

Getting to the Truth:

Assessing Youths' Reactions to the truthSM and "Think. Don't Smoke"
Tobacco Countermarketing Campaigns



PREAMBLE

In November 1998, Americans won an unprecedented victory in our nation's century-long fight against tobacco use and abuse. A coalition of 46 state Attorneys General successfully settled their cases with the tobacco companies, amounting to \$206 billion over the first 25 years. As part of the Master Settlement Agreement (MSA), a 501(c)(3) organization was established to reduce tobacco usage in the United States. Now known as the American Legacy Foundation (Legacy), it adopted four goals:

- Reduce youth tobacco use.
- Reduce exposure to secondhand smoke among all ages and populations.
- Increase successful quit rate among all ages and populations.
- Reduce disparities in access to prevention and cessation services and in exposure to secondhand smoke.

Legacy's Board of Directors consists of a diverse mix of state governors, legislators, Attorneys General, and experts in the medical, education, and public health fields:

Christine O. Gregoire
Attorney General, Washington
CHAIR

Steven A. Schroeder, MD
*President, the Robert Wood Johnson
Foundation*
VICE-CHAIR

Alma Adams, PhD
North Carolina State Representative
TREASURER

Jaime Fiorucci-Hughes
Student, Louisburg, Kansas

Parris N. Glendening
Governor, Maryland

Ellen R. Gritz, PhD
*Frank T. McGraw Memorial Chair in the
Study of Cancer, University of Texas M.D.
Anderson Cancer Center*

Elmer Emilio Huerta, MD, MPH
The Washington Cancer Institute

Michael O. Leavitt
Governor, Utah

John J.H. Schwarz, MD
Michigan State Senator

Carla J. Stovall
Attorney General, Kansas

Kenneth E. Warner, PhD
*Avedis Donabedian Distinguished
University Professor of Public
Health, University of Michigan*

PURPOSE OF THE FIRST LOOK REPORT SERIES

The purpose of the First Look Report Series is to provide brief research findings from the National Youth Tobacco Surveys and other tobacco use surveys. The series will cover a wide range of topics, including tobacco use behaviors, attitudes and beliefs about tobacco, pro- and countertobacco marketing efforts, results of the American Legacy Foundation initiatives, and other policies and programs related to tobacco use.

Dear Colleague:

Less than one year into the **truth**sm campaign, 75 percent of all 12 to 17 year olds in the nation could accurately describe at least one of the **truth**sm ads. Nearly 90 percent of these youths said the ad they saw was convincing, and 85 percent said the ad gave them good reasons not to smoke.

What factors led to the initial success of the **truth**sm campaign? One critical factor is the ads. The research presented in this First Look Report demonstrates that "Body Bags" was the most effective of the **truth**sm ads. "Body Bags" delivers a simple, direct message — "the tobacco industry markets a product that kills 1,200 people per day" — and features youths taking action against the tobacco industry. Research suggests that hard-hitting industry manipulation messages appeal to youths who are risk takers, and therefore more likely to become smokers. Similar messages have been successfully used to reduce youth smoking in Florida and California.

Another important characteristic of the **truth**sm ads is that they do not preach to young people and do not present tobacco use as an appropriate adult behavior. **truth**sm ads present the facts about the long-term health effects of smoking and the marketing efforts of the tobacco industry, and teens are left to make their own decision about whether to smoke. This report shows that Philip Morris's "Think. Don't Smoke" campaign — which often features a committed nonsmoker delivering a "refusal skills" message — appeals most to youths who have already decided not to smoke. In contrast, **truth**sm appeals equally to all youths, regardless of their smoking status. **truth**sm effectively reaches those who are open to smoking and those who are already smokers, bringing lifesaving messages to those at risk of disease and disability as a result of tobacco use.

It is great news for Legacy that most teens in the United States — including those most at risk for smoking — noticed and were responsive to the **truth**sm campaign. One of Legacy's primary goals is to reduce youth tobacco use through a public education campaign, and the first step to achieving that goal is to deliver convincing messages to the nation's youths. However, this is not just a Legacy success; it is a success for the entire tobacco control community. This research provides valuable information that I hope will be used in the development of future state and local tobacco countermarketing campaigns. I am very pleased to be able to share these findings with you.

Sincerely,



Cheryl C. Heaton, DrPH
President/CEO
American Legacy Foundation

INNOVATIVE AND EVIDENCE-BASED PROGRAMS

MARKETING AND EDUCATION

The most visible of Legacy's efforts to date is the truthsm campaign. The truthsm campaign is aimed at reducing tobacco use among youths aged 12 to 17 who are most open to using tobacco. Modeled after successful teen brands, this multicultural countermarketing program incorporates advertising, Internet, grassroots, and public relations components and gives teens a voice in the effort.

