This guide is for UCLH staff who have an innovative idea for improving something in the Trust and who want to know how to put it into practice or to share it with others.

The guide is produced by the Innovation Office and explains how we can help staff. This includes all kinds of staff: nurses, doctors, health assistants, therapists, porters— anyone with an idea.

What is the Innovation Office?

The Office is set up and administered jointly by UCLH and UCL Business Ltd. It provides an advice and support service specifically for UCLH staff. The aim is to help staff to develop innovative products or services that could have an application beyond the Trust and to maximise the benefits of collective innovation. The product may have commercial value.

What kind of ideas can the office help with?

At the Innovation Office we are interested in innovative ideas or solutions that have a direct effect on patients or that help staff to deliver quality care. We are particularly interested when you think other organisations could use the idea too.

The idea could be for a product, a piece of equipment, or a service. For instance; it could be for a training tool, a medical device or a piece of software. The idea may still be vague and as yet only a theory. Or you may already have put it into practice and think other organisations could benefit from it.

Here are examples of the kinds of innovations we could help you with:

 psychological instruments for rating psychological conditions or diagnostic tools that may be different from evaluation tools

- checklists for theatre, medicine or healthcare management
- self-management tools and booklets or apps for patients with long-term conditions
- medical devices of all types and classes
- in-vitro diagnostic tests
- patient reported outcome measures (PROMS) tools
- equipment (not medical devices) such as hoists, medical gowns and cots

- planning tools for non-medical professionals, such as management software
- teaching or training schemes for professionals in training or Continuing Professional Development, or equipment to be used in clinical training (possibly dummies or mannequins)
- drug targets, new drugs, or biological therapies and tissue engineering technology.

How the Innovation Office can help?

The Innovation Office can help in many ways, enabling you to put into practise or to share your idea in the most effective way. We can:

- evaluate your innovative idea and how it can be developed
- assess the commercial potential of your idea
- identify obstacles and how they can be overcome
- advise on how you can protect your idea so you can try to get funding or enter a commercial agreement
- help you apply for development or translational funding
- provide expert advice on intellectual property or commercial agreements
- give you access to expertise in regulatory compliance, such as safety standards
- make contact with organisations who may be able to produce prototypes, including devices,

surgical equipment and software

- negotiate commercial terms with licensees or investors.
- provide links with UCL research groups for collaborative projects

How to contact us

Don't worry if you are not sure who to get in touch with, we can make sure you speak to the right person who is best able help you. When you first contact us we will ask you to explain your ideas, either in person or on paper, then we will see how we can help.

Call:

020 3108 7907 (Nick McNally's PA) or 020 7679 9000 (UCLB reception)

Email: uclhinnovation@uclb.com

Can my idea be developed?

The Innovation Office looks for a mix of elements when assessing whether ideas could be developed.

These are the elements we look at:

- Is the idea new or surprising?
- Is there an appetite for something different?
- Is there a market need for the product or service?

We can help research the market with you. It may be that you have focused on only one therapeutic application or only on medical applications, but that there are opportunities in other therapeutic fields, or perhaps outside medicine and healthcare altogether. We can help to review patents and other relevant published literature to see what is unique about your idea.

We can then look at possible commercial routes for developing your idea and how that development could be funded.



How an idea is developed into a product or service

Record of invention Development work Commercial interest Licence Patient benefit

Before a product or service can be marketed and used widely, there are a number of development steps it needs to go through (see above). The Innovation Office offers help and support throughout the innovation process.

Why we want to develop innovative ideas

- Better-quality treatments
- Improved management of long-term chronic conditions
- Enhanced or earlier diagnosis
- New tools or operational systems that benefit staff
- Income for the Trust and Trust staff

Frequently asked questions

Should I keep my idea secret?

When you tell people about an idea it may jeopardise your ability to protect it. This is particularly important if you have an idea that may be patentable, or a design that may be protected by registered or non-registered design rights.

If you have an idea you that think may have wider applications outside UCLH or may have some commercial potential, please speak to us at the Innovation Office. It is important to call us before you share or disclose the idea with

anyone outside the trust. Examples of disclosing the idea may include:

- · presenting a poster
- doing a talk
- writing an article
- publishing in a peer-reviewed journal or professional magazine
- chatting about your idea to peers at a meeting or conference
- · posting online or on social media

Safeguarding copyright relating to clinical tools or checklists in published articles

If you plan to publish research or a comment article about a clinical tool (perhaps a psychological instrument, a questionnaire, a checklist or a reference table) there is a way of doing so without inadvertently giving the rights to use the clinical tool to the publisher.

It is important to include a statement in the published article saying that the particular information contained in the tool is under copyright to UCLH. Next

to any reproduction of it, include:

©Copyright University College London Hospitals NHS Foundation Trust 2020. All rights reserved.

Additional protection may be gained in some cases by publishing only a question set, and not the answers. Perhaps in the case of a psychological instrument, the test and not the evaluation matrix.

How will you evaluate my idea?

