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Marketing the Research Missions of Academic Medical Centers: Why Messages Blurring Lines Between Clinical Care and Research Are Bad for both Business and Ethics

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Abstract

Academic Medical Centers (AMCs) offer patient care and perform research. Increasingly, AMCs advertise to the public in order to garner income that can support these dual missions. In what follows, we raise concerns about the ways that advertising blurs important distinctions between them. Such blurring is detrimental to AMC efforts to fulfill critically important ethical responsibilities pertaining both to science communication and clinical research, because marketing campaigns can employ hype that weakens research integrity and contributes to therapeutic misconception and misestimation, undermining the informed consent process that is essential to the ethical conduct of research. We offer ethical analysis of common advertising practices that justify these concerns. We also suggest the need for a deliberative body convened by the Association of American Medical Colleges and others to develop a set of voluntary guidelines that AMCs can use to avoid in the future, the problems found in many current AMC advertising practices.

Keywords

Academic Medical Centers; advertising practices; marketing, science communication; clinical research; therapeutic misconception; informed consent

The intertwined missions of patient care, health professions education, and research,¹ all of which seek to improve the well-being of communities, establish Academic Medical Centers (AMCs) as a central component of our nation's health care system. The interdependent

commitments to both education and research in pursuit of quality health care is what makes them “academic,” and thus distinctive in our health care system, underscoring the need for AMC leaders to continually seek ways to grow their learning and discovery efforts. Doing so in ethical ways has become increasingly difficult in light of the health care system’s ever-growing reliance on market forces. Whether competing for the business of individual patients or the health plans that insure them, AMCs must appeal to consumers and their health care needs and expectations, in efforts to sustain and grow market shares. In this environment, AMCs, like other health systems, have increasingly turned to marketing.^{2,3}

The Challenges of Responsible Advertising in a Competitive Environment

Herein lies a substantial challenge. AMCs must compete against rivals who do not share the burdens of extensive education and research missions (the presence of medical students in the examination room, care delivered by a resident physician, or a faculty expected to conduct clinical research), none of which are necessarily seen as advantageous by health care or insurance consumers. Even with these challenges, AMCs must appeal, as their competitors do, to the health care sensibilities of individual consumers. AMCs commonly do so by claiming an institution’s research places it at the forefront of efforts to improve healthcare. This invites potential patients to infer not just that an AMC’s practitioners have superior clinical skills but that the AMC offers more effective tools for treating disease, even when such an inference may not be warranted.

For example, imagine you are reading an article online and click a short video ad for your local AMC. It shows an apparently healthy person doing an everyday activity. The voiceover explains that this activity was previously impossible for the person shown, but that thanks to a medical intervention provided in a clinical trial—described as “the first of its kind,” “innovative,” or “pioneering”—the person’s abilities and quality of life have been restored. The ad is heavily branded with the identity of the AMC; it includes the patient saying how that AMC gave her back her life, or gave him the gift of more time with loved ones. The implication is clear: cutting-edge research at the AMC is restoring lost abilities and saving lives. This example is a composite of actual elements frequently used in AMC marketing campaigns, and many readers of this journal will recall similar ads from their own institutions.

It is not surprising that we encounter such AMC ads; given the commercial benefits that can accrue from them,⁴ ads are commonly designed for broad appeal. According to a study of print advertisements, AMC ads often (53.3%) promote specific clinical units like cancer centers that can have high volumes of clinical trials.⁵ A *New York Times* article describes various tactics that multiple cancer centers have, like other units, used in their campaigns:⁶ tout “innovation,” champion their “pioneering” physicians, highlight patient testimonials, and rely on single anecdotes rather than clinical data to persuade people of the merits of a given center.

These kinds of ads are troubling on two fronts. First, due to their lack of balanced information about research, they are an instance of irresponsible science communication and thus undermine research integrity.⁷ Second, they go against the Association of American

Medical Colleges' (AAMC) own standards about the ethical conduct of research. These standards are reflected in a public assurance about ethics and research made by the AAMC in 2000 when the nation's medical schools were among more than 300 academic, scientific, and patient health organizations that issued "Clinical Research: A Reaffirmation of Trust Between Medical Science and the Public."⁸ This "reaffirmation of trust" followed widely publicized research ethics lapses in the late 1990s, and was issued to show the public the signatories' commitment to conducting research responsibly. Among other things, the signatories affirmed that research volunteers "have a right to expect that they be treated with beneficence, justice, and respect." Most relevant to our purposes, however, was that signatories also pledged themselves to ensuring that "patients understand that research procedures are not necessarily treatment and, in given instances, may not benefit themselves in any way and may possibly harm them," an implicit recognition of the important ethical dimensions of science communication implicated in the informed consent process for clinical research.