APPLIED RESEARCH AND EVALUATION

The Applied Research and Evaluation team is composed of Legacy staff and colleagues from RTI, Legacy's Research and Evaluation Coordinating Center. Efforts include conducting two national surveys to document the tobacco-related beliefs, attitudes, and behavior of American youths, and the effectiveness of the truthsm campaign. The team evaluates all internal and Legacy-funded programs. The research program also provides funding for outside research in specific areas of tobacco control.

GRANTS

Legacy's grants program is designed to build on existing tobacco control efforts, leverage resources, and spark new tobacco control initiatives. Awards totalling over \$59 million have been announced to states and organizations to develop youth empowerment programs, programs to reduce disparities in tobacco control experienced by priority populations, and small innovative or research demonstration programs.

PRIORITY POPULATIONS

Legacy is committed to addressing the needs of populations that have been disproportionately burdened by the epidemic of tobacco in America. To identify promising practices, culturally appropriate approaches, and resource gaps, Legacy convened six national Priority Population forums in 2000 among tobacco control experts who represented underserved populations. Their recommendations form the basis for the Priority Populations Initiative, which makes available up to \$21 million over 3 years for capacity-building grants and innovative projects and applied research grants.

TRAINING AND TECHNICAL ASSISTANCE

Legacy is committed to providing high quality and best practices based training and technical assistance to its grantees, local and state entities, and others who are working in the tobacco control movement. In addition, Legacy's training and technical assistance team coordinates a range of Youth Activism Projects and is a major funder and collaborator for the National Tobacco Training and Assistance Consortium.

CONTACT INFORMATION

Phone: 202-454-5555 **E-mail:** info@americanlegacy.org

Cheryl G. Heaton, DrPH	·	<i>President & CEO</i>
Sharon Carothers	·	<i>Associate Vice President for Program Development</i>
M. Lyndon Haviland, DrPH	·	<i>Chief Operating Officer</i>
Beverly Kastens	·	<i>Associate Vice President for Marketing</i>
Helen Lettlow, MPH	·	<i>Director of Program Development for Priority Populations</i>
Deborah Houston McCall, MSPH	·	<i>Director of Technical Assistance & Training</i>
Adin Miller, MPA	·	<i>Director of Grants</i>
Anthony O'Toole, CPA	·	<i>Executive Vice President & CFO</i>
Dean Sanwoola	·	<i>Director of Information Systems</i>
Anna Spriggs	·	<i>Director of Administration</i>
Amber Hardy Thornton, MPH, CHES	·	<i>Vice President for Technical Assistance & Training</i>
Bernadette Toomey	·	<i>Vice President for Strategic Partnerships</i>
Ellen Vargyas	·	<i>General Counsel</i>
Mitch Zeller, JD	·	<i>Executive Vice President</i>

FIRST LOOK REPORT 9

Getting to the Truth: Assessing Youths' Reactions to the *truth*sm and "Think. Don't Smoke" Tobacco Countermarketing Campaigns

CONTENTS

6	Introduction
8	Data and Methods
10	Findings
10	<i>Awareness of Health Messages</i>
11	<i>Unaided Awareness of Tobacco Countermarketing Campaigns</i>
12	<i>Awareness of Tobacco Countermarketing Messages by Media Source</i>
14	<i>Confirmed Awareness of Tobacco Countermarketing Television Campaigns</i>
16	<i>Youths' Reactions to the <i>truth</i>sm and "Think. Don't Smoke" Campaigns</i>
17	<i>Youths' Reactions to the <i>truth</i>sm and "Think. Don't Smoke" Campaigns by Race/Ethnicity and Smoking Status</i>
19	<i>Response to Various Countermarketing Messages</i>
22	Summary
24	References
26	Appendix A: Awareness of and Reaction to Tobacco Countermarketing Messages — Detailed Tables
31	Appendix B: Measuring Awareness of Specific Tobacco Countermarketing Ads

This report was written by Matthew C. Farrelly, PhD*, Kevin C. Davis, MA*, Jared M. Yarsevich, MSc*, M. Lyndon Haviland, DrPH†, James C. Hersey, PhD*, Maria E. Girlando, BA*, and Cheryl G. Heaton, DrPH†.

The authors would like to acknowledge the contributions of Michael Siegel, MD, MPH§, Cornelia Pechmann, PhD‡, Peter Messeri, PhD†, and Karl E. Bauman, PhD*, who reviewed earlier drafts of this report.

The authors are also grateful to Donald Akin for sample design, Andrew Jessup for graphic design, and Susan Murchie for editorial review.

The Legacy Media Tracking Survey (LMTS) was developed by RTI and the American Legacy Foundation. Data collection was conducted by Discovery Research Group under the guidance of RTI.

