American Exceptionalism and American Health Care: Implications for the US Debate on Cost-Effectiveness Analysis

Peter J. Neumann, Sc.D
Center for the Evaluation of Value and Risk in Health, Tufts Medical Center, 800 Washington St., #063, MA 02111, USA

1. INTRODUCTION

The term, “American exceptionalism” coined by the French historian Alexis de Tocqueville during a trip to the still young United States in 1835, refers to the idea that the US is different from other developed nations because of its unique origins, evolution, and institutions.1 Briefly stated and somewhat oversimplified, the idea is that Americans are characterized by their optimism, their religiosity and, above all, their predilection for personal and economic freedoms.2 The concept of American exceptionalism has been debated extensively in the academic literature – whether there indeed exists such a thing and, if so, whether it is good or bad for the US and the world.3,5 The purpose of this paper is to explore the debate over the use of cost-effectiveness analysis in the American health care system through the lens of American exceptionalism.

2. A BRIEF HISTORY OF AMERICAN EXCEPTIONALISM

The Hollywood image and caricature of the American cowboy – freedom-loving, individualistic, mistrustful of authority – animates themes De Tocqueville identified in the 1830s: in Democracy in America he noted the country’s strong commitment to liberty and egalitarianism, a streak of anti-authoritarianism and a laissez faire attitude about private enterprise. He also observed a fundamental optimism and patriotism among the people.3,5

Even today, observers point to exceptionalism in various aspects of American life. For consumers it has translated into low savings rates, higher birth rates and high rates of obesity (Figures 1-3). In business, the term conveys a commitment to competition (“cowboy capitalism”), free markets, big cars, and economic growth (Figure 4); a tolerance for seemingly outrageous executive pay and income inequality; a love of wealth; longer work hours and less vacation time (Figure 5); low union membership; less regulation; and a self-reliant – but also more litigious – people. In politics, it has meant more culturally conservative voters, and domestic policies ranging from maintenance of capital punishment, to the right to bear arms, and generally to low income taxes. In foreign policy, it has meant a country committed to spreading American-style democracy across the globe. Much of this stands in contrast to the relatively more regulated and taxed social-democratic models of Western Europe. As one observer has written, Europeans are from Venus; Americans from Mars.8

Explanations for American uniqueness have centered on the country’s distinct history. The nation was founded by a people who had no experience with a hereditary aristocracy or king who could rule by divine right.2 They brought and shaped government and institutions and implemented policies with a shared
view of equality, with less respect for social hierarchy and authority, and with a desire for liberty. Lipset has noted that key events in American history celebrate these themes, from the founding of the Plymouth colony in 1620 through the American Revolution and the move to settle the West. The principles are embedded in the Declaration of Independence (which promises individuals the right to pursue happiness), and the Constitution (with its preamble “We the People of the United States”).

As the scholar James Q. Wilson has recounted, De Tocqueville offered three explanations for the unique American character:

• That the European settlers who reached America came to occupy a vast and largely empty and isolated continent;

• That Americans have benefited from a legal system that involves federalism and an independent judiciary;

• That Americans have been shaped by a unique religious tradition that explains their persistent religiosity (the nation never had an established church and did not grant money or privileges to existing churches, leaving religion in the hands of “spiritual entrepreneurs”).

The term, American exceptionalism, is sometimes used as an expression of superiority, but more generally refers to distinctiveness, not supremacy or value judgments. Indeed, outside America there have long been mixed attitudes about the US: on one hand positive views about democracy and freedom, but on the other uneasiness with the country’s economic and military dominance and cultural imperialism. In more recent years, outsiders’ views about America seem to have soured, accelerated in the wake of the events following September 11th, 2001 and the war in Iraq (and attending measures, such as the rejection of Kyoto protocols), which have aggravated negative perceptions of America’s unilateralism and what some see as triumphant, nationalistic and empire building policies.

Cross-national surveys of the values and opinions of the public in different countries support these trends. To be sure, such surveys also reveal many similarities in attitudes between the US and other developed countries, e.g. they reveal similar egalitarian attitudes towards community affairs, and workplace and similar preferences across a wide range of technology and energy policy choices. They also reveal that every country is exceptional in some respects – Argentine, Japanese and Pakistani exceptionalism can also be found on certain issues.

