



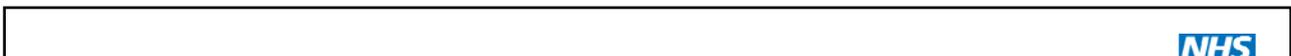
NHS
*National Institute for
Health Research*

A systems approach to health research

R&D Management Conference

@MarkSamuelsNIHR

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A RESEARCH SYSTEM

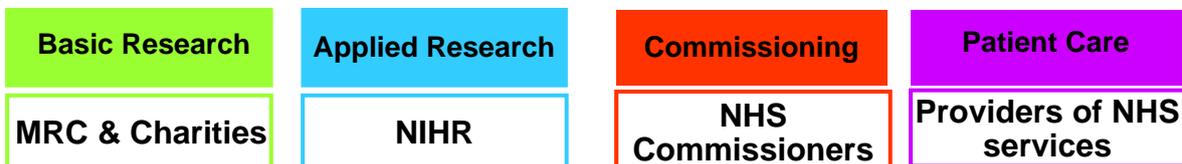
Why is the UK Government committed to research in the National Health Service?

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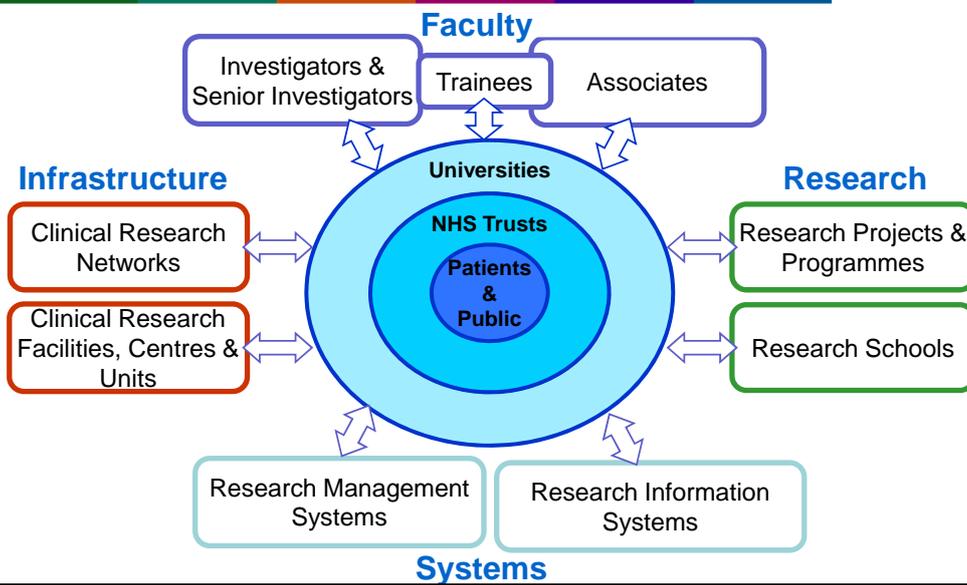
- Improve **health outcomes** through advances in research
- Improve **quality of care** by NHS participation in the research process
- Drive **economic growth** through investment by life science industries
- Strengthen international competitive position in **science**
- Increase **Health and Wealth**

From bench to bedside

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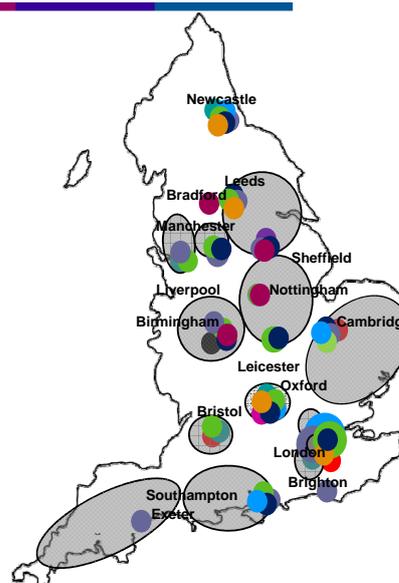
NIHR: a health research system