*RTI †American Legacy Foundation ‡Boston University School of Public Health
§University of California

INTRODUCTION

In February 2000, the American Legacy Foundation (Legacy) launched a national media campaign known as **truthsm** to counter the influence of tobacco marketing and imagery targeting youths. The primary target audience for the **truthsm** campaign is 12 to 17 year old youths who are susceptible or open to smoking (Leventhal and Cleary, 1980; Flay, 1993; Pierce et al., 1996). A core assumption of the **truthsm** campaign is that youths initiate smoking because they believe it expresses a set of values and beliefs characterized by independence, risk-taking, and rebelliousness (Evans et al., 2001). In light of this, the **truthsm** campaign features "edgy" and rebellious, multi-ethnic teens rejecting tobacco marketing efforts and revealing stark facts about the deadly nature of tobacco. The essential themes of the campaign include the tobacco companies' efforts to market to youths, the long-term health effects associated with tobacco use, and the addictive nature of tobacco. Special components of the campaign have been developed to reinforce its reach to African-Americans, Hispanics, and Asians. For example, ads have been created for Hispanic teens and are shown in English and Spanish on programs and networks whose primary audience is Hispanic. **truthsm** mangas, which are similar to comic books, have been created to appeal to Asian youths.

The **truthsm** campaign is based on the notion that **truthsm** is a brand, like other youth brands (e.g., Nike, Sprite). By providing hard-hitting messages based on statements from the industry revealing its efforts to market to youths and obscure the health effects of tobacco, the **truthsm** campaign attempts to build a brand that appeals to and empowers youths. It directs its message to risk-taking youths, using TV and print commercials featuring youths on the cutting edge of trends, promotional items (e.g., t-shirts, stickers), street marketing, and a web site (www.thetruth.com). The industry's reliance on adolescents to sustain its market share is revealed by Perry (1999). She illustrates how the industry has monitored trends in teen tobacco use and brand preferences, and how Philip Morris's Marlboro Man and R.J. Reynolds's Camel advertising campaigns were designed to include underage youths in their target audiences. In addition, Coughlin (1998) documents R.J. Reynolds's efforts to develop mild-flavored cigarettes to specifically appeal to young, beginning smokers (i.e., teenagers).

The focus on tobacco industry behavior and marketing practices has been a successful strategy in tobacco countermarketing (Goldman and Glantz, 1998; Sly, Heald, and Ray, 2001; Sly, Hopkins, and Ray, 2001; Bauer et al., 2000; Teenage Research Unlimited, 1999). The success of these counter-tobacco industry messages may be attributable to capitalizing on adolescents' propensity to rebel and directing this rebellion toward the tobacco industry (Evans et al., 2001).

truthsm's approach is in stark contrast to Philip Morris's "Think. Don't Smoke" (TDS) campaign. TDS favors a more directive "just say no" approach and neglects the long-term health effects of tobacco or tobacco's addictive nature. TDS ads generally feature role models who are closed to the idea of smoking explaining why they do not smoke. This strategy may therefore appeal most to those least likely to smoke. In a focus group study of 120 teens, teens reacted to a variety of ads from state campaigns and TDS. Teens rated the TDS ads as least effective and indicated that they relied on

mere opinion rather than factual claims (Teenage Research Unlimited, 1999). These findings were confirmed in focus groups conducted in New York State (Moon Howard, Arnold, and Haviland, 2001) and by the Columbia University Expert Panel on Countermarketing (Columbia University, 1996).

To monitor the progress of the *truth*sm campaign, Legacy sponsors a series of nationally representative surveys of adolescents and young adults known as the Legacy Media Tracking Surveys (LMTS). These surveys ask youths about their tobacco use, exposure to environmental tobacco smoke (ETS), access to tobacco products, knowledge and attitudes about tobacco, and awareness of pro- and counter-tobacco advertising. To date, two surveys have been completed: a baseline survey (LMTS-I) prior to the launch of the *truth*sm campaign and a second survey (LMTS-II) 10 months into the campaign.

The purpose of this report is to summarize awareness of tobacco countermarketing and reactions to *truth*sm and TDS campaign messages. In addition, we examine how awareness of and reaction to these messages varies by gender, race/ethnicity, and stage of smoking (e.g., nonsmoker, smoker). This report is the first in a series focusing on the impact of the *truth*sm campaign.

This report focuses on several key questions with the following main findings from the LMTS-II:

1. What health and safety messages have youths seen or heard on TV, radio, billboards, or in magazines in the past month?

Approximately 94 percent of 12 to 17 year olds and 89 percent of 18 to 24 year olds have seen or heard tobacco countermarketing messages in the past month. Awareness of tobacco countermarketing was higher than awareness of health messages for drugs, alcohol, or sexually transmitted diseases.

2. Where are youths seeing and/or hearing tobacco countermarketing messages?

The most common source for tobacco countermarketing messages was television. Among the 94 percent of 12 to 17 year olds who reported seeing or hearing tobacco countermarketing messages in the past month, 91 percent said they saw messages on television, 56 percent saw messages in print, and 43 percent heard messages on the radio.