However, the surveys also underscore American differences. As Kohut and Stokes recently highlighted from the Pew Global Attitudes survey in 50 nations from 2002-2005:

• Americans are more likely to believe that most people who fail have themselves to blame rather than society, and to agree with the statement that “with hard work, one can get ahead”;

• Americans are more committed to individualism, and more in agreement with the statement that children should be taught the value of hard work;

• Americans are more likely to believe that economic competition is good – over half of all Americans think economic competition is good compared with only one-third of French and one-third of Spanish people;

• Americans are more comfortable with merit-based pay, and more sceptical of employee rights;

• Americans are more likely to believe that scientific advances will help rather than hurt mankind;

• Americans are more sceptical towards the role of government and more resistant to government regulation;

• Americans are less supportive of government social safety nets than are people of the social democracies of Western Europe;

• Americans want government help in the form of unemployment insurance, social security, and some form of medical care for the poor, but value personal freedom more, and are less strongly committed than citizens of other countries to the concept that their government is responsible for taking care of those who cannot care for themselves;

• A majority in every eastern and western European country and in Canada believe that it is more important for government to ensure that no one is in need than it is for individuals to be free to pursue goals without outside interference; for Americans the opposite is true.

3. AMERICAN EXCEPTIONALISM AND AMERICAN HEALTH CARE

American exceptionalism in health care is notable in several respects, particularly the US’s high spending on health services relative to GDP, its lack of universal health care, and its relatively poor health outcomes compared to other high income nations.
High US per capita spending on health care
The US’s unusual position in health spending among developed nations is well known. Spending on health care in the US, about $6,102 per capita in 2004, or roughly 15.3% of gross domestic product (GDP), far exceeds comparable numbers in other nations (Figure 6). US health spending per capita ($US purchasing power parity) is 93% higher than Canada, 143% higher than the UK, and 821% higher than Mexico. By 2014, US spending is expected to exceed $11,000 per capita and 18.7% of GDP.12

The disparity in spending is mostly attributable to higher per capita US income and higher US prices for health care goods and services.13,14 Prices for orphan drugs, for example, are 10-30% higher in the US than in many other countries (including Canada, France, Germany, Italy, Japan and the UK), though the US has more generic competition.15 The US pays health professionals more than would be predicted by US national income. Specialists are paid $50,000 per year more than would be predicted by the high US GDP; general practitioners are paid $30,000 more and nurses $8,000 more (though US health professionals begin their careers with considerably more educational debt).16 One study reported several years ago that the ratio of compensation of US physicians relative to average earners is 4.3, compared to 2.5 for UK physicians.17 Several studies have reported that the US pays higher prices than other countries for medical procedures.16, 18 The US also pays more for health care administration and insurance.

To some extent, greater intensity of treatment in the US is also a factor. While US utilization of hospitals and health professionals (e.g. on measures such as hospital beds per capita, hospital admissions per capita, hospital length of stay, supply of nurses per capita, physicians per capita, physician visits per capita) is at or below the OECD median, the US uses more advanced medical technology and performs invasive procedures more frequently.13,19

The US has high rates of caesarean section childbirths, organ transplants, and coronary revascularization procedures.16 US acute care hospitals have more nurses per hospital bed. Compared to OECD countries, the US has far more computed tomography (CT) and magnetic resonance imaging (MRI) scanners per capita, and performs far more coronary angioplasties and kidney dialysis.19,20 Compared to the UK, the US has higher rates of kidney transplants, more coronary artery bypass surgery, higher use of drug-eluting stents, and more intensive care beds.17

Anderson and colleagues also argue that two other often-cited reasons for higher US health expenditures – supply constraints that create waiting lists in other countries, and the level of malpractice litigation in the US – contribute a small amount to higher American health spending.14

Lack of universal health insurance
Another pillar of American healthcare exceptionalism is the lack of universal health insurance coverage for its citizenry. The absence of national health insurance has long been discussed as part of the peculiar trajectory of American social policy.21

Several presidents from Harry Truman in the late 1940s through to Bill Clinton in the 1990s, as well as leaders in Congress have attempted without success to enact some form of national coverage. Observers have offered varied explanations for the failure, which stands in contrast to virtually all other developed nations. Explanations include the distinct American values, highlighted earlier, which emphasize individual rights and economic freedom and make collective polices difficult to initiate. Others have underscored the US’s “deliberately obstruction-oriented political structure”.22 One observer notes that politics have frustrated rather than reflected popular aspirations and values.21 The culprits, it is argued, are interest groups, particularly the American Medical Association, but also other well-funded groups from the pharmaceutical industry to the private insurers and benefits consultants.

