

UCL Medical Education Conference

**Rising to the health challenges of
the 21st century: implications for
medical education**

Tuesday June 28th 2011

John Tooke, UCL Vice Provost (Health)

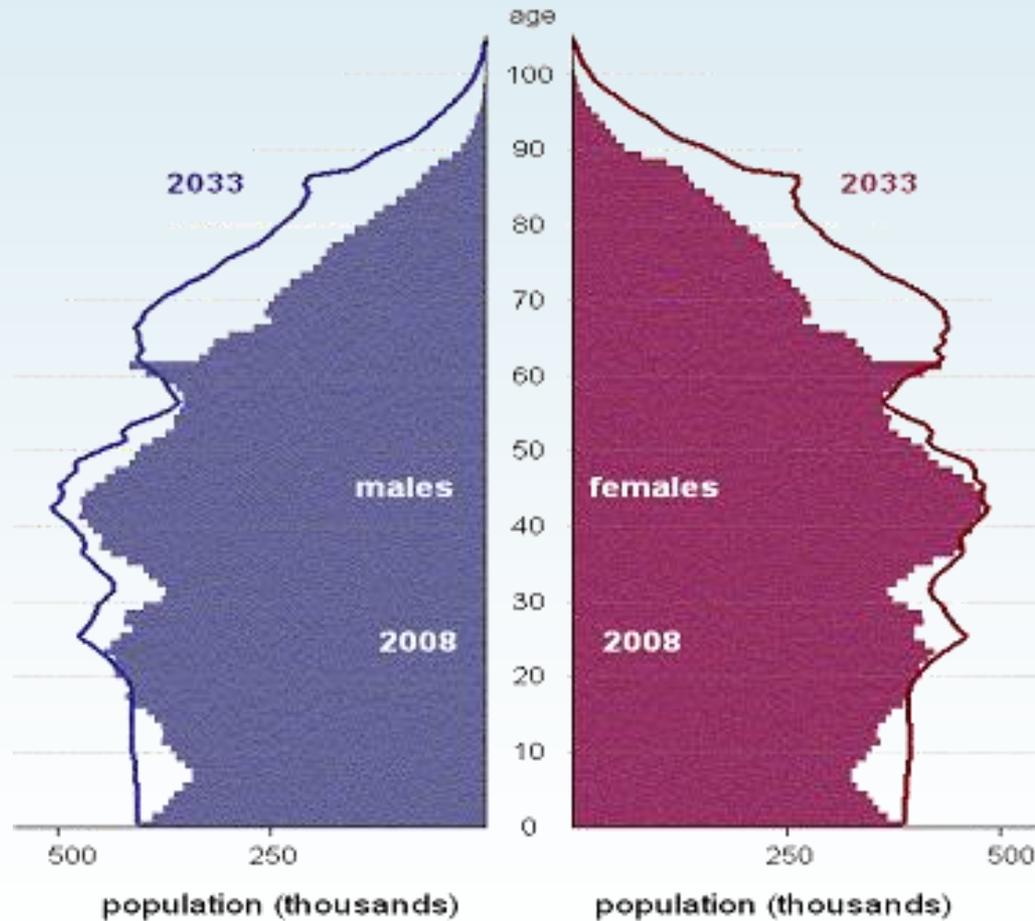
The *Future* Role of the Doctor

- A changing context
- What are the role implications?
- How well equipped are we to rise to these challenges?