3. How has overall awareness of countermarketing campaigns changed since the launch of the *truth*sm campaign?

Overall awareness of countermarketing campaigns increased significantly after the launch of the *truth*sm campaign. In the LMTS-I, 24 percent of 12 to 17 year old respondents were aware of at least one countermarketing campaign. By the LMTS-II, this number increased by 94 percent (to 46 percent).

4. What specific tobacco countermarketing television ads have youths recently seen?

Seventy-five percent of 12 to 17 year olds and 68 percent of 18 to 24 year olds recalled seeing at least one specific *truth*sm ad on television. The comparable statistics for TDS were 66 and 53 percent, respectively.

5. How did youths react to **truthsm and TDS ads they saw on TV?**

Overall, youths were more receptive to **truth**sm than to TDS ads, and TDS ads were least effective among the populations most at risk. For example, overall receptivity to the **truth**sm campaign is roughly equal among youths who are closed to smoking, open to smoking, and regular smokers. Receptivity to the TDS campaign, however, is significantly lower among youths who are open to smoking or current smokers, suggesting that TDS appeals least to youths most at risk of initiating smoking.

6. How did youths respond to different styles of countermarketing television ads?

We compared youths' reactions to ads classified by four strategies: industry manipulation, long-term health effects, short-term health effects, and refusal skills. Industry manipulation and long-term health effects, which are representative of **truth**sm's strategy, elicited more positive responses than refusal skills or short-term health effects messages that characterize the TDS campaign.

DATA AND METHODS

The baseline LMTS (LMTS-I) was conducted via telephone between December 6, 1999, and February 6, 2000, prior to the launch of the **truth**sm campaign. The second survey (LMTS-II) was conducted via telephone from September 8 to December 23, 2000. Both surveys were designed to produce nationally representative samples of youths ages 12 to 17 and young adults ages 18 to 24. The surveys measure exposure to tobacco marketing and countermarketing, attitudes and beliefs toward tobacco, and tobacco use behaviors. The surveys also contain questions about social and environmental influences and sociodemographic information. Although the target audience for the **truth**sm campaign is 12 to 17 year olds, young adults 18 to 24 represent an important secondary audience. In the wake of the Master Settlement Agreement (MSA) restrictions on marketing, young adults 18 to 24 will be a likely target of increased tobacco marketing.

African-Americans, Asians, and Hispanics were oversampled in both surveys to enhance representation in these racial/ethnic groups. This was accomplished by oversampling telephone exchanges concentrated in areas with high proportions of households in these racial/ethnic groups. In addition, Asian and Hispanic households were oversampled by supplementing random-digit telephone dialing with lists of households with Asian and Hispanic surnames. Furthermore, residents in three "sentinel sites" (Baltimore, Denver, Seattle) were oversampled to allow for site-specific estimates for 12 to 24 year olds. Finally, youths in states with active media campaigns were also oversampled to produce state representative estimates of awareness of these campaigns.

All estimates and 95 percent confidence intervals in this report are calculated using sampling weights and controlling for the stratified survey design. Confidence intervals that do not overlap indicate statistical significance. To simplify the discus-

sion, only statistically significant results (p values ≤ 0.05) are discussed in this report, except where otherwise noted.

The telephone surveys for LMTS-I and LMTS-II had overall response rates of 52.5 and 52.3 percent, respectively.¹ For both surveys, telephone calls were spread across all days of the week and times of the day, including evenings and weekends, to maximize the time when adolescents and their parents were home. Up to 12 call-backs were made for each case, with a minimum of two daytime attempts per case. Finally, up to two refusal-conversion attempts per case were made unless the respondent or parent was adamant about not participating in the survey. Table 1 summarizes the final sample characteristics.

Table 1. Unweighted Sample Characteristics from the Legacy Media Tracking Survey

Demographic Group	LMTS-I	LMTS-II	Total	Sample Percent
Ages 12 to 17	3,439	6,233	9,672	55.0
Ages 18 to 24	3,458	4,459	7,917	45.0
Total	6,897	10,692	17,589	100.0
Male	3,211	4,919	8,130	46.2
Female	3,664	5,773	9,437	53.6
African-American	1,112	1,804	2,925	16.6
White	3,485	5,317	8,802	50.0
Hispanic	1,208	2,104	3,312	18.8
Asian/Pacific Islander	725	1,016	1,741	9.9
Other	367	425	792	4.5

There are 6,897 respondents in the LMTS-I sample and 10,692 respondents in the LMTS-II sample. The LMTS-I sample is split almost equally between 12 to 17 and 18 to 24 year olds, while the LMTS-II has a disproportionately larger sample of 12 to 17 year olds because they constitute the core target audience for the *truth*sm campaign. To determine race/ethnicity, the LMTS surveys ask "Which one of these groups best describes you?" Respondents are asked to choose only one of the following categories: American Indian or Alaska Native, Asian, Black or African-American, Hispanic or Latino, Native Hawaiian or Other Pacific Islander, White, or Other. Based on this criterion, the combined LMTS-I and LMTS-II sample is 50.0 percent White, 18.8 percent Hispanic, 16.6 percent African-American, and 9.9 percent Asian/Pacific Islander. The remainder (4.5 percent) is composed of American Indians/Alaska Natives and other races.