Still others point more sanguinely to an American government characterized not by harmful obstructionists, but by a sensible system of separated powers and checks and balances, which makes it difficult to adopt new policies and to change old ones.2 Unlike the case in Europe, the American system impedes the adoption of large-scale reforms, whether welfare programs or social security or unemployment insurance.2 Moreover, in the US, a tradition of federalism has meant a distribution of power between the central authority and the constituent units (states), with locally elected officials. States, which compete with each other for business, often serve as innovators in policy reforms rather than the federal government.2

The other obvious dilemma for national health insurance is the fact that most Americans still have health coverage, either through private or public sources (including the Medicare programme for older and disabled Americans, Medicaid for low-income individuals, and the Veteran’s Administration for military veterans), though the erosion of private
employer-based coverage and the concomitant rise in the number of uninsured has continued for many years. Moreover, the existing safety net of public programmes such as Medicaid and the State Children’s Health Insurance Programme, as well as care provided by public and voluntary hospitals, public health clinics and others, has meant that those without coverage still receive care (though in unpredictable and substandard fashion).

**Relatively poor health outcomes**

A growing body of evidence indicates that the US performs worse on aggregate measures of health outcomes than most other developed nations, who are spending far less of their national incomes on health (Figure 7). This phenomenon seems to hold for population health measures, for technical quality of care and for satisfaction with the health system.

As Hussey et al. note, despite the often-repeated mantra that “Americans have the best health care in the world,” the actual record is mixed. In a study comparing 21 medical indicators in Australia, Canada, England, New Zealand and the US, they found that no country scored consistently best or worst overall. The US scored highest on breast cancer survival rates and cervical cancer screening rates, but relatively low on asthma mortality rates and transplant survival rates.

More worrisome, studies have reported that the US is in the bottom quartile of developed nations on measures such as life expectancy and infant mortality. The widely cited World Health Organization (WHO) report ranked the US 37th among nations on various measures of health system performance. Moreover, Banks et al. recently found that US residents are much less healthy than their English counterparts at all points of the socioeconomic status distribution. This included self-reported illnesses, such as rates of diabetes, heart disease and cancer, adjusted for age and health behaviour risk factors and biological markers.

Studies have long reported relatively low satisfaction among Americans with their health care system—though more recently such surveys indicate growing dissatisfaction in many countries. Americans report much higher satisfaction with their own doctors. Low-income Americans are more likely than their low-income counterparts in other nations to report access problems. The US is notable for reporting shorter waiting times for elective surgery, but also financial barriers to care and financial stress attributable to medical bills.

**Faster access to new drugs but more cost sharing**

The US Food and Drug Administration appears not to approve drugs for the marketplace systematically more quickly than other countries. However, evidence suggests that the US’s relatively unregulated reimbursement system has led to faster and more flexible access to new drugs in the US than elsewhere, though with significantly more cost sharing for Americans. Compared to the UK, France and the Netherlands, for example, major health plans in the US have been quicker to decide to reimburse drugs following marketing approval and to place fewer conditions on reimbursement. In terms of drug coverage, the US has higher out-of-pocket spending and greater variations in access, compared to European nations. As Cohen et al. note, at least in theory, if one’s insurer in the US does not provide coverage, one can go elsewhere for medicines; in contrast, European countries tend to make decisions at the national level and apply them across all payers. Europeans are more inclined towards monopsonistic buying power, price ceilings, reference pricing for therapeutically interchangeable drugs, and flat patient charges for drugs.

Cohen et al. note several examples of drugs not recommended by the National Institute for Health and Clinical Excellence (NICE) in England and Wales that received relatively favorable formulary placement by large health plans in the US, including interferon B; cholinesterase inhibitors (donepezil, rivastigmine; galantamine); amantadine; and oseltamivir. Moreover, in England and Wales, National Health Service (NHS) organizations responsible for purchasing health care for their local populations may hold back decisions on funding for a drug pending publication of the guidance recommendation by NICE.

Access to drugs for cancer further underscores differences. Uptake of new cancer medicines has been higher in the US than in European countries for drugs such as trastuzumab (Herceptin) and rituximab (Rituxan). Uptake of the lung cancer drug, erlotinib (Tarceva) has been 10 times higher in the US than the European average. Moreover, the US outspends Europe in terms of public funding of cancer research.

