

Message framing for smoking cessation: The interaction of risk perceptions and gender

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Because quitting smoking is clearly linked to preventing health problems such as lung cancer, research on health message framing based on prospect theory suggests that gain-framed messages (i.e., emphasizing the benefits of quitting smoking) would be more persuasive in promoting cessation than loss-framed messages (i.e., emphasizing the costs of continuing to smoke). However, because women tend to anticipate greater perceived risk from quitting smoking than men, this may affect how receptive they are to specific message framing interventions. Data from 249 participants (129 females, 120 males) in a clinical trial of message framing for smoking cessation with bupropion were used to examine how gender differences in perceptions of the risks associated with quitting influence the effects of framed interventions using number of days to smoking relapse as the criterion. Perceived risk of quitting scores were dichotomized using a median split for the entire sample. Women reported a higher perceived risk of cessation than men. Participants who anticipated high risks associated with quitting smoking reported fewer days to relapse. Further, females in the gain-framed condition who reported low perceived risks of cessation had a greater number of days to relapse, as opposed to females in the loss-framed condition. These findings suggest that message framing interventions for smoking cessation should consider the influence of gender and risk perceptions associated with quitting on the effectiveness of framed interventions.

Introduction

Prospect theory describes the nonlinear relationship between gains and losses in objective outcomes and one's subjective reactions to them (Tversky & Kahneman, 1981). The framing implications of prospect theory suggest that individuals respond differently to factually equivalent messages depending on whether they are framed to emphasize either benefits (gain-framed) or costs (loss-framed). This concept applies to messages intended to promote health (Rothman & Salovey, 1997). For smoking cessation, "You will save money if you quit smoking" is a gain-framed message, and "You will lose

money if you continue smoking" is a loss-framed message. Prospect theory suggests that when gains are salient, people are averse to risk, and when losses are prominent, individuals seek risk. Even though the messages are factually equivalent, the message frame may influence an individual's willingness to incur risk either to avoid an unwanted outcome or to encourage a desirable outcome (Tversky & Kahneman, 1981).

It appears that gain- and loss-framed messages are differentially persuasive, depending on the health behavior in question (Rothman & Salovey, 1997). Specifically, when behaviors have an outcome with little related risk (in this context, risk might be thought of as uncertainty), individuals are more persuaded by gain-framed messages. For instance, gain-framed messages are more effective in motivating prevention behaviors such as sunscreen use at the beach because these behaviors will very likely prevent health problems (e.g., skin cancer) and incur few risks (i.e., little uncertainty; Detweiler, Bedell, Salovey, Pronin, & Rothman, 1999). In contrast, if behaviors result in an outcome associated with a high

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