Scholar's mode of presentation hinders its usefulness and may take up valuable time. Google's algorithm—which weighs the significance of articles—may be partly to blame. The quantity of search results is acceptable, but quality is often not. Using some of the subject tags in advanced mode may offer some assistance, and more precision. Because current articles are not displayed first, and cannot be sorted, downloaded, or emailed—expect to do a lot of sifting.

Still, Scholar does simplify basic searching for doctors, and it's free, like PubMed (www.pubmed.gov). For anyone not affiliated with a large medical centre or university, the ability to search for and access research material that is available free on the web is a boon.

As scientific societies and associations consider moving their journals to open access models, Google Scholar and Elsevier's Scirus (www.scirus.com/srsapp/) will likely provide a reliable gateway to this information. The most useful feature to come out this year on Google Scholar is "cited by" referencing. This free tool links searchers to other scholarly papers that have cited the paper being viewed. Scholar also provides links to local library catalogues through its library link program and through an international database called WorldCat.[7]

In searches for clinical trials and systematic reviews, Google Scholar should of course never be used in isolation. However, it is a useful addition to PubMed, Cochrane, and other trusted sources of information, such as the TRIP or UpToDate databases, or a good medical librarian. For hard to find government or conference papers, don't forget to search regular Google in addition to Google Scholar.[8]

Some basic questions remain for Google Scholar. What does Google consider "scholarly"? Will Google ever tell us exactly what is in the database? Could the Google algorithm present the most current research at the top of the results display? And how often will Google update the database?[9 10]

What do we make of Google's future? Google's past success seems predicated on a simple business principle: do no evil. Founders Sergey Brin and Larry Page are said to be interested in using Google's computers to advance the cause of medical science. Apparently, Google's data mining techniques are well suited to analysing gene sequences in the human genome project. It may even be possible for patients to "google their own genes" one day.[11]

But "do no evil" is a far cry from "do what's best for humanity." Google is still a business. However, if it wishes to do something for medicine, Google should consider creating a medical portal. Call it Google Medicine; design an interface with medical filters and better algorithms; lead to the best evidence (just don't forget to consult with librarians about where the evidence is located). This kind of all purpose tool is badly needed in medicine, particularly for developing countries.

Build Google Medicine. The benefits to human health would be immeasurable.

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Choice

More can mean less

For the NHS, 2006 might well be the year of choice. The UK government's plans for "empowering patients to play a bigger role in choosing where and who provides them with their health service" are finally to become reality.[1 2] These plans will be supported by the twin pillars of competition, and plurality of provision. To be pro-choice is clearly to be on the side of the angels, or at least the politicians. Spare a thought this Christmas, therefore, for a small group of people who insist there is another side to the argument.

In a recent bestselling business book, psychologist Barry Schwartz argues that the amount of choice on offer in life exceeds our ability to effectively exercise that choice, or even to enjoy it.[3] The debilitating effects of choice overload may be bewilderment and high levels of anxiety and stress. When a brush with illness in the United States caused health economist Rhiannon Tudor Edwards to question the value of choice in health care, she concluded that having less choice in health care is a price well worth paying for universal coverage.[4] The UK Public Administration Select Committee wisely advises caution, calling on the government to be more realistic about the role and limitations of choice.[5] The paradox of choice is that more can sometimes mean less.

Support for the concept of choice is neither universal nor unconditional. The London Patient Choice

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Project showed that, although choice of provider was indeed popular among those waiting for elective treatment, less than a third of patients eligible for the scheme were offered a choice of hospital. Two thirds of those offered the opportunity to go to an alternative hospital chose to do so.[6] And 89% of respondents surveyed by the consumer magazine *Which?* agreed that access to a good local hospital was more important than having more hospitals to choose between.[7]

Research on NHS treatment centres indicates that recent reductions in waiting times may have limited the number of patients motivated to choose faster treatment.[8] Indeed, staying with the local hospital might well be a patient's way of dealing with choice overload. Such a scenario is probably highly specific to the condition, however. In the choice scheme for coronary heart disease, half of the patients who had been waiting six months or more for heart surgery chose to go to a different hospital to avoid a longer wait.[9]

Even when patients are willing to seek treatment from another hospital, exercising choice may not be practical for all of them.[10] Will greater choice of providers by primary care services be worth having if it undermines the foundations of a system that works reasonably well at present?[11] Might increased choice be harmful or dysfunctional for certain people or groups? Certainly, unmediated choice will increase inequity because it will favour patients with access to information and transport.[12] This inequity will be magnified if patients in lower socioeconomic groups have lower expectations and less ability—real or perceived—to deal with the choices on offer.

How are patients to judge whether hospital or consultant A is better than consultant or hospital B, and by how much, if they do not have the necessary information? And too much information can be as debilitating as too little. Increasingly, patients have "to cope both with the blessing and burden of receiving a superabundance of information, often several treatment options, and the right to choose among them."[13] Furthermore, choice does not depend only on having information. It also relies on the skill of understanding and choosing between options whose probable consequences cannot be measured or even known.[14] The knowledge that they might be making the wrong decision exposes patients to additional stress.

Patients do not have a choice about choice. Current political dogma assumes that choice is inherently good, but patients may soon begin to disagree vociferously if this ideology forces their local hospital to close or disrupts established NHS services.[15] It is time to open up both sides of the choice equation to wider debate and action, recognising that both the upsides and downsides need to be managed.

The NHS should shift the focus to assisted or facilitated choice, providing experts and tools to help narrow down the possibilities to a manageable number and to offer support to those least able to negotiate their way around the service. In the early pilot projects on choice in the NHS, patient care advisers—independent of any particular provider—provided a single point of contact and helped patients through the process of choosing where to get care. Patients found this very helpful.[6] The paradox of choice needs to be managed carefully.

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Happiness

Get happy—it's good for you

Given the choice between winning the lottery and being left permanently disabled by injury, everyone would take the money. Yet a year after either of these events, people apparently return to their previous levels of happiness.[1] Such are the complexities of the state described by Aristotle as "the best, the finest, the most pleasurable thing of all." [2]

As everyone since Midas knows, acquiring riches is a poor long term bet in the happiness stakes. A recent review concluded that "money can buy you happiness, but not much, and above a modest threshold, more money does not mean more happiness."[3] Individuals usually get richer during their lifetimes—but not happier.

As for individuals, so for countries. Ghana, Mexico, Sweden, the United Kingdom, and the United States all share similar life satisfaction scores despite per capita income varying 10-fold between the richest and

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