

*Impact of Targeted HIV Messages on Anticipated Stigma Risk*

Creators of public health messages face a tough challenge: individuals erroneously estimate their risk for disease as lower than that of their peers (Tennan, Eberhardt McKee, & Affleck, 2000), optimistically believing that risks apply to others but are irrelevant to themselves (Klein & Weinstein, 1997). Researchers attempt to overcome this bias of unrealistic optimism through the use of targeting, thought to increase individuals' perceptions that messages are personally relevant (Petty & Cacioppo, 1986; Roser, 1990; Roskos-Ewoldsen, Arpan-Ralstin, & St.Pierre, 2002). Two common strategies for creating targeted messages are: (1) ensuring homogeneity between the people portrayed in the message and the target audience (Hornik & Ramirez, 2006; Matthew W. Kreuter & Haughton, 2006; Rimer & Kreuter, 2006) and (2) presenting explicit comparisons between the target audience and other demographic groups (Nicholson et al., 2008; Singer & Endreny, 1993). By presenting risk as affecting specific social and demographic groups, targeted messages are thought to increase the likelihood that risk-information will be incorporated into individual risk-estimates.

However, evidence suggests that targeted groups do not necessarily view these messages as relevant (M. W. Kreuter et al., 2004) and instead often react defensively to targeted messages (Gerrard, Gibbons, & Bushman, 1996; Kessels, Ruiter, & Jansma, 2010; Smurda, Wittig, & Gokalp, 2006). Defensive reactions make individuals less likely to change their risk perceptions (Iiberman & Chaiken, 1992) and less likely to uptake the recommended action response in the message (Alter, Aronson, Darley, Rodriguez, & Ruble, 2010; Burgess, Fu, & van Ryn, 2009). Messages which contain explicit social comparisons have been shown to produce anger and reduce intentions to follow the action recommendation (Nicholson et al., 2008) and interestingly, to increase rather than reduce unrealistic optimism in the target audience (Bigman, 2011).

Defensive reactions are especially likely under two conditions: (1) when the disease being attributed to the group is stigmatized and (2) when the targeted group is subject to negative stereotypes and discrimination in other domains. In this case, the targeted message includes the threat of "layering" the stigma of the disease on top of preexisting negative stereotypes about that group (Herek & Glunt, 1988; Reidpath & Chan, 2005). Members of the target audience may be hesitant to accept the risk-information because doing so necessitates accepting the negative stereotypes, or stigma, associated with the disease. For example, individuals may prefer uncertainty of their HIV status rather than getting an HIV test, a behavior which they anticipate would confer them with a stigmatized identity, even if the results of the test were negative.

The goal of this study is to explore these unintended effects of targeted messages. To do so, this study will focus on HIV among African-Americans for several reasons. First, HIV is commonly portrayed in the media as affecting specific groups (Smith, 2007) and African Americans are the most common group associated with the disease (Davidson & Wallack, 2004; Pittam & Gallois, 2000). In addition, well-entrenched negative stereotypes about African-American sexuality (Wyatt, Williams, & Myers, 2008) make African Americans likely to be seen as blameworthy for the development of HIV (Smith, 2007; Bernard Weiner, 2006; B. Weiner, Perry, & Magnusson, 1988). This study will compare the impact of messages which target African Americans to those which focus on the

general population on perceptions of risk and anticipated stigma associated with identification with the disease. To measure anticipated stigma, this study will use a scale developed this past year (Shapiro, 2012). Finally, this study will explore the moderating role of risk and stigma perceptions on intentions to engage in HIV screening.

### **Design Overview and Hypothesis**

The study will be a population-based survey experiment in which 200 African-American and 200 White participants who are sexually active but unaware of their HIV status will be randomized into one of four conditions: (a) general population condition, (b) group-cue condition, (c) disparities frame condition, and (d) control condition. All participants except those in the control group will see a message with information about the risk for HIV infection and the severity of the health consequences associated with the disease. In addition, the *general population* condition will emphasize risk for HIV among the general population; the *group cue* condition will present the identical information but emphasize risk for HIV among African Americans; and the *disparities* condition will present this same information, but also will include an explicit comparison between rates of HIV among African Americans and Whites.

I expect that these different manipulations will affect message relevance, perceptions of actual and relative risk for HIV infection, and the anticipated stigma of being diagnosed with the disease. In addition, I expect these perceptions to impact intentions to engage in HIV screening. These constructs will be measured through data collected between subjects in the different conditions, with the control group serving as the reference category. In addition, because this study focuses on changes in attitudes of physical risk for HIV after exposure to the manipulations, HIV risk and anticipated stigma attitudes will also be assessed within-subjects, and the analysis will look at changes in attitudes rather than post-message attitudes alone. The specific hypotheses to be evaluated in this study are the following:

***Hypothesis 1:*** There will be a main effect of message type on perceptions of message relevance such that the group cue message will be viewed as less relevant than the general population message, and the disparities message will be viewed as less relevant than the group cue message.

***Hypothesis 2:*** There will be a main effect of message type on perceptions of HIV risk such that the group cue message will lead to decreased perceptions of absolute risk compared to the population message, and the disparities message will lead to decreased perceptions of absolute risk compared to the group cue message.

***Hypothesis 3:*** There will be a main effect of message type on perceptions of anticipated stigma of HIV such that the group cue message will lead to greater anticipated stigma than the population message, and the disparities message will lead to greater anticipated stigma than the group cue message.

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**Budget Information and Funding Sources**

The study was developed under the supervision of Dr. Joseph Cappella. Funding from this grant would enable recruitment and compensation of participants. Based on a price quote from Luth Research, subjects and incentives are expected to cost about \$10 per person for online surveys, totaling approximately \$4000 for inclusion of 400 subjects in the study. Statistical software, survey coding, and survey hosting are covered by Annenberg's graduate program and therefore not included in this grant request. The department also provides \$1200 per fiscal year for travel funding.

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