The European Agency for the Evaluation of Medicinal Products (EMEA) took 18 months to approve Herceptin, and NICE took an additional 18 months to appraise it before its recommendation for use by the NHS in England and Wales. In contrast, in the US, the FDA took 4.5 months and the Centers for Medicare and Medicaid Services (CMS) put it on formulary for
Medicare and Medicaid patients 2.5 months later.\textsuperscript{23} The UK has witnessed great controversy over coverage for Herceptin. Several other European countries, including Belgium, Germany, the Netherlands and Spain, have been reluctant to pay for the drug. In contrast, access and insurance coverage has been much easier in the US.\textsuperscript{33} Gleevec, received fast-track approval in the US but was initially rejected by NICE, as well as by the Canadian Coordinating Office for Health Technology Assessment (CCOHTA) (now renamed, The Canadian Agency for Drugs and Technologies in Health) and Australia’s Pharmaceutical Benefits Advisory Committee (PBAC), on grounds that it lacked cost-effectiveness and the potential for off-label use, though it was eventually approved without restrictions.

4. RESISTANCE TO COST-EFFECTIVENESS ANALYSIS AS A REFLECTION OF AMERICAN EXCEPTIONALISM

American resistance to cost-effectiveness analysis

Americans’ resistance to the use of formal cost-effectiveness analysis (CEA) to inform coverage and reimbursement decisions is a less remarked upon example of American exceptionalism. Unlike the case in a number of European countries, US payers have avoided using CEA openly and have adhered (at least in public pronouncements) to the notion that decisions are based on clinical evidence not costs.

The US Medicare programme’s experience with CEA provides the best example. After repeated attempts to incorporate cost-effectiveness as a criterion for covering new medical technologies, Medicare abandoned the pursuit.\textsuperscript{36} The Oregon Medicaid programme’s effort to prioritize health services offers another illustration. Oregon initially sought to rank services based on cost-effectiveness but the plan was opposed on ethical, legal and political grounds, and was implemented only after officials removed the offending cost-effectiveness provisions. Moreover, in the years since, no other state Medicaid programme has attempted to implement Oregon-style priority setting. The Drug Effectiveness Review Project (DERP), an alliance of 15 states and two private organizations, which has pooled resources to synthesize and judge clinical evidence for drug class reviews, relies on clinical, but not economic, evidence in their reviews.\textsuperscript{37} Private health plans in the US have employed many processes for managing care, but few use CEA as a formal policy tool.

Understanding the resistance

Several aspects of American exceptionalism – Americans’ distaste for explicit limit setting and mistrust of medical decisions made by organizations rather than by individual physicians and patients – may help explain the resistance to CEA in the US. In contrast, Europeans tend to hold different views about society-wide scarcity and the need to conserve and share resources.\textsuperscript{7}

After closely observing the American and British health systems over recent decades, two scholars emphasized that Americans seem to be more insistent in their personal demands and more driven to “do something” in the face of disease.\textsuperscript{17} Physicians in the UK are less apt to treat older and sicker patients aggressively and “more willing to accept death” than US physicians.\textsuperscript{17} Survey data suggest that compared to their counterparts in Europe or Canada, Americans are more concerned about access to the most advanced medical technologies.\textsuperscript{38} Added to this is a sense of entitlement among Americans about Medicare funds, a perception that in a vast and wealthy country, health resources are not really constrained.\textsuperscript{36}

Evidence suggests that US health insurers often pay for medical technologies with unusually high cost-effectiveness thresholds: the US Medicare programme has routinely covered technologies with cost per QALY ratios well above $100,000, for example.\textsuperscript{36} Private health plan formularies may do the same.\textsuperscript{39} Some survey evidence suggests that American oncologists implicitly use thresholds in the range of $300,000/QALY or higher when prescribing expensive new cancer therapies.\textsuperscript{40} In contrast, NICE has adhered more or less to a £20,000 to £30,000/QALY metric\textsuperscript{41} and Australia has applied roughly a $AUS40,000 to $AUS70,000/QALY threshold.\textsuperscript{42}

Another aspect of America’s resistance to CEA pertains to the US’s decentralized health system, in which no single entity has an incentive to think broadly about societal resource allocation.\textsuperscript{36} The pluralism of the US health care system, characterized by multiple competing health plans, weakens private organizations’ ability to use CEA. Even if it would lead to greater gains in overall health, no private payer wants to be the first to ration care for fear of risking its competitive standing in the marketplace.\textsuperscript{43}
An American trajectory for cost-effectiveness analysis

