

Challenges to the operating and business models of health care

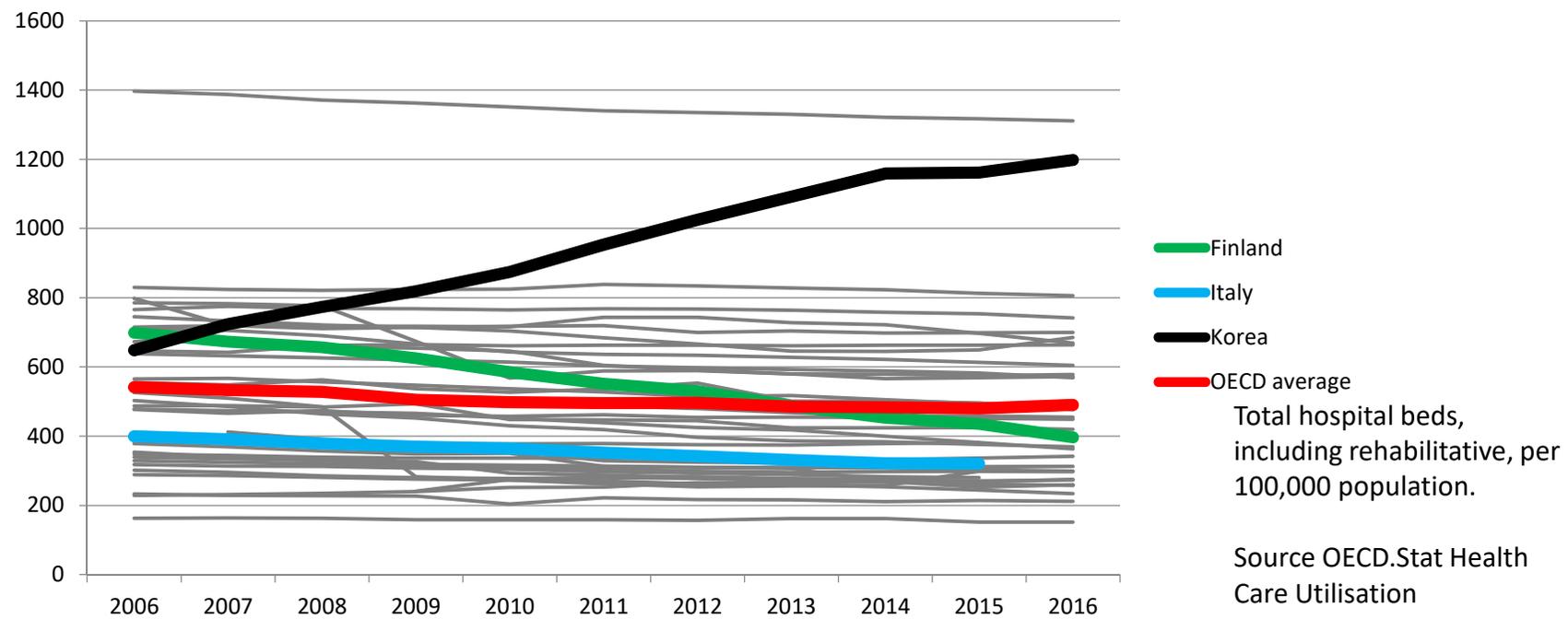
Nigel Edwards