Changing context

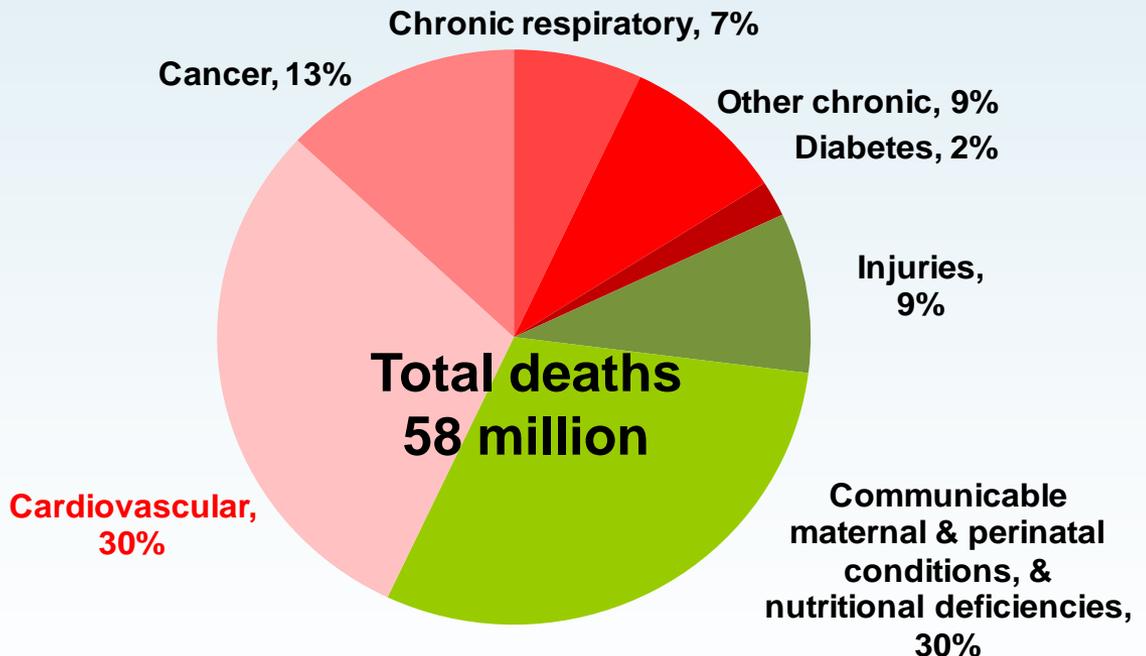
- Demography
- Economic
 - Recession
 - Tax earner : beneficiary ratio
- Technological capacity
 - Affordability
 - ethical dimensions
- Public expectation

The UK population is ageing



Projected main causes of death, worldwide, all ages, 2005

- **Cardiovascular disease, mainly heart disease**
- **Cancer**
- **Chronic respiratory disease**
- **Diabetes**



Preventing chronic disease a vital investment: World Health Organisation

- One-quarter of people aged over 85 develop dementia

Source: Audit Commission, 'Forget me not', Jan 2000

- Dementia costs the UK economy £23 billion per year. Cancer costs £12 billion, heart disease costs £8 billion, and stroke costs £5 billion

- Every dementia patient costs the economy £27,647 per year: more than the UK median salary (£24,700)

Source: Alzheimer's Research Trust, 'Dementia 2010', www.dementia2010.org

How well equipped are we?