E.g. NIHR-supported facilities



- [NIHR Biomedical Research Units](#) ●
- [NIHR Health Protection Research Units](#) ●
- [NIHR Biomedical Research Centres](#) ●
- [NIHR Blood and Transplant Research Units](#) ●
- [NIHR Healthcare Technology Co-operatives](#) ●
- [NIHR Diagnostic Evidence Co-operatives](#) ●
- [NIHR-supported Clinical Research Facilities](#) ●
- [NIHR School for Public Health Research](#) ●
- [NIHR School for Primary Care Research](#) ●
- [NIHR/CR-UK Experimental Cancer Medicine Centres](#) ●
- [NIHR Surgical Reconstruction and Microbiology Research Centre](#) ●
- [NIHR Collaborations for Leadership in Applied Health Research and Care](#) ●

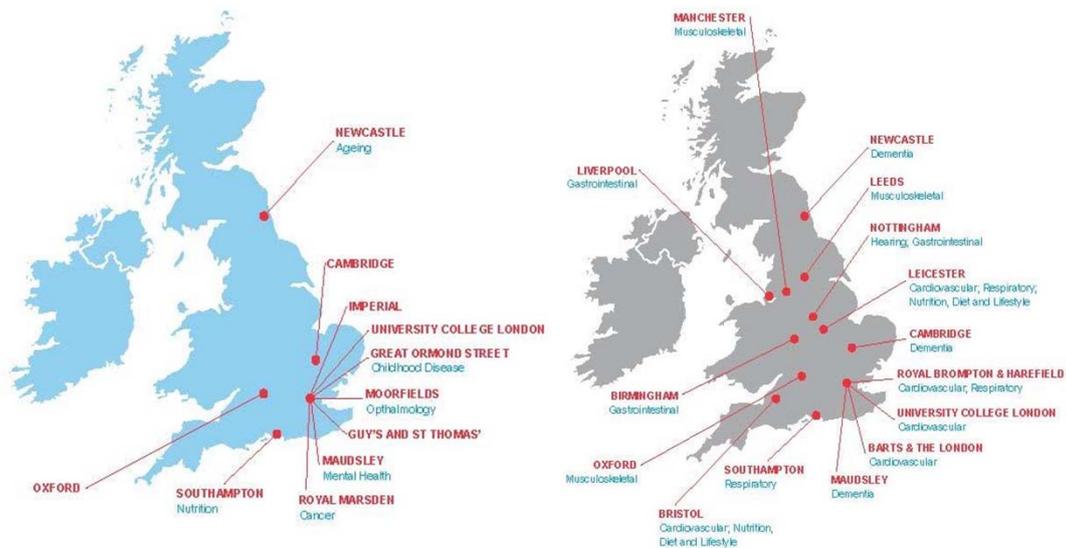


Expert translational research



The NIHR has transformed the research landscape by investing biomedical research facilities and establishing collaborations that drive innovation in key areas

Example: NIHR Biomedical Research Centres and Units



Resource-based strategy: NIHR Translational Research Partnerships

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Bringing together expert centres across the UK to work collaboratively with life sciences industry on the early and exploratory development of new drugs and therapeutics

Delivering cutting-edge translational research in **Inflammatory Respiratory Disease** and **Joint and Related Inflammatory Diseases**



NIHR Translational Research Partnerships

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Rheumatoid arthritis currently affects more than 500,000 people in the UK - causing great pain and, in some cases, disability.

The cost to the NHS is £560m a year.



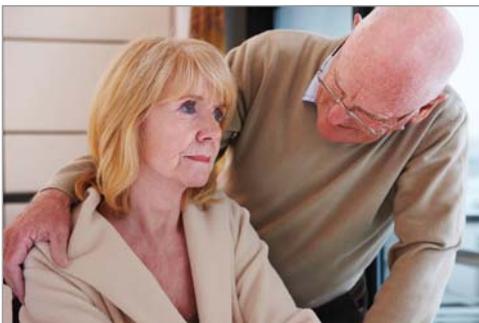
NIHR Translational Research Partnerships

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Resource-based strategy: NIHR Translational Research Collaborations