Chief Executive, The Nuffield Trust

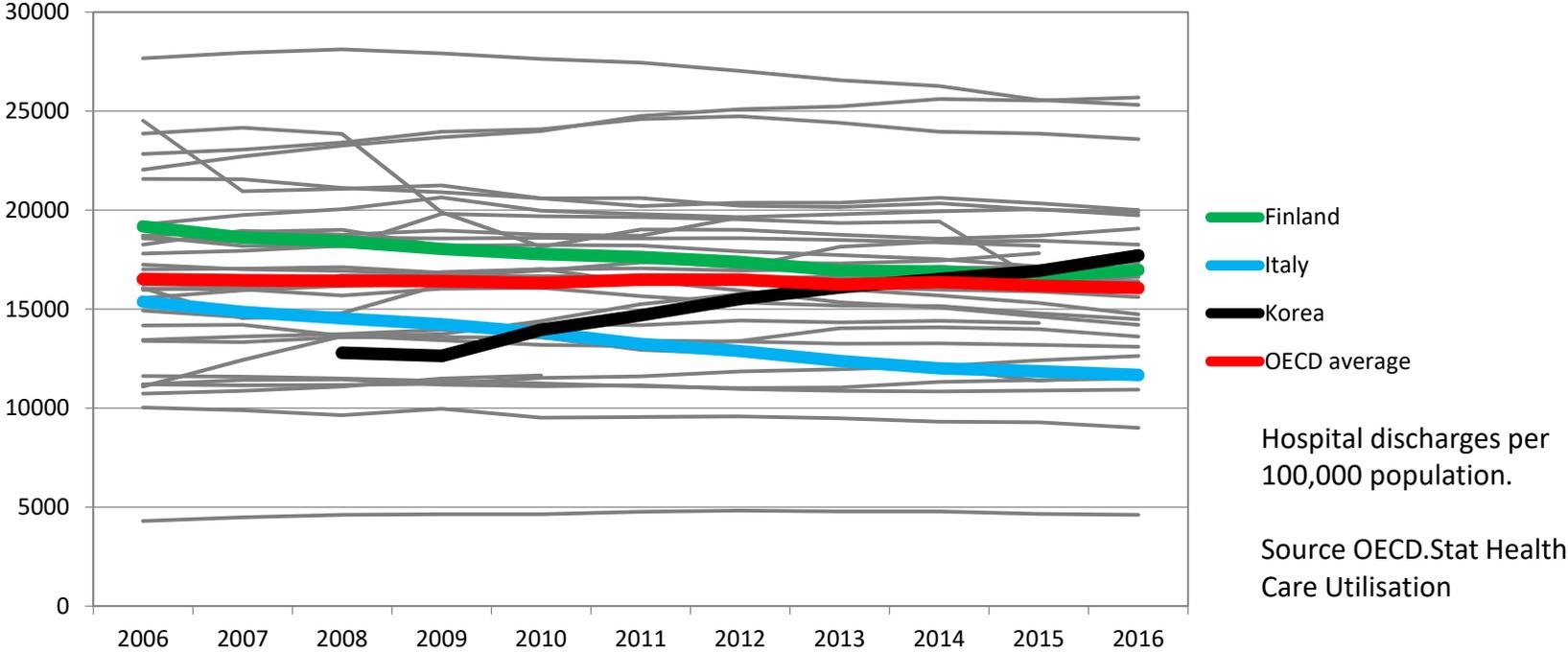
Hon. Visiting Professor London School of Hygiene and Tropical Medicine