Differences in cultural attitudes, incomes, health systems and political traditions suggest a peculiar American trajectory for CEA. It seems unlikely that the US will follow the UK, Canadian, or Australian models, which use CEA openly and explicitly.44

This does not mean that American payers will avoid considerations of value. Indeed, value remains near the top of almost everyone’s agenda. However, US health officials at multiple levels will use evidence of value in quieter fashion, striving to balance fiscal concerns while avoiding the uncomfortable spotlight of accusation that they are explicitly rationing needed care.44 This will likely come in the form of incremental use of evidence and value-based review processes, with experimentation at local and regional levels, rather than development of a NICE-like organization performing CEA in the US.

Two aspects of the American debate to watch are “comparative effectiveness research” and the ever more determined attempts to use incentives to direct consumers and physicians towards better care. The Medicare Modernization Act of 2003 contained a provision on “comparative effectiveness research”, calling on the US Agency for Health Care Research and Quality (AHRQ) to conduct research on the “outcomes, comparative clinical effectiveness, and appropriateness of health care, including prescription drugs”. The idea was to strengthen the government’s role in conducting and disseminating research results on how alternative therapies compare to one another. More recently, the comparative effectiveness movement has gained momentum with several major articles and conferences calling for a major new initiative on the topic, as well as the endorsement of the idea by a key advisory committee of Congress and proposed legislation by several US legislators.45-47

The provision has become a flashpoint for larger debates about the appropriate role for government in the generation of evidence. In general, Democrats support more research for comparative effectiveness – an important subtext is that it provides a politically acceptable means by which to combat America’s high health spending through better information. To the drug industry and many Republicans, however, it represents an unacceptable extension of government’s reach. This debate will continue in the years ahead, particularly on questions such as: who would produce comparative-effectiveness information; how much funding would it require; what kind of payback could society expect for the investment; will it save the system money?

Notably, almost all of the comparative effectiveness proposals, including those offered by Democrats, omit mention of CEA. Instead, comparative effectiveness for most policy experts has come to mean an analysis based on clinical not economic grounds. That is, it addresses whether drug A offers more clinical benefit than drug B, not whether its extra health benefits are worth its extra costs. At its heart, it is still about obtaining better value: not paying for care that does not work. However, it says nothing explicitly about whether drug A’s added clinical benefits are worth the cost.46

The use of incentives to address America’s health care challenges is a second key issue – consistent with the American exceptionalism theme of market-based solutions. At many health plans there is ongoing experimentation with ever higher co-payments or coinsurance for expensive drugs and biologics, as well as pay-for-performance strategies for physicians. A number of recent papers have argued that CEA could be used not to deny care but to inform private insurers’ incentive-based benefit designs.39, 48, 49 The idea is that patients would face higher cost sharing for technologies with poor evidence of cost-effectiveness; conversely, cost-sharing would be reduced or even waived for technology with demonstrated evidence of value.

The ultimate hope among some US politicians is to encourage Medicare beneficiaries to join capitated health plans that compete for enrollees. Rather than browbeating payers to use CEA, changing the incentive structure would likely do more in the end to encourage use of the technique. In today’s Medicare climate, even if they wanted to serve as judicious stewards of society’s scarce resources, practising physicians have had little incentive to do so in the programme’s largely fee-for-service system.

The political climate for cost-effectiveness analysis

The slow decline in the percentage of Americans with private, employer-based health insurance, along with pleas from leaders of American industry for relief for employers’ mounting health care bills, have led to predictions about a new opportunity for major health care reform. The political landscape seems to be shifting in that direction too.

The use of CEA would likely receive a dramatic boost from the enactment of universal health care.
However, whether major reforms would be realized even under Democratic leadership is far from certain. Health policy experts have for years confidently agreed that the American health system is heading towards collapse, because it is indefensible and unsustainable.23 As Brown noted, “though deeply dysfunctional by most standards, the US health care system remains disturbingly stable.” Indeed, past predictions about health care reform should give us pause. A commentary in the New England Journal of Medicine in 1975 emphasized that the issue of national health insurance is “forever imminent” in America.50 While the 2008 presidential election season has witnessed health care re-emerge as a high profile topic, mentioned prominently in debates and the media, there remains a wide gulf in vision between the two parties and most voters’ relatively high satisfaction with their own care.30

Even without universal coverage, there will likely be a strong push for comparative effectiveness. Moreover, many Democrats want to revisit the most controversial aspects of the Medicare Modernization Act passed in 2003 under firm Republican control of executive and legislative branches. Receiving most of the scrutiny will be the “non-interference” clause that prohibits the federal government from negotiating drug prices, and ideas about filling the “donut hole,” which refers to the gap Medicare beneficiaries have in their outpatient drug coverage insurance.