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Bringing together world-class researchers to respond to global health challenges working in partnership with industry and charities to carry out research to improved diagnosis, treatment and care

Together these collaborations are addressing some of the greatest unmet needs in **dementia** and **rare diseases**

NIHR Rare Diseases Translational Research Collaboration (RD-TRC)

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Partnership between NHS and Roche targets rare heart condition

The Pharmaceutical Journal | 6 JAN 2016



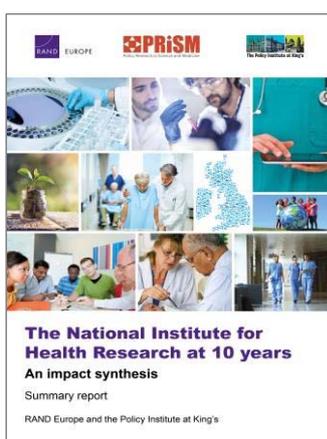
Source: Chris King / Alamy Stock Photo

Health minister George Freeman says initiative shows the government's determination to offer patients faster access to innovative drugs

A new partnership between drug manufacturer Roche and NHS researchers has been established to discover whether a drug traditionally prescribed for people with arthritis can also benefit patients suffering from an incurable heart disease.

RAND Europe report – published in May

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The NIHR is:

- Delivering benefits to patients
- Improving the health of the public nationally and internationally
- Making the nation's healthcare system more effective, cost-effective and safer
- Putting patients and the public at the heart of research
- Supporting a research infrastructure in the NHS



EUROPE



'PUSH THE PACE' PART 1

Why try to push the pace?

- NIHR seeks to improve the health and wealth of the nation through research
- Health research is slow:
 - From bench to bedside - average of 17* years
 - 10* years of that on NIHR research pathway

(* lots of caveats about time estimates!)

How are we doing this?

1. Understand and analyse the timescales for research programmes
2. Understand current NIHR initiatives aimed at reducing time delays
3. Improve key processes across individual parts of NIHR
4. Understand the NIHR research system as a whole and identify potential areas for change
5. Improve handover of research outputs to evidence users

Approach

- Staged, pragmatic approach focusing on NIHR and what we can control/change
- Opportunities for both incremental and disruptive change
- Involvement of key stakeholders
- Actively learn from other sectors/ organisations
- Examine things from a patient's perspective
- Regular communication of change to engage all stakeholders
- Recognition that time taken for an activity isn't always bad and some changes will be faster to implement than others



Approach

- pragmatic



Cross-NIHR project

- Advisory Board and workstream working groups:
 - NIHR coordinating centres
 - Biomedical research centres/units
 - AHSNs
 - CLAHRCs
 - NHS trust R&D departments
 - Research clinicians
 - Patients and public
 - Etc.

Push the Pace: phase 1

- Identified areas most likely to achieve significant time savings on NIHR pathway
 - As part of business as usual
 - As part of a new project
- Recommendations agreed by NIHR Strategy Board in November 2015

Background research

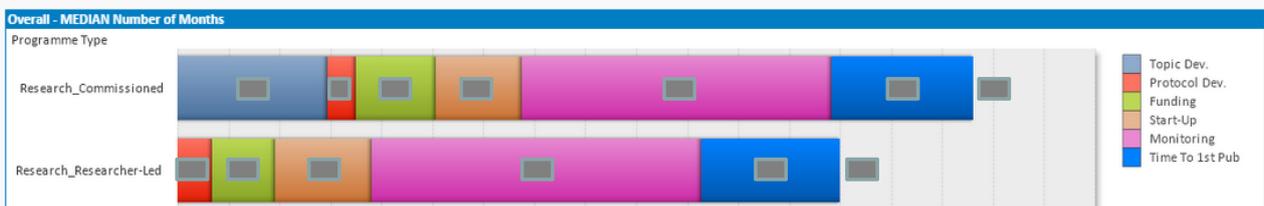
- Explored whether a 'Lean style' approach could work for the NIHR system
- Actively learned from other sectors
 - Learnt from Cabinet Office where continuous improvement programmes had worked
 - Benchmarked improvement programmes in another government research organisation (FERA)
 - Secured input and advice from Environment Agency about improvement of complex systems