To explore these concerns about AMC marketing practices, we highlight major ethical issues in science communication and research ethics that are frequently implicated in marketing campaigns, explain why more careful review of them is required if AMCs are to honor critical ethical standards while communicating about and conducting their clinical research, and suggest a way that AMCs can better fulfill the promises they made in the 2000 reaffirmation of trust.

Why We Need to Recognize that Ads Can Influence Informed Consent

Our ethical concerns originate in the fact that ads touting research can have a detrimental spillover effect on individuals who may later be recruited into clinical trials. The major aim of such ads is to steer people to an AMC, rather than another hospital, by suggesting that the AMC offers distinctive care because of its research mission. Granted, care can be distinctive in any number of ways. For example, it can be distinctive because all standard care services are available under one roof or because the hospital offers a broad range of ancillary services, such as nutritional or psychological counseling, in addition to standard care. However, these characteristics are not unique to AMCs. What is most likely to be distinctive about AMC units that conduct clinical trials (e.g., cancer centers) is access to clinical trials frequently not available at other centers in the same geographic area. Thus, advertising an AMC as offering special health benefits encourages the obvious inference that clinical trials conducted there confer these on patients.

One upshot of such advertising, if it actually steers someone to an AMC who otherwise would receive care elsewhere, is that they end up at a clinical unit that is conducting research in which they may be asked to participate. When this occurs, prospective research participants have seen ads that blur the lines between proven medical care and clinical investigations. This potentially undermines the informed consent process which, we are reminded by the Nuremberg Code, is "absolutely essential" to the ethical conduct of research and whose centrality to ethical research the "reaffirmation of trust" signatories celebrated in 2000.

How Ads Can Impact the Informed Consent Process

To understand how ads can blur lines between medical care and research, and why this blurring threatens informed consent, it helps to think about advertising in light of the health literacy context in which advertising occurs, as well as in light of existing problems with informed consent. Most people fail to understand health care information: the first National Assessment of Adult Literacy found that only 12% of the US population was “proficient” in health language.⁹ Only 53% had “intermediate” literacy, while 35% were rated as “Basic” or “Below Basic.” Thus, people who are “non-proficient” with health language are likely in the majority of those reached by ads that steer people toward clinical settings where research is routinely conducted. Furthermore, even the minority of “proficient” people live in a culture permeated by an understanding of medicine based on a narrative of progress and continual improvement. Thus, they will favorably interpret terms like “pioneering” or “innovative,” when attached to “care” or “physician.” Otherwise such terms would not be so prominent in campaigns, nor would campaigns cast past research advances as dispositive of future ones in order to influence current patients.

One might contend that the informed consent process will protect people from any worrisome misunderstandings stemming from ads. One could assume such broad protection across the population, however, only by ignoring the fact that informed consent is an ill-suited decisionmaking model for the many candidates for clinical trials who prefer guidance from professionals in their decisionmaking.¹⁰ By their nature, such individuals want to be influenced by others and thus may feel reassured by the kinds of marketing efforts that concern us. So, we ought not underestimate how many people can be swayed by AMC advertisements.

Some might still object that AMC advertising cannot threaten informed consent, even for patients who seek strong guidance, because it occurs so early in the decisionmaking process. Patients who see AMC ads and ultimately consent to some clinical trial will have plenty of relevant information presented to them between seeing the ad and consenting to any particular trial. We think this objection is contrary to the Food and Drug Administration’s (FDA) view that first impressions regarding research can affect subsequent deliberation about it. That is why the FDA considers the direct advertising of clinical trials, not the presentation of an informed consent form and discussions guided by it, to be the start of the informed consent process.¹¹

We are making a logical extension of the FDA’s reasoning by suggesting that therapeutic misconception and misestimation can begin antecedent to a formal informed consent process. Therapeutic misconception refers to the documented difficulty people have in understanding the difference between clinical practice and investigation and what that difference means for their own care.^{12,13} Therapeutic misestimation refers to the documented tendency people have to inflate the potential benefits of clinical research.¹⁴ Given the prospect for antecedent therapeutic misconception and misestimation, it makes no difference whether the first impressions are the result of an advertisement about a specific trial or the result of a more general advertisement for the services and providers at the AMC where the trial is being conducted. Since AMC advertisements that promote “innovative”

and “cutting edge” care are both sanctioned communications from the hospital and implicit endorsements of the clinical research they routinely conduct, they provide powerful and authoritative initial information about research. It is only reasonable, therefore, that consumers hold AMC advertisements in the same regard as the other institutionally sanctioned information that patients can draw upon in deciding about potential research participation.