Democrats tend to favour a strong government role, including comprehensiveness of plans in terms of scope of benefits provided, while Republicans embrace market-based solutions and personal choice.30 This would suggest a much stronger push for CEA under the Democrats. However, even some Republicans concede that even market-based solutions require information from the government. Historically, the Republicans have been the party to enact some of the most heavy-handed health financing policies, including administered pricing for hospital and physician care. Furthermore, a Republican administration proposed using cost-effectiveness analysis for Medicare in the late 1980s (the proposal was later withdrawn). It is not inconceivable to imagine a reform-minded future Republican administration as the party of CEA.

The view that health care rationing in America is inescapable has been around for a long time.17 In a recent book, which updates their 1984 analysis on the topic, Aaron and Schwartz repeat their long-held assessment that the US will be forced by sharply rising health spending to consider adopting limits.17 The authors call for “intelligent rationing” in the US and look admiringly at the UK as a kind of egalitarian oasis, even as they note British reforms in the direction of competition and markets. Explicit rationing in the US, however, is more likely the idea of the future and always will be. Most likely the US will find its own uniquely American way around using cost-effectiveness analysis explicitly, making policy changes incrementally, through choice-preserving, incentive-based programmes, reforms at the state and regional levels, and a strong role for the private sector.

ACKNOWLEDGEMENTS

I am grateful to Alison Timm, Jason Nelson, and Shirley Wong for excellent research assistance, and to Jenny Palmer, and Joshua Cohen for helpful comments on earlier drafts of the manuscript.

ABOUT THE AUTHOR

Peter J. Neumann, Sc.D., Center for the Evaluation of Value and Risk in Health, Tufts Medical Center, 800 Washington St., #063, MA 02111, USA. Tel: (617) 636-2335; Fax: (617) 636-5560, email: pneumann@tuftsmedicalcenter.org.

The author is Director of the Center for the Evaluation of Value and Risk in Health at the Institute for Clinical Research and Health Policy Studies at Tufts-New England Medical Center, and Professor of Medicine at Tufts University Medical School. The paper is based on remarks prepared for the Office of Health Economics, London, June 30, 2006.
FIGURE 1: OBESITY RATES ACROSS COUNTRIES, 2005

Obese population aged 15 or more: As a percentage of population aged 15 and above.
*Note, US statistic is for obese population aged 20 or more:


---

FIGURE 2: SAVINGS RATES ACROSS COUNTRIES
Household net savings rate as a percentage of disposable household income

FIGURE 3: BIRTH RATES ACROSS COUNTRIES

Births Per 1,000 Population


FIGURE 4: VIEWS ON ECONOMIC COMPETITION

<table>
<thead>
<tr>
<th>Country</th>
<th>% Say It’s Good</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>58</td>
</tr>
<tr>
<td>Canada</td>
<td>53</td>
</tr>
<tr>
<td>Germany</td>
<td>49</td>
</tr>
<tr>
<td>Great Britain</td>
<td>42</td>
</tr>
<tr>
<td>Italy</td>
<td>42</td>
</tr>
<tr>
<td>Spain</td>
<td>37</td>
</tr>
<tr>
<td>France</td>
<td>36</td>
</tr>
</tbody>
</table>

**FIGURE 5:** HOURS WORKED ACROSS SELECTED COUNTRIES


**FIGURE 6:** HEALTH CARE SPENDING AND GDP PER CAPITA ACROSS COUNTRIES, 2005

FIGURE 7: LIFE EXPECTANCY AND PER CAPITA SPENDING ACROSS COUNTRIES, 2005


REFERENCES


13. Anderson GF, Reinhardt UE, Hussey PS, Petrosyan V. It's the prices, stupid: why the United States is so different from other countries. Health Aff (Millwood) 2003; 22(3):89-105.