The majority of the analyses below are based on the most current tracking survey, the LMTS-II. We present data from both surveys to illustrate changes that have occurred over the first 10 months of the *truth*sm campaign.

¹Based on American Association for Public Opinion Research (1998) response rate calculation number 4. Discovery Research Group (DRG) and Issues and Answers performed data collection for the LMTS-I, and DRG collected data for the LMTS-II.

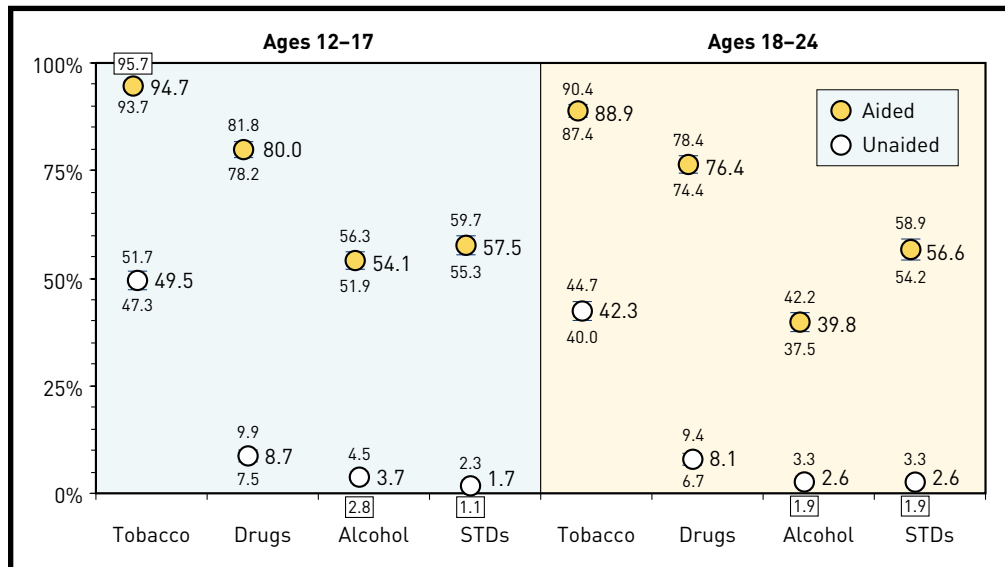
FINDINGS

AWARENESS OF HEALTH MESSAGES

We begin our analyses by summarizing various health and safety messages that adolescents and young adults report having seen and/or heard in the 30 days prior to the survey. Respondents were first asked to report as many different types of messages as they could recall seeing or hearing during the past 30 days and were not given any examples of messages they may have seen or heard (unaided recall). If the respondents did not report awareness of any messages in the unaided recall question, they were then prompted to report separately whether they had seen or heard messages about a specific health issue, such as tobacco, drugs, alcohol, or sexually transmitted diseases (STDs), in the past 30 days (aided recall). The purpose of both of these questions was to illustrate what health messages were most prominent in the minds of respondents.

Based on the LMTS-II, both the unaided and aided recall measures indicated that tobacco countermarketing messages were foremost in the minds of adolescents and young adults, followed by messages about drugs and then messages about STDs and alcohol (Figure 1). In the unaided recall question, 50 percent of 12 to 17 year olds reported that they had seen or heard tobacco countermarketing messages in the past 30 days. A similar pattern held for 18 to 24 year olds. Although both age groups also reported higher aided awareness of tobacco countermarketing messages than messages about drugs, alcohol, or STDs, the differences were less stark for aided awareness (Figure 1). When prompted, nearly 95 percent of 12 to 17 year olds and 89 percent of 18 to 24 year olds reported having seen or heard tobacco messages in the past 30 days. These results are similar to those from the LMTS-I.