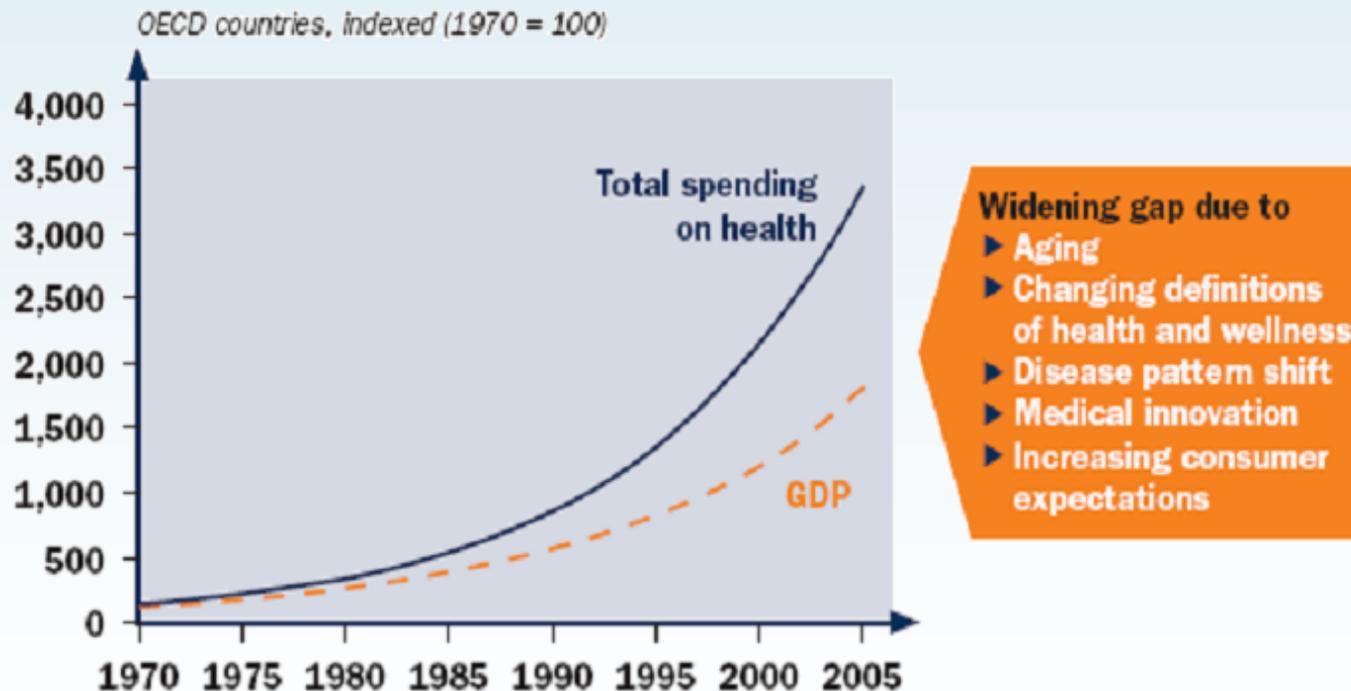
- Elderly care training?
- Dementia care?
- Care home medicine?
- Empowering people to prevent / manage chronic disease?

Technological advance

Stemming from human genome project:

- Polygenic risk profiling
- Pharmacogenomics: stratified medicine
- Pathogenesis: new molecular targets

Increasing gap between total health spending and GDP growth



Source: OECD Health Data 2006, McKinsey analysis

*McKinsey & Company, Health International Number 6,
Big Solutions for Big Problems p25*

The value of an expensive medical education will be questioned unless the contribution of the Doctor's role is understood and valued

Expeditious solutions

Role substitution

- May not be more cost-effective¹
- May erode the professional base from which the substitute derives

¹ *Bonnie Sibbald et al; Changing the skill-mix of the health care workforce; Journal of Health Services Research and Policy Vol 9 2004; S1 28-38*

But technological advance can also potentially contain costs.....

Informatics:

- personal access
- coaching
- remote sensing
- data synthesis

“The future of cellular telephony is to make people’s lives better – the most important way, in my view, will be the opportunity to revolutionize healthcare”

