# UCSD BIOMEDICAL ETHICS SEMINAR SERIES Ethical Reasoning in Medicine -- Or the Contrary? September 20, 2006 Beatrice Golomb, MD, Ph.D UCSD Department of Medicine

## **Presentation Summary**

#### Abstract

A disconnect, indeed a chasm, between scientific evidence and prevailing medical dogma flourishes in a number of areas of medical science, adversely affecting medical practice. Examples present and past are drawn from anthrax vaccination, depression treatment, blood pressure treatment, gulf war illness, and other domains. The disparities commonly occur in a direction that favors powerful interests. Factors contributing to the disparities, in different instances, are revealed to include grievously flawed (or fraudulent) research, selective consideration of data, purchasing of authors and ghostwriting (and "editorial support") of articles and reports by interest groups, and unreported author and journal editor conflict of interest. Backlash against persons seeking to present evidence that contradicts the dominant belief (or to focus discussion in alignment with evidence) occurred in several of the domains discussed. Where the wrong has been righted (or exposed), investigative reporting, grass roots efforts, litigation, and the internet -- domains often maligned in the scientific sphere --have often played a more vital role than scientific publication in aiding this correction. Because practice contradictory to evidence subverts the intended functions of medical science, improved approaches to rectifying (and preventing) the disparities between evidence and orthodoxy are needed. Obstacles to this correction are discussed. Although few compelling solutions are identified, one approach to enabling a stronger role for science and academics in remedying these disparities is suggested.

#### **Discussion Summary**

## The negative impact of influence -peddling on evidence-based medicine

# Comparison between pharmaceutical and tobacco industry

- Tobacco-sponsored research is generally greeted with skepticism. Why is it that the same skepticism is not extended to research funded by biotech and pharmaceutical companies?
- It shouldn't be assumed that all company-sponsored research is compromised. In England, for example (where speaker had industry experience), sponsoring companies standardly did not look at the data or comment on the analysis provided. Of course, companies do often reanalyze data to find outcomes favorable for them. However it is important not to tar the entire industry with the same brush. Some companies are bad, others not.

- Question how do you differentiate the companies and industry groups that are honorable from those that are not?
- What strategies might address the problem of conflict of interest in industry-sponsored research? One suggestion is that medical research adopt the model of the health effects group in the auto industry. There research money is pooled, with no individual company money supporting a given research project. This provides one way around the problem.
- Has anyone looked at funding directed not only to the individual researcher, but also to department, lab or adjacent personnel? This was an issue addressed in an essay on "the kept university" in *The Atlantic Monthly* some years ago.
- Not all influence exercised over medical research involves money. Not all conflicts of interest arise from payment.

# Less obvious areas of influence-peddling

## Ghostwriting

Lots of science literature is ghostwritten. Instances of paid writers not the PI or research team writing up the data, doing the papers. Many of these ghost-written papers are disguised marketing for particular drugs or devices. May explain why the data doesn't support the claims.

- Industry sponsorship of CME education Industry- sponsored conferences and CME activities increasingly common. Is biased CME better than no education at all?
  - Rationale for such sponsorship There are hundreds of small medical meetings, many of which couldn't occur without industry support. These provide informative sessions for those who care to attend.
  - Reply: Neuroscience and other fields have conferences and educational programs with no industry sponsorship. Outside medicine, this is quite common, with registration fees far lower than typical of medical conferences. Why can't this be done in medicine? As it is, industry sponsorship often extends to the selection of speakers, panel creation, etc.

## • Free pens

Social science studies suggest the effectiveness of even very small gifts. Free logo-identified items such as pens and pads have a demonstrable effect on prescribing patterns, formularies and so on.

• "I'm not influenced by drug reps or freebies."

Physicians generally seem themselves as objective, "scientific," able to discount the effects of marketing, sponsorship, free trips and other "goodies."

• Reply: Isn't this naïve? The effects of advertising, face-to-face time, free lunches and other perks are obvious to the drug companies who provide them. These effects are well-known not only to social scientists and marketing executives, but among the general population. Even children acknowledge their "brand loyalty." Why are doctors assumed to be exempt from influence peddling?

### Resistance

• Where are the sites of struggle? What are the forces in the medical profession and in society that can help with this issue? With Congressional investigation and questions about conflicts of interest at NIH, the FDA, and the Institute of Medicine (IOM) something needs to be done.

#### Recommendations

Should public funding of medicine change to emphasize evaluative science rather than basic research? If medicine is to be truly "evidence-based," then outcomes of all studies need to be publicly disclosed. Treatments that are not validated should be replaced. Such a strategy might also help to limit unnecessary medical costs.

• Other suggestions to counter industry influence

Litigation

Grass roots activity

Patient and other advocacy groups

Appeals to the FDA as watch dog

Investigative reporting

Good people: right person in a good position can often make a difference.

It was noted however that we need groups who are committed to the evidence not just advocating against the "party line." Opposition groups can themselves become entrenched, blind to the evidence.

Might we have scientific data evaluated by specially trained methods people rather than peer colleagues who themselves often have conflicts of interest? The problem is to find reviewers and data analysts sufficiently versed in the field under examination to serve as experts, but who do not themselves have a stake in outcome.

## Concluding discussion

How best to respond to the current situation? Keep in mind the goal of having evidence drive study reports, publication, and clinical guidelines. Aim of replacing received opinion with evidence.