Figure 1: Aided and Unaided Awareness of Health Messages



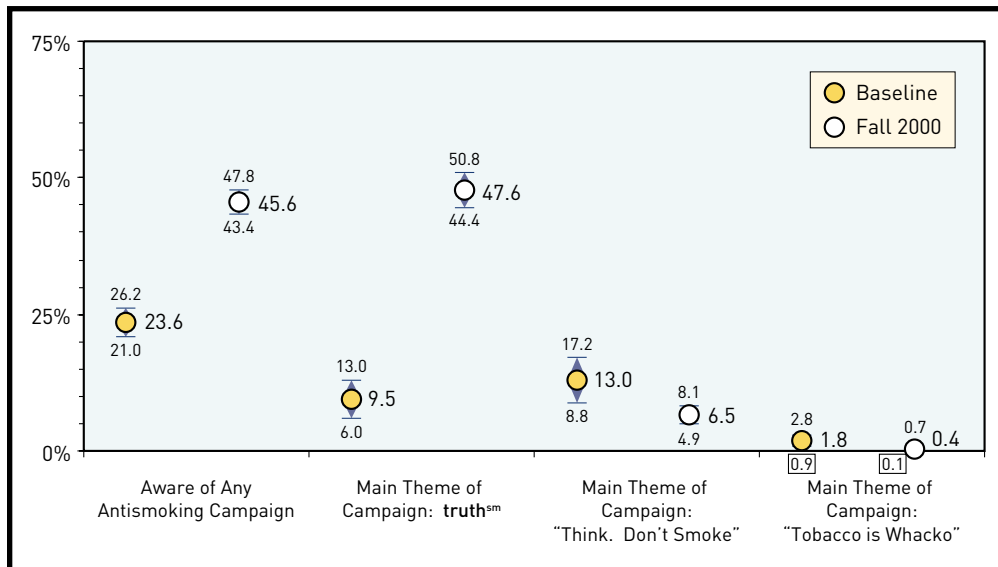
Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

To examine differences across demographic groups, we summarize aided awareness of tobacco countermarketing messages by gender and race/ethnicity for both age groups (Appendix Table A-1). Awareness of tobacco countermarketing messages was virtually universal and varied minimally across racial/ethnic groups in both age groups. Awareness among 12 to 17 year old Whites (95.1 percent) was not statistically different from any other group. However, aided awareness was statistically higher among 12 to 17 year old Asian-Americans (97.0 percent) than among African-Americans (92.4 percent). Awareness of tobacco countermarketing messages among 18 to 24 year olds was also very similar across all races/ethnicities, ranging from 87.7 percent for African-Americans to 89.7 percent for Hispanics. Aided awareness of tobacco countermarketing messages did not vary significantly by gender.

UNAIDED AWARENESS OF TOBACCO COUNTERMARKETING CAMPAIGNS

In both the LMTS-I and LMTS-II, youths were asked, "Are you aware of any advertising or campaigns against smoking or against cigarette companies that are now taking place?" Figure 2 shows a stark increase in the percentage of youths who reported awareness of any campaign over the first 10 months of the *truth*sm campaign—from 23.6 to 45.6 percent among 12 to 17 year olds, a 94 percent increase.

Figure 2: Unaided Awareness of Antismoking Campaigns and Themes (Ages 12–17)



Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

Respondents who indicated awareness of any campaign were also asked to report the "...theme/slogan of this advertising or campaign." Multiple responses were permitted, and all responses were captured verbatim. We report the level of awareness for specific campaigns among those who were aware of at least one campaign (Figure 2). This figure highlights that the increase in awareness of campaigns appears to be driven by awareness of the **truthsm** campaign, which increased from 9.5 to 47.6 percent between LMTS-1 and LMTS-II among 12 to 17 year olds.² Unaided awareness of TDS decreased from 13.0 to 6.5 percent, a statistically significant decrease, while unaided awareness of Lorillard's "Tobacco is Whacko if You're A Teen" campaign remained very low (under 2 percent) in both surveys.

In the LMTS-II, awareness of any campaign was significantly lower among African-Americans than Whites in both age groups (Appendix Table A-2). Among 12 to 17 year olds, 39.7 percent of African-Americans were aware of any tobacco countermarketing campaign compared to 47.7 percent of Whites. Among 18 to 24 year olds, 46.7 percent of Whites were aware of any campaign compared to 35.5 percent of African-Americans and 32.6 percent of Hispanics.