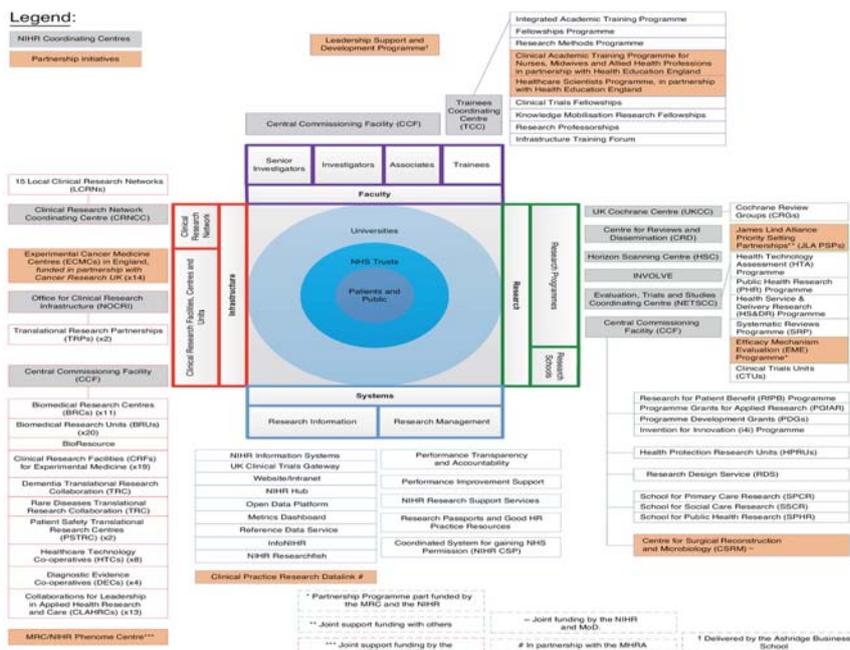
Initial analysis



- Collection of timescale data
 - A set of high level metrics showing the time taken to deliver different elements of the research pathway within the NIHR research programmes
 - Development of model to display data



NIHR Structure as of June 2014



Research: over 100 hours of interviews

- Discussions with multiple stakeholders
 - Understanding of the health research system
 - Preliminary map of NIHR research system
 - Initial identification of bottlenecks and barriers within NIHR research system
- Investigation of practices used for evidence handover to users
 - Understanding of different practices across NIHR for sharing research outputs
 - Better understanding of evidence user needs

'PUSH THE PACE' PART DEUX

Push the Pace: phase 2

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- One of NIHR four strategic priorities for 2016-17
- Cross-NIHR project – implementing findings from first Push the Pace project and undertaking new work
- 18 months to October 2017
- Objective:
By end of project, action will be underway to achieve 20 month reduction in NIHR research pathway

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Time lags

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- Different types of time lags on research pathway
- Not all are unnecessary



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Workstreams

1. Handover

Scope out, plan and pilot innovative mechanisms to speed up handover of research from the NIHR infrastructure into different programmes on the NIHR research pathway

Workstreams

2. Dissemination

Improve dissemination to evidence users

Workstreams

3. Metrics

- Develop metrics (or proxy measures) which track timescales for the whole of the NIHR research journey
- Support other PtP2 workstreams to develop metrics to demonstrate their impact

Workstreams

4. Evidence user input

Ensure that evidence users' input is used effectively to improve commissioning of research to better meet NHS/wider public health need

Workstreams

5. Peer review

Determine what a proportionate peer review system for applications is, which is fit for purpose to meet NIHR's needs

Workstreams

6. Contracting

Ascertain how to retain the benefits of contracts for research, whilst reducing the delay caused by the NIHR contracting process

Workstreams

7. Delivery

Implement the changes identified in first Push the Pace project to improve delivery of research studies to time and to target

Workstreams

Work streams have varying degrees of complexity and expected time savings

In conclusion...

A 20 month reduction in the NIHR research
pathway is worth the effort

Thank you

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