Associate, European Observatory on Health Systems and Policies

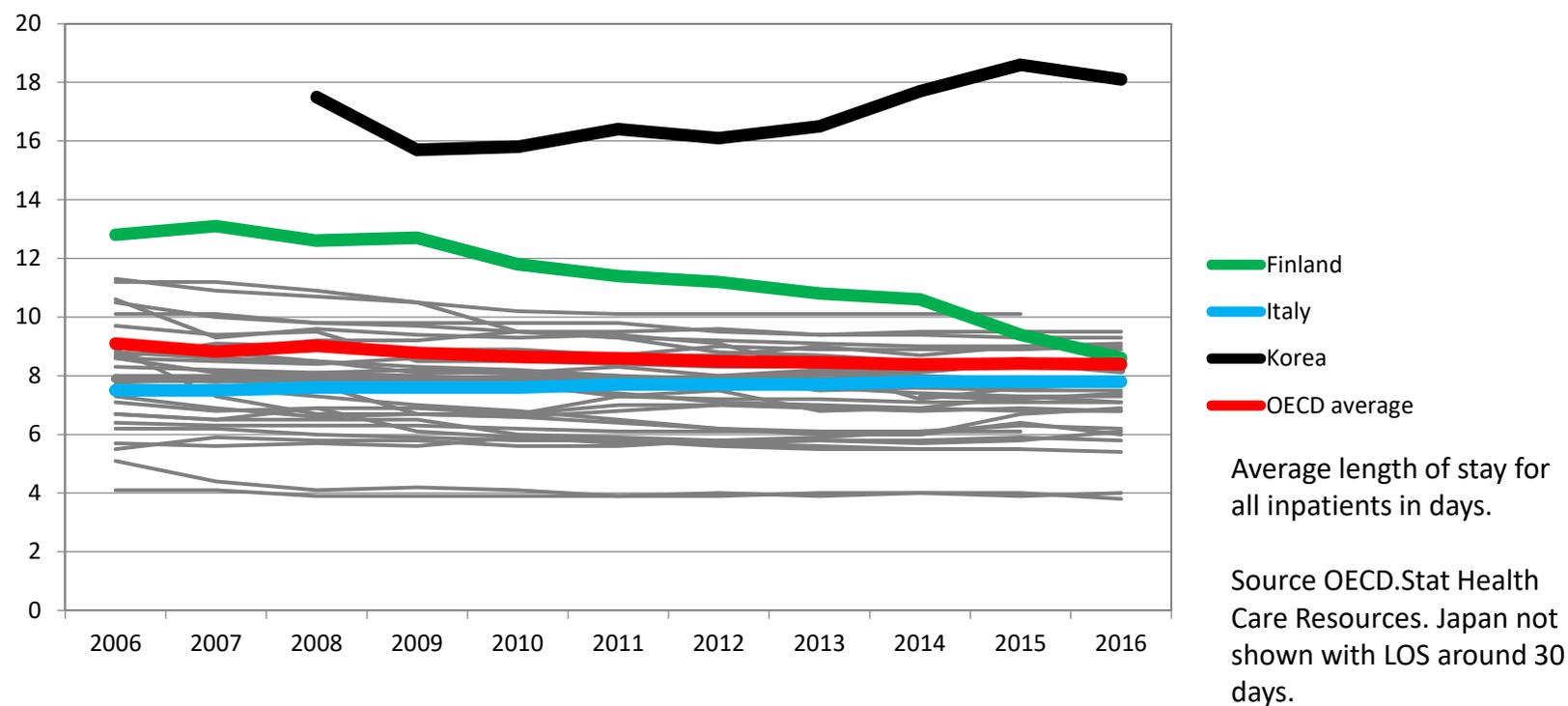
The number of OECD hospital beds has fallen by an average of 10%



Hospitalisation rates have fallen only by 3%



Average length of stay has fallen by 8%



Series of major changes and challenges

- In patterns of the population and disease
- In policy direction in many countries
- Within medicine itself
- In the workforce
- And in the wider policy environment

Aging

- Globally between 2015 and 2030, the number of people in the world aged 60 years or over is projected to grow by 56 per cent
- The number of people aged 80 years or over is growing even faster than the number of older persons overall.
- 60+ growth
- Fastest in Latin America and the Caribbean (71%)
- Asia - 66 per cent
- Africa - 64 per cent
- Oceania - 47 per cent
- Northern America - 41 per cent
- Europe - 23 per cent

Multimorbidity – it's not just aging

- UK: Between 2015 and 2035 the proportion of people with 4+ diseases will almost double
 - 2015: 9.8%
 - 2035: 17.0%
- Two-thirds of those with 4+ diseases will have mental ill-health (dementia, depression, cognitive impairment).
- Multi-morbidity prevalence in new cohorts aged 65–74 years will rise
 - 2015: 45.7%
 - 2035: 52.8%

Victims of success

- Improvement in hospital survival rates that occurred between 2000 and 2009 explains 37.3 percent of the total increment in unplanned admissions
- One extra patient surviving increases the expected number of subsequent admissions occurring within 1 year from discharge by 1.9 admissions for every 100 index admissions
- Similar results in hip fracture