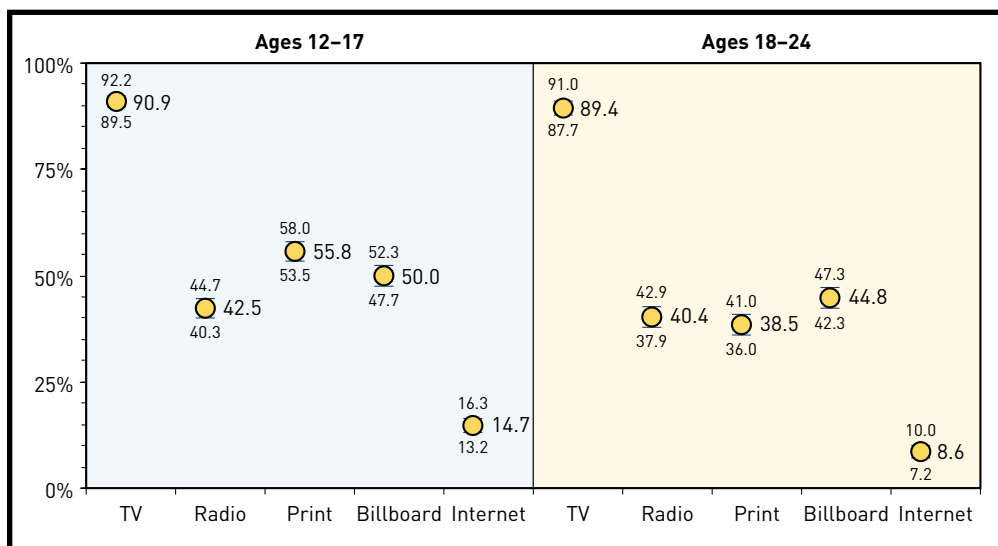
In addition, there was a statistically significant gender difference in both age groups that suggests males have higher awareness of tobacco countermarketing campaigns. Among 12 to 17 year olds, for example, 48.3 percent of males reported awareness of any campaign compared to 42.8 percent of females. This difference was larger among 18 to 24 year olds, where 48.1 percent of males reported awareness of any campaign compared to 37.3 percent of females.

AWARENESS OF TOBACCO COUNTERMARKETING MESSAGES BY MEDIA SOURCE

Respondents who reported seeing or hearing tobacco countermarketing messages in the past 30 days were asked whether they saw or heard these messages on/in television, radio, print (i.e., newspapers or magazines), billboards, or the Internet (Figure 3). Television was the most common source for these messages. Nearly 91 percent of 12 to 17 year olds who indicated awareness of countermarketing messages reported that they saw or heard those messages on television. By comparison, 55.8 percent of 12 to 17 year olds had seen tobacco countermarketing messages in magazines or other print media, and only 42.5 percent of 12 to 17 year olds had heard messages on the radio.

² The positive level of awareness of the **truthsm** campaign in the baseline survey is primarily due to Florida's own TRUTH campaign that began prior to baseline data collection. Nearly 70 percent of all respondents who indicated awareness of **truthsm** in LMTS-I were residents of Florida. The remaining 30 percent were distributed across 14 other states with very low frequencies of respondents indicating awareness of **truthsm**.

Figure 3: Where Tobacco Countermarketing Messages Were Seen/Heard



Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

Although 12 to 17 year olds reported watching more television (3.4 hrs/day) than 18 to 24 year olds (2.9 hrs/day), awareness of tobacco countermarketing messages on television did not differ across the two age groups (approximately 90 percent). Awareness of messages in/on print, billboards, or the Internet significantly differed by age group. Among respondents who were aware of tobacco countermarketing messages, 55.8 percent of 12 to 17 year olds reported seeing messages in magazines and other print compared to 38.5 percent of 18 to 24 year olds. Furthermore, 14.7 (8.6) percent of 12 to 17 (18 to 24) year olds reported seeing tobacco countermarketing messages on the Internet in the past 30 days.

Awareness of tobacco countermarketing messages through different media sources did not vary considerably by race/ethnicity among 12 to 17 year olds (Appendix Table A-3). Among 18 to 24 year olds, however, African-Americans had significantly higher awareness of tobacco countermarketing messages on television (94.1 percent) than Whites (88.4 percent). The difference for 18 to 24 year olds is consistent with the finding that African-Americans in this age group watch significantly more television per day (3.4 hours) than Whites (2.6 hours). The fact that awareness of messages on television did not vary significantly across racial/ethnic groups among 12 to 17 year olds is curious because there are also differences in television viewing patterns in this age group. We find that 12 to 17 year old African-Americans watch significantly more television per day on average (4.1 hours) than Whites (3.1 hours).