We will arrange to speak to you in person and possibly ask you for additional information. We may then decide to refer you to colleagues in the Trust, for example if the idea will improve service or operations but is not commercial. If the idea could have commercial potential, we will ask you to complete an Invention Disclosure Form with our help. Following this, your idea will be evaluated formally by the team at UCL Business, who will make recommendations about the next steps to take.

What is intellectual property (IP)?

Intellectual property can be defined as products of innovative, intellectual or creative activity. This includes inventions, industrial processes, software, data, written work, designs and images. In a healthcare environment intellectual property may include training manuals, clinical guidelines, books and journal articles; PowerPoint presentations, inventions, new or improved designs, medical devices, equipment, new uses for existing drugs, diagnostic tests,

and new treatments.

What are intellectual property rights?

Intellectual property rights (abbreviated to IPR) are often talked about in relation to intellectual property. These are legal rights that enable the owner to control or prevent unauthorised use of the intellectual property. Intellectual property rights may be either unregistered rights or registered rights. Examples of registered rights are patents and registered trademarks. Whereas, the content in a new training booklet, for example, is automatically protected by copyright. Software code is similarly protected by copyright. The way in which a medical device works might be protected by a patent (which is registered right) or by a registered design right.

IP Ownership

Unless otherwise agreed, if a member of Trust staff (an employee) creates or generates any intellectual property (including inventions, information and results) during the normal course of their employment, under UK legislation the first owner of that intellectual property is the Trust (the employer). Successful commercialisation of Trust IP will result in revenue which will be shared with the originators/inventors. Further details can be found in the UCLH Intellectual Property Rights Policy. Interpreting IP law isn't always simple so it's best to get in contact with the UCLH Innovation Office for advice.

Why is protecting intellectual property important?

Using intellectual property rights protection helps to stop others outside UCLH capitalising on the idea. This is especially important when investment is needed to develop and implement an idea, or roll it out to more settings outside the Trust.

Usually, investment is made in return for a financial benefit or for a cost saving to the NHS. Most investors require the developer to have a monopoly on the idea via intellectual property rights, so that the development team can ensure that no one will undercut them or steal the idea, which enables them

to generate a return on investment.

What protection rights can be used?

Where appropriate the Innovation Office will work with you to use legal rights to help protect intellectual property on behalf of the UCLH Trust.

Occasionally, protection can be achieved through keeping an idea a trade secret; as Coca-Cola do with their secret recipe. However, it is more common to use legal rights.

Do I need to patent?

Patents are registered legal rights over innovations that protect how they work, what they do, how they do it, what they are made of and how they are made. So patents are relevant to ideas that have these characteristics. However, patent protection is costly and used only in circumstances where market share for a product or service would be of sufficient monetary value.

What do I do if I need to transfer materials?

To transfer materials to or from another institution it is important to seek clarification from a local legal advisor. They will usually put in place a Material Transfer Agreement (MTA) to make sure that the receiving institution abides by any conditions of use attached to the material. An MTA should also protect the interests of you and the Trust in relation to the use of the material, and it may also set out publication rights. Please contact your Human Tissue Act (HTA)-Designated Individual if transfer relates to patient samples.

If you require an MTA for a clinical trial or your research study is managed by the Joint Research Office (JRO), please contact uclh.randd@nhs.net for further guidance.

In all other cases, please contact the UCLH Innovation Office at uclhinnovation@uclb.com.

Can I speak to someone confidentially?

If you have an innovation or some innovative research, it is best to speak to the Innovation Office about it before you talk to other individuals not employed by UCLH, including staff from partner organisations. We can advise how to keep the information you disclose to a minimum. We can also help you work with your department's legal advisor to put in place a non-disclosure agreement (sometimes called a confidentiality agreement) between UCLH on your behalf and the other organisation.

If your research study is/will be managed by the JRO, please contact <u>uclh.randd@nhs.net</u> for further guidance.

•

Is the Innovation Office the right place for me to go to, how do I decide?

If in doubt, contact us anyway. If the help you are looking for does not fall within our remit, we will work out who else in the Trust can best assist you.

IP type	Legal Rights	Duration of right
Novel inventions: how things work, what they do, how they do it, what they are made of and how they are made.	Patent	20 years (Registered)
Written works, including software musical works, dramatic works, broadcasts, recordings, artistic works, layout and typographical arrangements.	Copyright	50-70 years (automatic)
Shape of a product, a two-dimensional surface pattern or graphic design, or a combination of the two.	Registered design	renewed every 5 years up to a total of 25 years (Registered)
The shape or configuration of the article, not any of the two-dimensional aspects.	Non registered design	up to 25 years (Automatic)
Words, logos or a combination of both.	Trade mark	Renewable on 10 year anniversary or registration (registered)
Database, where there has been substantial investment in obtaining, verifying or presenting its contents.	Database (may also be covered by copyright)	15 years from making or publication (Automatic)



Case study 1:

Reducing the transmission of bacteria via computer keyboards

Computer keyboards used in hospital environments can harbour a significant level of pathogens that present a risk to patients. Professor Peter Wilson, a consultant in the Clinical Microbiology and Virology departments, helped to develop the Medigenic keyboards currently used in the Trust. He is now working with technology developers, UCL Professors Ivan Parkin (Chemistry) and Mike Wilson (Eastman Dental Institute), on a new self-cleaning keyboard.

