NIHR at 10: Wessex

Professor Chris Whitty
Chief Scientific Adviser
Department of Health
Building on 10 remarkable years

• The extraordinary advances in health are based on evidence and science, properly applied.

• Most health interventions depend on science from multiple disciplines from the most basic to the most applied.

• Future advances need to take account of changing need, new threats, new scientific opportunities.
Age-standardised mortality rates
England and Wales \textit{(ONS 2014)}
Ten leading causes of death in females, 2003-2013, England & Wales (ONS)

- Heart failure and complications and ill-defined heart disease (I50-I51)
- Diseases of the urinary system (N00-N39)
- Malignant neoplasm of colon, sigmoid, rectum and anus (C18-C21)
- Malignant neoplasms of female breast (C50)
- Malignant neoplasm of trachea, bronchus and lung (C33, C34)
- Chronic lower respiratory diseases (J40-J47)
- Influenza and pneumonia (J09-J18)
- Cerebrovascular diseases (I60-I69)
- Ischaemic heart diseases (I20-I25)
- Dementia and Alzheimer's disease (F01, F03, G30)
10 year cancer survival, prostate (L) breast (R)
Changes in 10 year survival 1971 to 2011 (CRUK)
Must take account of distribution of need. Dementia in women (L), heart disease (R)
Population 85 and over: 1992, 2015, 2033 (*ONS*).
Spend by UK public funder

Research spend 2013/2014

MRC

NIHR
NIHR Clinical Research Network

• 15 Local Clinical Research Networks (LCRNs).

• Boundaries align with AHSNs.

• Essential for the testing of new interventions for the NHS in areas of clinical need.

• Also important for industry and charities.
The future of the future: training

- Research training has to be appropriate for when trainees become independent scientists.
- Need to adapt to current pressures on clinical and non-clinical scientists.
- Need to address the falloff in women in science at postdoctoral level.
NIHR Senior Investigators at the University of Southampton

Professor Anne Rogers
Sociology

Professor Cyrus Cooper
Metabolic medicine

Professor Ratko Djuganovic
Respiratory diseases

Professor Paul Little
Primary health care

Professor Andrew Lotery
Ophthalmology

Professor Keith Godfrey
Nutrition and dietetics

Professor John Primrose
Surgery
NIHR Southampton Biomedical Research Centre

- BRC awarded £9.7m over 5 years 2012 to 2017

- Southampton awarded BRC designation and £14.5m from April 2017 to conduct research into:
  - Nutrition and lifestyle
  - Respiratory
  - Critical care
NIHR Southampton Respiratory Biomedical Research Unit

• A partnership between University of Southampton and University Hospital Southampton NHS Foundation Trust

• BRU awarded £7.3m over 5 years 2012 to 2017

• BRU research themes:
  • severe asthma
  • COPD
  • Cystic fibrosis
  • Primary ciliary dyskinesia
  • Allergic respiratory disease
  • Lung injury care
NIHR Clinical Research Network Wessex

Steady Increase in Studies Recruiting in Wessex LCRN

Non-Commercial Study RTT by Lead LCRN in 2016/17

100% of NHS Trusts in Wessex recruiting in FY 2016/17

83% of NHS Trusts in Wessex recruiting in commercial studies in FY 2016/17 (target 70%)

41% of GP Practices in Wessex recruiting in FY 2016/17 (target 25%)
NIHR CLAHRC Wessex

Research themes:

- Integrated respiratory care
- Ageing and dementia
- Fundamental care in hospital
- Public health and primary care
- Engagement with self-directed support
- Complexity at end of life
NIHR-CRUK Southampton Experimental Cancer Medicine Centre (ECMC)

- Part of the national network of 19 ECMCs
- Brings together laboratory and clinical patient-based research
- A leading national centre in immune-based therapies
  - Pioneering work on antibody-based therapies and vaccines for treatment
  - Created first ‘fusion vaccines’ – fusing cancer ‘antigens’ with fragments from the tetanus toxin
NIHR-Wellcome Trust Southampton Clinical Research Facility (CRF)

- Purpose-built facilities
- Designed for patient-oriented commercial and non-commercial experimental medicine studies
- £112.3m of continued funding announced today by the Department of Health
- Renewed Southampton CRF designation: £9m funding for five years
NIHR Evaluation Trials and Studies Coordinating Centre (NETS CC) programmes

- Health Technology Assessment
- Health Services & Delivery Research
- Public Health Research
- Efficacy and Mechanism Evaluation
- Systematic Reviews
NIHR Dissemination Centre

Right evidence, better decisions

We help NHS clinicians, commissioners and patients to make informed decisions

Signals
The latest important research, summarised

Highlights
Conditions, treatments and issues explored using NIHR evidence

Themed Reviews
Bringing together NIHR research on a particular theme
NIHR’s partnership with patients, carers and the public.

97% of the public believe it’s important the NHS supports research into new treatments

Source: Ipsos MORI poll (June 2012) commissioned by the Association of Medical Research Charities, Breast Cancer Campaign and the British Heart Foundation
NIHR Centre for Business Intelligence (CBI)


The current NIHR Information Strategy has two key references in relation to Business Intelligence under Significant Enablers (10.3 page 11):

- “The NIHR will *form its own Centre for Business Intelligence* to *draw together appropriate data from across the NIHR to provide NIHR level information and actionable insight*”
- “The NIHR Centre for Business Intelligence will *bring together a network of Business Intelligence professionals* from across the NIHR to support the provision of information and insight”

The NIHR Information Hierarchy
Many fields rapidly progressing driven by new and old sciences, supported by NIHR.

This will continue over the next 10 years.

Stroke mortality