Medical staffing model not matching patient need

- One in three patients admitted to hospital in England as an emergency in 2015/16 had five or more health conditions
- This is up from one in ten in 2006/07.
- Growth in multimorbidity means hospitals often have the wrong types of staff to deal with the patients they are seeing
- Too many narrow specialists – not enough general physicians and geriatricians
- Response has been the huge growth in hospitalists in the USA

Growth in interest in integrated, person centred healthcare

- Effectiveness argument
 - Fragmented care produces poor results for patients
- Economic argument
 - Avoidable hospital stays and avoidable morbidity waste money
- Recognition of the importance of social factors
 - Care can be improved by addressing social determinants
- Personalisation
 - Following single disease pathways doesn't work and may not achieve the patient's goals

Specialisation & regionalisation

- Hospital are finding it increasingly difficult to maintain the full range of specialisms
- Strong evidence for improvements in quality from higher volumes in procedure based specialties
 - Learning effects
 - Development of critical mass of intensive care support
 - Ability to have a senior doctor on site
- Scale is not so important in medical specialties
- This and economic drivers creating pressures to regionalise

Other changes in healthcare

- Workforce challenges and changes
 - Shortages
 - Burnout
 - Rurality
- Technology changes in how patients want to use the system
 - digital, phone and web
- Significant changes in diagnostic technology and its use
 - Imaging
 - Pathology

External environment

- General trend to more regulation and transparency
- Shrinking share of resources coming to the hospital sector and growing costs. - Ministries of finance increasingly concerned about spending
- Growth in for-profit ownership in a number of countries

Trend 1 Hospitals as part of wider networks

- Various types of networks with other hospitals
- Hub and spoke
- Tiered networks
- Hospital groups
- Non-hierarchical networks

- Most of this part of careful analysis about what is core
 - What is needed to provide the services to the local population
 - What is within the capability of the hospital
 - Level of fit with other services

Hub and spoke

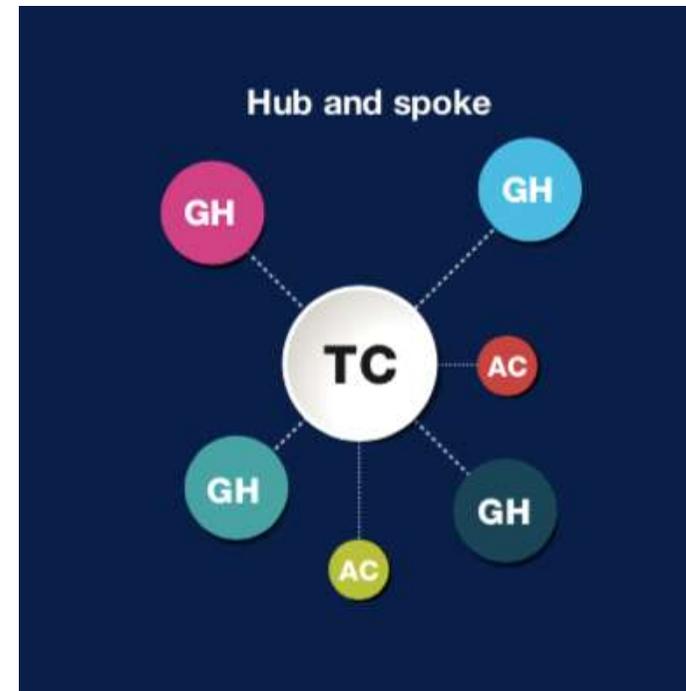
Division of labour between hub and spokes – e.g. Colorectal Cancer

Hub

- major surgery, radiotherapy, histopathology, and manage complex, metastatic disease, research, leading standards development

Spokes

- screening, scoping, imaging, biopsy, surveillance, chemotherapy, rehabilitation and co-ordinating end of life care