This innovation uses a special surface coating. When light falls on the coating, molecules are activated to kill bacterial pathogens. Pilot studies have been promising, and further clinical testing is underway.



Case study 2:

Specialist age-appropriate cancer care for young adults

BRIGHTLIGHT is a collaboration involving university and hospital researchers from London, Manchester, Leeds, Birmingham, and Southampton, funded by the National Institute for Health Research and the National Cancer Research Institute's Teenage and Young Adults Clinical Studies Group.

Rachel Taylor, Senior Research Fellow for BRIGHTLIGHT on the Cancer Clinical Trials Unit, approached the UCLH innovation office to help with reporting to the funder.

The office was also able to advise the research team about intellectual property and where copyright work was being generated, how the team could protect BRIGHTLIGHT and the hospital's interests.

New questionnaires that were developed to enable evaluation of how specialist services affect the success of treatment and how well young people return to normal life such as education or work after treatment.

The office was able to advise on how to report this to the funder, and provided information about copyright statements. The materials are available online through the UCL's XIP, express licensing portal, which allows the team and the innovation office to easily manage requests from other groups to use the materials.

"Making the BRIGHTLIGHT Survey and related documents available through XIP portal has been invaluable for the research team. It is managed centrally so the team are not burdened with having to handle requests," said Rachel Taylor, Senior Research Fellow.

"There is also clear reporting of who has permission to use the questionnaires, for what reason and where they are located, which is important information for the funder. It means we are aware of people who we can potentially collaborate with in future studies, with similar interests. Plus we can also monitor for unlicensed use."



Rachel Taylor, Senior Research Fellow for BRIGHTLIGHT





Case study 3:

Improving pain management in the clinical setting

MSERV provides patients, clinicians and hospital administrators a digital approach to pain management. It has been through clinical trials at UCLH and is currently on service evaluations in NHS England, for example at Barts Heart Centre where MSERV is being trialled as part of their Enhanced Recovery after Cardiac Surgery (ERACS) initiative.

MSERV has been described as potentially the most important innovation in pain management since the Patient-Controlled Analgesia (PCA) device over 25 years ago.

It has a remarkable history too, from early stage ideation by a small team of consultant anaesthetists practicing at UCLH in NHS and product development with the financial support of Innovate UK and UCL Business. Its innovators teamed with technology specialists Mvine to bring to market a cyber-secure next generation digital platform. (Together, they have deployed MSERV into the BT Customer Showcase at Adastral Park, the applied research campus where world-first and world-leading technologies have been created.)

The solution enables the accurate reporting of pain scores by patients themselves via a mobile app designed with the help of clinical psychologists.

The pain scores are aggregated and presented to the pain team in the form of analytics and alerts with details displayed on an electronic dashboard. This means that the over- and under- reporting of pain is eliminated, giving the pain team real-time information on patients' progress and dynamic ward round routes.

It is possible to integrate MSERV with hospital systems such as Epic or Cerner to post pain scores straight into Electronic Patient Records systems as well as to capture patient survey results such as Quality of Recovery 15 (QOR-15) and Commissioning for Quality and Innovation (CQUIN) goals.

MSERV is proactively seeking registration as a Class II Medical Device and also CE Marking, both incredibly important steps towards full commercialisation of this very exciting new innovation coming out of UCL.

Learn more at MSERV42.com

Who else may be able to help?

The Quality Efficiency Productivity (QEP) team would like to hear from you if you have an idea for how to improve a service or services within the hospital. either in specific departments or across multiple departments or systems. One of the improvement programmes you may have heard about is the UCLH Productive Outpatients Programme, which the QEP team developed in partnership with the NHS Institute for Innovation and Improvement. The programme has been completed by many outpatient



teams across the majority of divisions, resulting in significant quality and efficiency improvements in

outpatient clinics across the Trust. There are still a lot of outpatient teams which could hugely benefit from the programme and who are encouraged to enrol as soon as possible.

If you would like to get involved in a service improvement project or simply find out more about the QEP team, please email QEP@uclh.nhs.uk and we will do our best

to help or signpost you to the right person as necessary.

The Quality and Safety (QS) Directorate would love to talk to you if your idea might improve quality and safety for staff or patients. For example, the Quality and Safety team are evaluating the Saphena®Grip Anti Embolism Stockings (originally developed by clinical academics at UCLH) to find out how much using them can reduce falls.

Contact

Innovation Office
Joint Research Office
1st Floor, Maple House, Suite A/B
149 Tottenham Court Road
London WT1 7DN
UK

Telephone: 020 3108 7907 / 020 7679 9000 Email:

uclhinnovation@uclb.com