Martin Cooper, inventor of the mobile phone

April 2007
MMC Inquiry launched

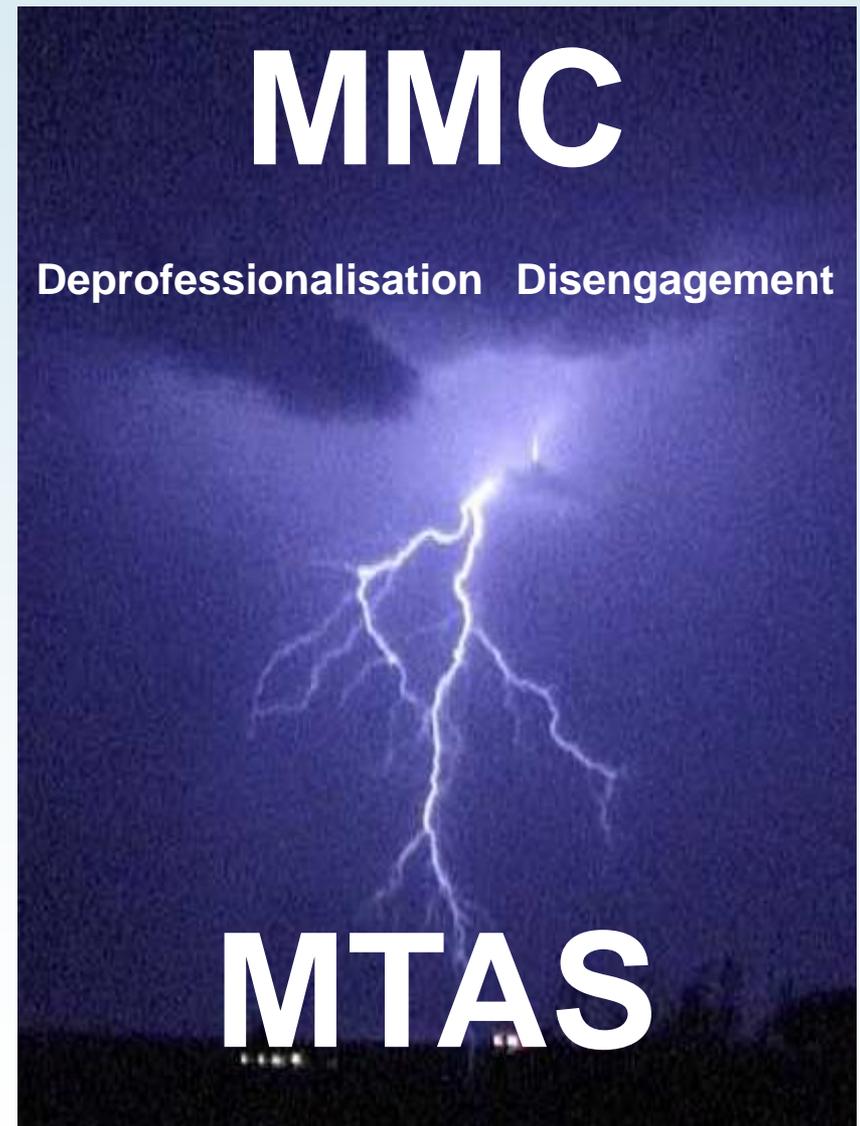


October 2007
Inquiry Interim Report

January 2008
Inquiry Final Report

March 2008
Government Response

June 2008
NHS Next Stage Review



Role of the Doctor

The MMC Inquiry revealed a lack of appreciation of the role of the doctor

Without role definition it is impossible to:

- Pursue outcome focused medical education
- Plan the workforce
- Understand what to excel at!

Role of the Doctor Conference, October 21-22, 2008



TheKingsFund >



ACADEMY OF
MEDICAL ROYAL
COLLEGES



The Association of
UK University Hospitals



A part of the NHS Confederation
working on behalf of the 

Generic attributes

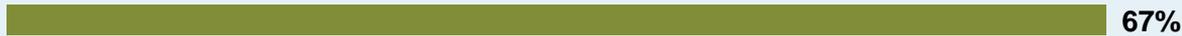
- Good communication skills
- Team worker
- Non judgemental
- Empathy
- Integrity

‘Must haves’

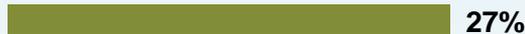
- Primacy of clinical reasoning / diagnosis
- Synthesiser, integrator, interpreter and supporter
- Capable of managing risk and uncertainty
- Capable of leadership and taking ultimate responsibility for clinical decisions

My top priority is having confidence that my doctor will achieve an accurate diagnosis of what is wrong with me

1. Strongly Agree



2. Agree



3. Neither Agree nor Disagree



4. Disagree



5. Strongly Disagree

0%

6. Don't Know

0%

YouGov Survey, 2008
N=2491

Role of the Doctor

- “All doctors must be demonstrably committed to reflective practice, monitoring their contribution and working continually to improve their own and their team’s performance.
- Doctors have a key role in *enhancing* clinical services through their positions of responsibility.”