TC = Tertiary Centre
GH = General Hospital
AC = Ambulatory care

Tiered networks

For example:

- Obstetrics with tiers described by clinical risk & need
- Trauma networks



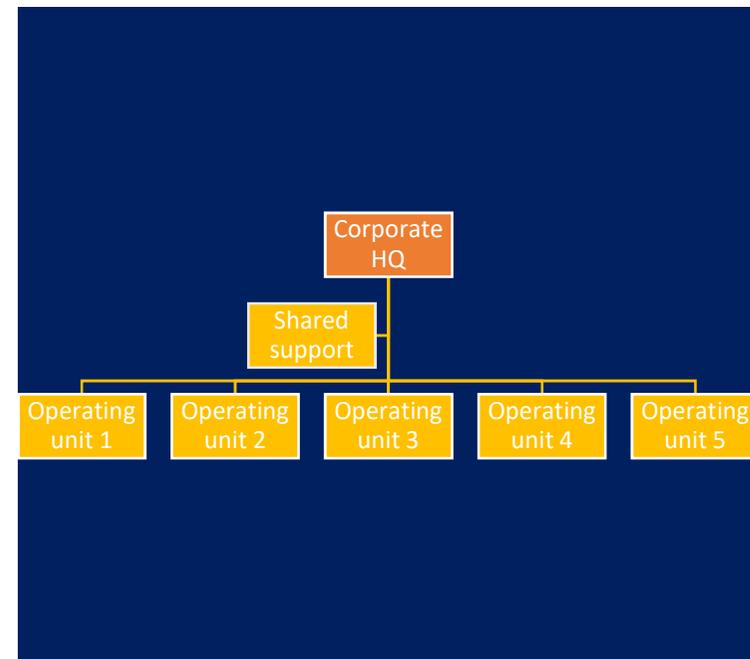
Hospital groups

Shared back office functions, QI, policy development & usually purchasing

Operating units have a high level of autonomy on business choices

Different management skills needed at the centre than in operating units

Growing rapidly in some places



Trend 2 – Hospitals as part of integrated care

- More outreach services
- Significant changes in the characteristics of the patients admitted
- The payment model will also change
- Challenges to restructure business models
- Big changes in the role of hospital specialists

New role for specialists dealing with chronic disease

- Co-producer of pathways and guidelines with patients and primary care professionals
- Educator and advisor - Keeping the system up to date with the science
- Support to specialist nurses and care coordinators
- Dealing with the most complex and difficult patients
- Taking a population health view
 - Developing and running registries
 - Identifying the highest risk patients
 - Developing population health interventions
 - Understanding the context & social environment

Rethinking: New delivery models

New outpatient models

- Advice and guidance to primary care rather than referral
- Virtual clinics and telemedicine
- Multidisciplinary clinics for symptoms
- One stop diagnosis & treatment in one visit

Hospital outreach

- End of life care
- Support for care homes

Primary care change

- Scaling up
- Standardisation
- Different staffing mix
- Increased availability of diagnostics and some treatments in primary care settings
- Shift from face to face to phone and web

Hospital Emergency Front Door

- The pattern of demand requires a different response from that common in many countries
 - Single front doors
 - More specialist emergency staff
 - Multi-disciplinary approaches
 - Ability to process large numbers in a short time
- Is the growth of standalone ER services in the USA a real thing or driven by payment models?

Planned surgical care

- Shifts to robot assisted surgery
- Increased use of interventional radiology and image guided procedures
- Factory models and stand alone centres more common

Diagnostics

- More localized imaging in the hospital
- Tertiary units will have very big demand
- Labs centralized - more POC testing

Hospitals in their communities

Hospitals are important part of their local communities

They can use this power to:

- Build the local economy
- Train and develop staff locally to fill the many workforce gaps
- Improve the lives of local citizens, patients and staff

Final words

- Significant implications from this for the internal shape of hospitals
- Also for the distribution and role of facilities across the system
- Requires planning expertise that is often missing