Another objection is that AMC ads that tout research are meant to serve as patient education.¹⁵ When the American Hospital Association issued its first guidelines on appropriate advertising in 1977, two of the supported reasons for advertising were “public education about available services” and “public education about health care,”¹⁶ both of which remain a justification for hospital marketing today.¹⁷ “[P]roponents of hospital advertising emphasize issues of choice, access, and empowerment for their consumers, the potential patients.”¹⁸ Even when not pitched outright as education, marketing is sometimes presented as a service to patients that helps them better understand and discriminate among the range of services available.¹⁹

The problem with this line of thought is twofold. First, one ought not assess the ethics of advertising just by looking at what an ad’s sponsor intends to convey. Given an AMC’s dual responsibilities to communicate accurately about research and to assure ethically valid informed consent, one must show equal regard for what ads can come to mean in the minds of research candidates, and thus how ads can later influence their decisionmaking. Second, advertisements by definition are meant to promote a product rather than educate. As such, they do not, and are not expected to, expound on risks, uncertainties, limitations, or alternatives to the treatment being touted.

Some minimize the extent to which ads influence decisions by contending that use of words like “innovative” are not problematic because “advertising is simply not a superpowerful entity”²⁰ controlling patient decisions. However, ample evidence shows that even important choices such as those about health care and treatment can be influenced by very minor, nonrational factors that become part of what is known as the “frame effect” of decisionmaking. This refers to how people’s feelings about the source of information influence their evaluation of it.²¹ James Wright and his co-authors explain that “beyond what patients read about the risks and benefits of a research protocol, other beliefs about the people requesting their participation will influence their decisions.”²²

In addition, many terms carry linguistic biases. Amos Tversky and Daniel Kahneman famously showed that decisions to undergo a medical procedure can be influenced by whether the risk is cast in terms of “survival” or “mortality” rates.²³ More recently, a study was conducted on the influence of “default options” on actual medical decisions. Seriously ill patients who were filling out advanced directives were sorted into three groups and assigned forms with different options set as the default choice. They were more likely to choose the default option regardless of what the default option was.²⁴ Another example of such nonrational influence comes from an experiment regarding health insurance plans on government exchange websites.²⁵ On those websites, plans were grouped into categories of “bronze” (low premium, high out-of-pocket costs), “silver,” and “gold” (high premium, low

out-of-pocket costs). People tended to have a higher preference for “gold” plans. However, when the naming strategy was reversed (“bronze” having high premiums and low out-of-pocket costs and “gold” having low premiums and high out-of-pocket costs), people still preferred “gold” plans.

Such evidence provides ample reason to think that ads can confuse patient perceptions of care by blurring clinical care and research. People exposed to AMC ads like ones the authors have firsthand knowledge of that claim, for example, that an AMC’s cancer center is someone’s “best hope for a cure” or that “your life is worth the trip” to a distant AMC, will struggle to understand the difference between standard care and experimentation, as well as the therapeutic prospects of research. They will find themselves in a clinical setting where they have been assured, through ads common to AMCs that employ unrepresentative patient narratives or euphemistic terms like “innovation” and “pioneering” rather than the more forthright ones like “research” or “experimentation,” that this institution provides the best care available. All of this can corrode the informed consent process and thus diminish the careful deliberation about research participation that AMCs are responsible for encouraging in their research candidates.