Committed to enhancement of health outcomes

- Self improvement
- Team performance
- Education
- Research
- Management and leadership

Research awareness

- Drive for evidence based practice
- More patients in trials / Phase 4: Controlled introduction of unproven therapy
- Knowledge economy imperative

Clinical leadership

- Barriers to clinical effectiveness are context specific; 'Top down' command and control doesn't work

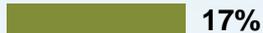
Without local clinical engagement and leadership they will not be overcome

I am happy for the clinical team responsible for my care to be led by a nurse rather than a doctor

1. Strongly Agree



2. Agree



3. Neither Agree nor Disagree



4. Disagree



5. Strongly Disagree



6. Don't Know



YouGov Survey, 2008
N=2491

Finite resources

- **Managing the tension between advocacy for the individual patient and cost effective, equitable care**

“ Within a world where the capacity to treat is growing but financial resources are finite, doctors have a duty to use resources wisely and effectively and engage in constructive debate about their use.”

There is a limit to NHS resources so doctors must consider how best to use such resources for all the patients they treat and not just the individual in front of them

1. Strongly Agree



2. Agree



3. Neither Agree nor Disagree



4. Disagree



5. Strongly Disagree



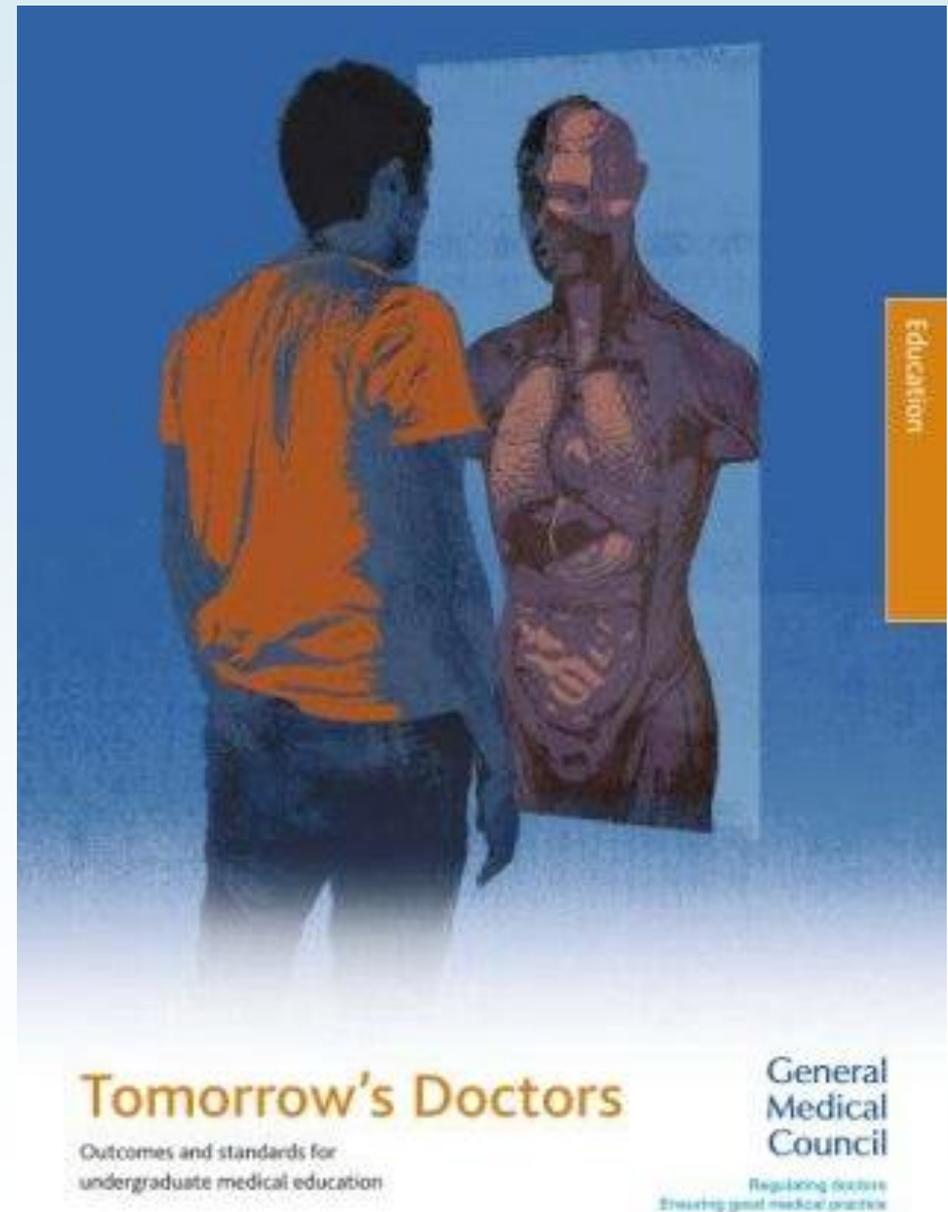
6. Don't Know



**YouGov Survey, 2008
N=2491**

**What are the implications
for medical education and
training?**

Undergraduate Medicine



Tomorrow's Doctors

- Practitioner / Scientist / Professional
- Greater emphasis on science, clinical 'capital', enhanced roles