RECENT OHE PUBLICATIONS

All OHE Publications are peer reviewed by members of it’s OHE Editorial Board:

Prof A Culyer (Chairman) Institute for Work and Health, Canada and University of York
Prof C Bulpitt Imperial College School of Medicine, Hammersmith Hospital
Prof M Buxton Health Economics Research Group, Brunel University
Dr J Dixon Nuffield Trust
Prof H Gravelle Centre for Health Economics, York University
Mr G Hulme Director, Public Finance Foundation
Prof C Propper Dept. of Economics, Bristol University
Prof P Zweifel Socioeconomic Institute, Zurich University

New Guidelines for Economic Evaluation in Germany and the United Kingdom: Are we any closer to developing international standards?
Michael Drummond, Frans Rutten
November 2008
Price £7.50

The Market for Biosimilars: Evolution and Policy Options
Deven Chauhan, Adrian Towse, Jorge Mestre-Ferrandiz
October 2008
Price £7.50

QALYs versus Experience: A Perspective from Experimental Economics
OHE 14th Annual Lecture 2007
Professor Daniel Kahneman
August 2008
Price £10.00

Health Care Services and the Single European Market
Diane Dawson, Lyndsay Mountford
September 2008
Price £7.50

Challenges and Opportunities for Improving Benefit-Risk Assessment of Pharmaceuticals from an Economic Perspective
James Cross, Louis Garrison
August 2008
Price £7.50

The New Global Economics of Vaccines: will the Scientific Potential be Realised?
OHE 13th Annual Lecture 2006
Jean Stephenne
October 2007
Price £10.00

Saving Lives, Buying Time: Economics of Malaria Drugs in an Age of Resistance?
OHE 12th Annual Lecture 2005
Professor Kenneth Arrow, Sir Richard Peto
November 2006
Price £10.00

Details of all OHE publications are available from our website www.ohe.org.
The annual OHE Compendium of Health Statistics is the one stop statistical information source on population and health trends in the UK, and the changing finances and structure of the NHS.

The Compendium is compiled independently by the Office of Health Economics, drawing data together from a variety of scattered sources. The disparate data, some spanning more than 50 years, is consolidated into tables and graphs which are quicker and easier to use than most other information sources.

The Compendium contains nearly 300 easy to use, high quality tables and charts, with full commentary and explanatory notes provided.

The Compendium is available in both print and on-line versions, as a convenient desk top reference.

OHE Compendium online
On-line access provides a powerful text search facility, and enables charts, tables and graphs to be downloaded directly into Microsoft Excel spreadsheets or Microsoft Powerpoint presentations. With the online Compendium:

- Instantly access information anytime, anywhere
- Analyse, search and download charts, tables and graphs directly into reports or presentations.

Alternatively have the latest vital statistics at your fingertips with a copy of the reference book on your desk With:

- New index and easy to use content pages
- Simple to use tables of statistics
- Charts clearly showing comparable trends
- Summaries of key trends in health and UK health care provision

Prices
The price for a hard copy of the 20th Edition of the Compendium for Health Statistics is £399.00. Special rates are available for charitable and public sector organisations* upon proof of status at £89.00.

The price for a single user licence fee to the online Compendium of Health Statistics 2009, 20th Edition, including a hard copy of the Compendium is £799 + VAT. Special rates are available for charitable and public sector organisations* upon proof of status at £199.00 + VAT. Please contact Claire Devaney at OHE for further details on +44 (0)207 747 8855.

Site licences for multiple users of the on-line Compendium are also available. Please contact Radcliffe Publishing for further details on +44 (0)1235 528820.

*Charitable and public sector organisations only can purchase a single-user licence at this special rate.

The publisher reserves the right to decide whether this price applies.
As with all OHE publications, this briefing was peer reviewed by its Editorial Board and by other experts in the field and is intended to be a contribution to research and to public policy making. It does not represent the views of the OHE or of its funding body the ABPI.

**About the Office of Health Economics**

The Office of Health Economics was founded in 1962. Its terms of reference are to:

- commission and undertake research on the economics of health and health care;
- collect and analyse health and health care data from the UK and other countries;
- disseminate the results of this work and stimulate discussion of them and their policy implications.

The OHE is supported by an annual grant from the Association of the British Pharmaceutical Industry and by revenue from sales of its publications, consulting services and commissioned research.

The research and editorial independence of the OHE is ensured by its Policy Board. This OHE publication has been peer reviewed by members of its Editorial Board. Further information about the OHE, including details of these boards, can be found at [www.ohe.org](http://www.ohe.org).