Second, even if one were to ethically assess ads simply on the information they convey, rather than their subsequent influence on decisionmaking, there is still an ethical obligation to provide balanced information about clinical research.²⁶ This balance is lacking in the kinds of ad campaigns we are highlighting: heart-warming success stories fail to make clear, for example, that the treatments often described are experimental and ads are also unalloyed by any talk of risks; they also fail to mention that only about 15% of the drugs and devices studied in clinical trials eventually achieve regulatory approval, a figure that drops to 5% for the Phase I oncology trials at cancer centers.²⁷ This last point is especially noteworthy in light of a recent study that showed that therapeutic misestimation occurred among 94% of participants in a Phase 1 trial.²⁸

Striking a Better Balance Between Marketing Needs and Responsible Communication

Despite our concerns about AMC marketing campaigns that highlight research, we want to be clear that we are not suggesting that all AMC advertisements are problematic. Our concerns are directed only at AMC advertisements that are directly at odds with the 2000 Reaffirmation of Trust statement that stipulates that people should understand that research “may not benefit themselves in any way and may possibly harm them.” This pronouncement suggests that AMCs should look for ways to disrupt the impediments that therapeutic misestimation and misconception pose to ethically valid informed consent, yet if our analysis is correct, their marketing strategies too often reinforce instead.

No doubt this arises from there being no requirement that advertising campaigns undergo any type of prior ethics review like those required for ads that recruit for individual clinical trials. Institutional Review Boards (IRB) must determine that such advertisements do not involve undue influence, that potential benefits stated in them are consistent with those spelled out in informed consent forms, and that investigational drugs should not be

advertised as a “new treatment” or “new medication.”²⁹ Since there is no comparable oversight of marketing campaigns, AMCs will often lack the expertise that builds over time among IRB members that leaders could draw upon to help them recognize the extent to which marketing campaigns comport with an institution’s science communication and research ethics responsibilities. In such circumstances, a way forward is needed to remedy the situation.

What we think would be most beneficial in combating the excesses in marketing that highlights research is for AMC leaders, through their professional organizations, to grapple with how they can best strike a responsible balance between the critical monetary needs of their organizations and their equally critical obligations to communicate about and conduct research ethically. Thus, we propose that the two major organizations that shepherd our nation’s AMCs, the AAMC and the Association of Academic Health Centers, convene a deliberative process that will develop a set of voluntary guidelines AMCs could rely upon to assure ethically responsible marketing campaigns that highlight, either directly or indirectly, their research missions. These two organizations could partner in this effort with others, such as research sponsors, clinical trialists, and research participant advocates, to ensure representation and participation by important constituents in the process.

This process could draw upon many resources: recently published guidelines by the International Society for Stem Cell Research that address responsible science communication,³⁰ commentary by the Presidential Commission for the Study of Bioethical Issues that addresses hype in science,³¹ and the “Charter on Professionalism in Health Care” that emphasizes the promotion of health literacy and the commitment to ethical business practices.³² Numerous publications also make relevant recommendations about hospital marketing of clinical care.^{33–35}

Adequate guidelines should reflect the intrinsic ties between AMCs’ marketing messages about their research, and the future informed consent for research of individuals exposed to those messages. This includes following Lisa Schwartz and Steven Woloshin’s advice to distinguish between appropriate and inappropriate uses of persuasive marketing approaches, and to classify as “inappropriate” any ads with references to unproven or experimental procedures that blur their difference from quality care.³⁶ Further, the guidelines must account for the “typical patient’s combination of vulnerability and inequity of knowledge,” and how this places the marketing of medical knowledge and services into a category distinct from that of other consumer goods or services.^{37,38}

The guidelines should also stipulate internal review processes or other mechanisms that will help assure appropriate content in all advertising that highlights an institution’s research mission. This approach would signify that AMCs can place the fulfillment of ethical responsibilities intrinsic to their research mission on par with their commercial interests. It would also bring new substantive content and enumerated responsibilities to the AMCs who signed the 2000 Reaffirmation of Trust, and thereby strengthen their commitment to ethically communicate about and conduct research. Absent these basic features, the proposed guidelines will gain no traction against the interrelated problems caused by the ubiquitous hype and therapeutic misconception and misestimation that drive our concerns.

Though implementing new guidelines would no doubt represent new constraints on AMC's marketing efforts, we think constraints are needed, though they need not be as onerous as some may fear. The guidelines would permit AMCs to employ marketing strategies that highlight the value of their research and celebrate their successes while also establishing needed safeguards. Recall that the point of AMC marketing campaigns is the protection and promotion of the multiple missions of AMCs. Irresponsible campaigns can undermine or jeopardize those missions because misleading and ethically irresponsible advertisements tarnish the reputation of AMCs by calling into question their commitment and ability to meet the high ethical standards of research they agreed to in the 2000 Reaffirmation of Trust. The guidelines we envision should help prevent irresponsible marketing and thereby serve as a critical safeguard of the trust and goodwill that AMCs require, both from clinical research volunteers and the broader public, for their research missions in the first place.

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