The Role of the Doctor: Consensus Statement 2008

	Sc	Pract	Pro
• Generic attributes	✓	✓	✓
• ‘Ultimate responsibility’; uncertainty	✓		
• Personal/social impact	✓		
• Synthesise/integrate information	✓	✓	
• Empower patients, facilitate decisions	✓	✓	
• Risk/benefit/uncertainty	✓		
• Science grounding/principles	✓		
• Clinical practice grounding		✓	

The Role of the Doctor: Consensus Statement 2008

	Sc	Pract	Pro
• Research aware	✓		✓
• Reflective practice			✓
• Educational responsibilities			✓
• Effective teamworking			✓
• Commitment to 'enhancement':			
– Education			✓
– Research	✓		✓
– Service improvement	✓		✓
– Public health	✓		✓
– Advocacy			✓
– Management (resources)		✓	✓
– Leadership	✓		

Tomorrow's Doctors

- Practitioner / Scientist / **Professional**
- Greater emphasis on science, clinical capital', enhanced roles

Doctors in society

Medical professionalism
in a changing world

Report of a Working Party, December 2005

**“Social and political factors,
together with ... medical
science, have reshaped
attitudes and expectations both
of the public and of doctors.”**



Royal College
of Physicians
Setting higher medical standards

“An outrage of the most revolting kind committed in St David’s Churchyard by disinterment of the body of Elizabeth Taylor, aged 67, buried the preceding afternoon”

Trewman’s Exeter Flying Post: 16 November 1828

Implications for Medical Education and Training

- Are we equipping Medical students to enhance their contribution and aspire to excellence?
- Are we equipping them to deal with risk and uncertainty in a changing world?

Q. To what extent does medical education inculcate 'boundary pushing'?

- Risk aversion
- Research 'binary divide'
- 'Competence'

