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What do Canadians think about physician–pharmaceutical industry interactions?

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ABSTRACT

Background: Many health professional and regulatory groups have guidelines for identifying, disclosing and managing potential conflicts of interest (COI). The opinions of the Canadian public regarding what constitutes COI are unknown.
Methods: Bilingual telephone survey in all provinces using a validated questionnaire on public opinions on physician–pharmaceutical industry interactions (POPPII). Adults 18 years or older were contacted using random digit dialing (RDD) with representative national sampling of households. Results were analyzed for predictors of opinions and were compared with the reference COI guideline. Two follow-up focus groups were held.
Results: 1041 participants (56.8% female, mean age 52.6 years (SD 16.5), 18.2% francophone, 57.7% with post-secondary education) completed the survey. 34.0% reported a prior concern about physician–pharmaceutical industry relationships. Acceptability of interactions varied from high for requesting information about a particular drug or small gifts of obvious educational value to the patient, to mixed for free meals to listen to pharmaceutical industry personnel or payment to attend a conference, to low for research recruitment fees, personal use of medication samples or for using information not yet public about a new drug to make investment decisions. Age of the participant influenced ratings of acceptability. There was reasonable agreement (>60% participants) with only half of the related reference COI guideline statements.
Conclusions: Public opinions on physician–pharmaceutical industry interactions differ depending on the scenario but suggest a significant level of concern regarding interactions involving direct financial benefit to physicians.

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1. Background

Physicians are the main determinant of prescription drug use, predominantly through their role in prescribing for patients, secondarily by working with the pharmaceutical industry or by advising drug regulatory or reimbursement committees. Information originating from the industry is frequently presented as part of continuing education, research or patient-led advocacy, making it more difficult to detect any potential bias [1–4]. A recent survey of United States physicians found that 94% had some type of interaction with drug companies, mainly involving free food and beverages and medication samples [5]. Although many clinicians deny the influence of gifts from the pharmaceutical industry , social science research suggests that all gifts, even small (pens and golf balls to meals and textbooks), hold powerful influence in the spirit of reciprocity [6]. No high quality studies have investigated the correlation of patient care quality and the level of interaction with pharmaceutical companies across a broad group of healthcare professionals. Existing studies do suggest that interactions with the pharmaceutical industry can have a negative effect on prescribing patterns and result in increased health care costs but that disclosure of financial ties does not itself change behavior [7,8].

Conflict of interest (COI), defined as "a set of circumstances that creates a risk that professional judgment or actions regarding a primary interest will be unduly influenced by a secondary interest", is one of the most frequently cited ethical issues related to physician–pharmaceutical industry interactions [1]. Many regulatory, medical professional and academic organizations in Canada and abroad have COI guidelines, each based on principles that a low financial threshold exists beyond which COI may be a problem, and that full disclosure of potential COI is mandatory [9–23]. The guidelines invoke "an inevitable erosion of public trust which is fundamental to our patients and society" as a key reason for avoiding COI [19]. Academic institutions, in particular, struggle with the issue of COI since many of them and their faculty members receive financial support for research and education or own equity in drug companies [24–26]. The pharmaceutical industry itself has COI guidelines, which become more restrictive with each update [27,28].

All industries in a free market transmit information and promote the use of their products by advertising, including personal interactions [29]. Since promotion is regulated, many believe that physicians and their patients benefit more from the transmission of information than they are harmed by any undue influence or COI [30,31].

Only recently has the engagement of public opinion and public participation in health policy-making been recognized as important to ensure public trust and the credibility of the healthcare system [32–34]. Our systematic review of the literature on public perceptions of physician–pharmaceutical industry interactions failed to reveal any study examining the opinions of the Canadian general public [35]. Much of the literature from other countries focuses on the notion of 'acceptability' of specified physician–industry interactions [34]. Public opinions could have direct impact on the policies of Canada's public drug programs and professional organizations, which already seek to involve the public more directly in their decision-making.

The objective of this study was to determine the opinions of the Canadian adult public on the acceptability of various levels of physician–pharmaceutical industry interactions, and compare them with the standard physician code of ethics.

2. Methods

The study was approved by Hamilton Health Sciences Research Ethics Board, # 09-448 and the York University Research Ethics Board # 2009-253.

2.1. Survey development

The Public Opinions on Physician–Pharmaceutical Industry Interactions (POPPII) survey was previously developed based on a systematic review of the literature, COI guidelines and consultation with COI bilingual translation experts and validated using a series of cognitive interviews [8]. This process identified 5 main themes influencing public perception of acceptability of interactions – benefit to patients, benefit to physicians, monetary value of an interaction, public visibility of the interaction, and context of the interaction. The finalized English version was translated to French including the full 21 page telephone interview script. A second expert reviewed both versions for accuracy. The final POPPII survey covered (a) opinions on the acceptability of 15 situations including gifts, talks, research, free medication samples and early investment information, (b) familiarity with COI, (c) extent of personal/family interaction with the healthcare system and the pharmaceutical industry, and (d) demographics. Scenarios for acceptability were vetted by clinicians and leaders of professional COI guidelines, to ensure that they were common and realistic within current practice and guideline restraints.

2.2. Participants

The sample was designed to represent the adult population of Canada (adults 18 years of age or older who speak English or French), and reside in private homes. All 10 provinces, but not the territories, were included, with representation in proportion to population. Potential participants who were not fluent in the two main languages, had cognitive impairment, or who were physicians, nurses, pharmacists or ever employed by the pharmaceutical industry, were excluded. The sample size was set at 1000 Canadian residents to allow the proportions to be estimated with an accuracy of $\pm 3\%$, with 95% confidence.

2.3. Telephone interview

A leading national university-based telephone interviewing institute ran the interviewing process including programming the computer-assisted telephone interviewing (CATI) software (Computer-Assisted Survey Execution