Q. To what extent does medical education inculcate 'boundary pushing'?

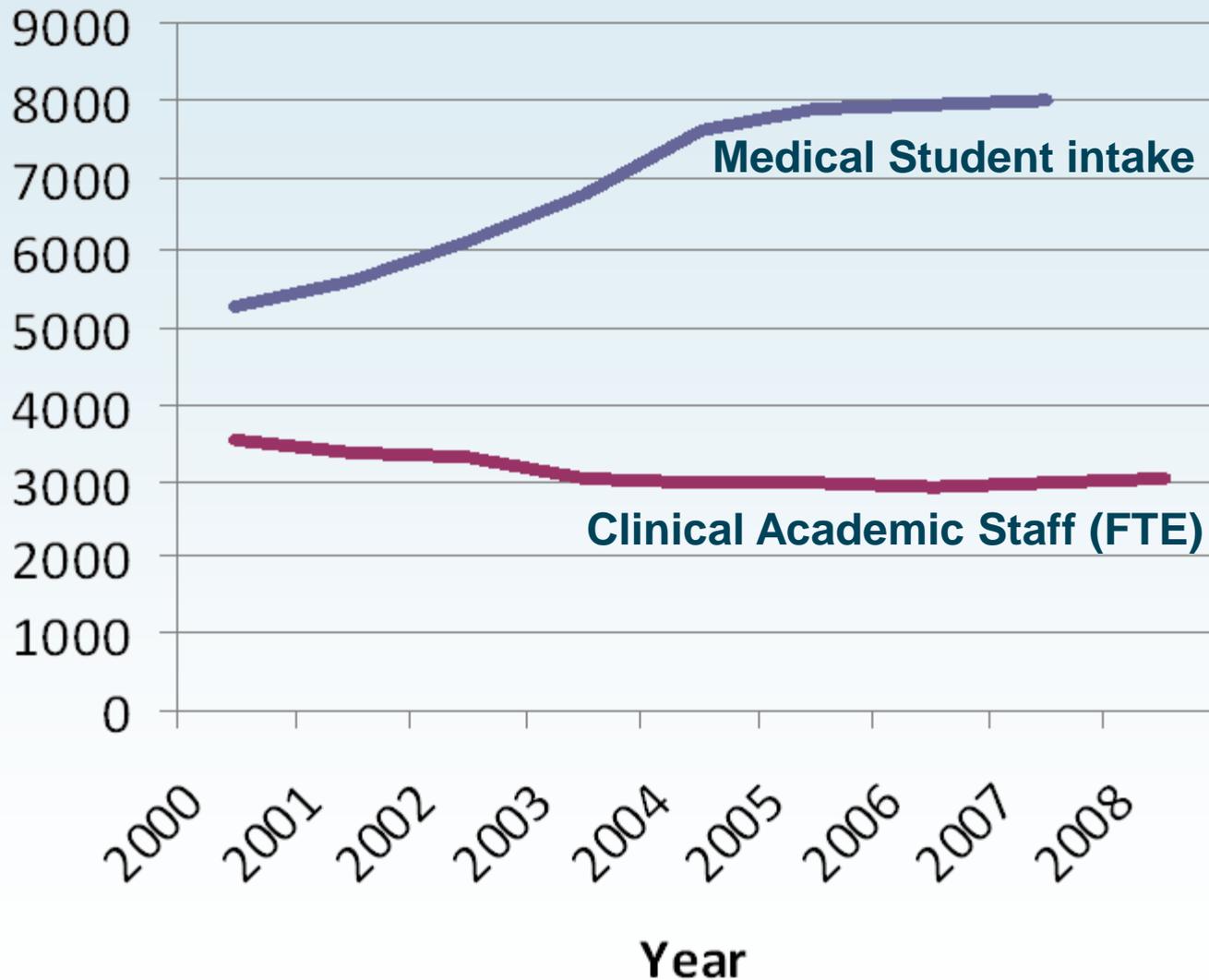
- **Risk aversion**
- Research 'binary divide'
- 'Competence'

Risk aversion

- The understandable focus on absolute patient safety diminishes the idea that medicine is inherently risky and may act as a barrier to service innovation
- It also is a barrier to earlier (supervised) clinical practice

Q. To what extent does medical education inculcate 'boundary pushing'?

- Risk aversion
- **Research 'binary divide'**
- 'Competence'



Q. To what extent does medical education inculcate 'boundary pushing'?

- Risk aversion
- Research 'binary divide'
- **'Competence'**

Competence

Modernising Medical careers – An Educational Critique

**“A reductionist model of
‘competency’ becomes the panacea for
workforce problems”**

**Talbot M. The elephant in the room:
Modernising Medical Careers – an educational
critique. *The Clinical Teacher*. 2008; 5: 14-18**

Conclusions

- The context is changing rapidly
- Role clarity is pivotal and needs to reflect society's expectations of the role
- Health policy, workforce considerations and education need to be closely aligned
- Aspire to excellence but define what that is and give practitioners the tools and environment to achieve it
- Doctors need to demonstrate leadership, embrace change and realize the value of an expensive education