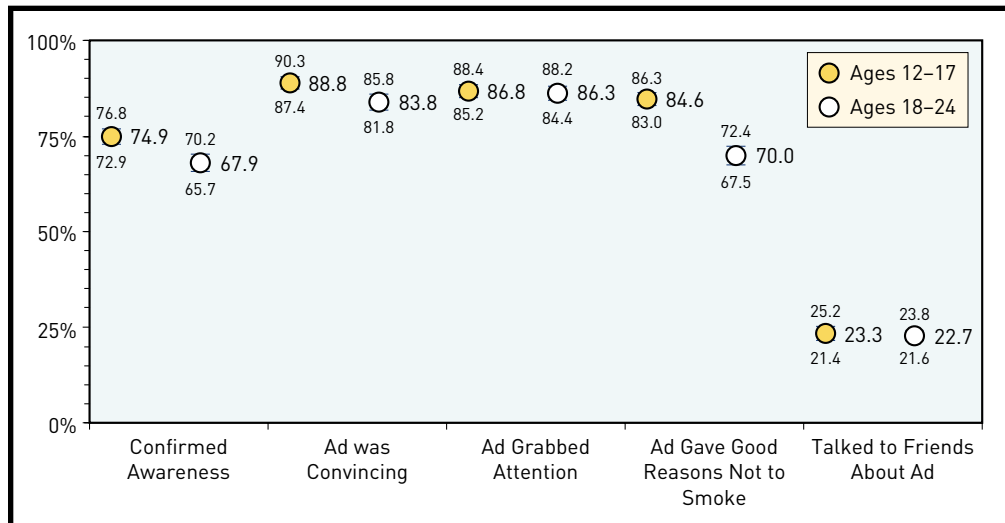
CONFIRMED AWARENESS OF TOBACCO COUNTERMARKETING TELEVISION CAMPAIGNS

Prior to the launch of the **truth**sm campaign, Philip Morris's TDS and Lorillard's "Tobacco is Whacko if You're a Teen" were the only smoking prevention campaigns that were consistently airing nationwide. Philip Morris's campaign launched in 1998 with an annual budget in excess of \$100 million, the largest of any tobacco company. Lorillard's campaign launched in 1999 and was much smaller, consisting of only two television advertisements in that year (The Intelligence Report, 2000). As a result, we focus our attention on awareness of **truth**sm and TDS ads.

To estimate awareness of campaign ads, respondents were provided very brief descriptions of each ad using the following format: "Have you recently seen an ad..." followed by a description of the beginning of the ad. The questions were crafted to provide enough information for those who have seen the ad to recognize which ad we are referring to but not enough information for the respondent to "fake" awareness of the ad (Sly, Heald, and Ray, 2001). To confirm that the respondent saw the ad, we then asked respondents to report what else happened in the ad. Those who accurately described the ad were considered to have "confirmed awareness" of the ad. Details of this methodology and how we chose which ads to include are presented in Appendix B.

Based on these questions, we considered respondents to have confirmed awareness of the **truth**sm campaign if they had confirmed awareness of at least one of the ads. Confirmed awareness of the **truth**sm campaign was significantly higher among 12 to 17 year olds than among 18 to 24 year olds (Figure 4). Nearly 75 percent of 12 to 17 year olds and 68 percent of 18 to 24 year olds had confirmed awareness of at

Figure 4: Average Confirmed Awareness and Reactions to **truthsm**



Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

least one of the **truth**sm ads in the survey. Overall, awareness of any TDS ad included in the survey is 66 percent for 12 to 17 year olds and 53 percent for 18 to 24 year olds.³

Confirmed awareness of the **truth**sm campaign differed significantly by gender (Appendix Table A-4). Among 12 to 17 year olds, 80 percent of males had confirmed awareness of at least one **truth**sm ad compared to 70 percent of females. A similar difference existed among 18 to 24 year olds. There were no statistically significant differences in confirmed awareness of TDS by gender in either age group.

Confirmed awareness of **truth**sm did not differ significantly by race/ethnicity in either age group. There were, however, statistically significant racial/ethnic differences in confirmed awareness of TDS among both age groups. For example, African-Americans ages 12 to 17 reported significantly higher awareness (73.2 percent) of at least one of the TDS ads in the survey compared to Whites (61.9 percent). This difference was even larger for 18 to 24 year olds: 65 percent of African-Americans in this age group reported seeing at least one TDS ad compared to 51 percent of Whites.

This difference may be due to the TDS "Boy on the Bus" ad, which prominently features an African-American teenager and may be recalled most by African-Americans. We find that 39 percent of African-Americans ages 12 to 17 report confirmed awareness of this ad compared to 20 percent of Whites. Among 12 to 17 year olds, 86 percent of African-Americans who saw the ad indicated that it grabbed their attention compared to 61 percent of Whites who saw the ad. Therefore, differences in awareness across race/ethnicity may stem from "selective attention," where people pay attention to information that they see as relevant to them (Pechmann and Stewart, 1990; Pechmann and Reibling, 2000b).

³TDS ads in the survey were chosen based on reports from a commercial monitoring service and may not capture all of the campaigns' ads.

YOUTHS' REACTIONS TO THE truthsm AND "THINK. DON'T SMOKE" CAMPAIGNS

Measuring the effectiveness of social marketing campaigns is complex. Unger and colleagues (2001) recently touched on the complexity of measurement in their study of adolescents' exposure to tobacco-related marketing. They assert that there is no clear consensus about which aspects of tobacco countermarketing make youths less likely to smoke. However, it is possible to monitor attitudinal reactions to an ad, shortly after the ad's public appearance. Health communication theory (McGuire, 1981) holds that for a message to have an effect, it must not only be sent but be viewed and remembered (i.e., awareness). Furthermore, to effectively communicate, an ad must be attended to, understood, and perceived as relevant and persuasive. Messages can also be reinforced when an ad stimulates interpersonal communication.

Accordingly, the LMTS-II asks specific questions aimed at capturing this multitude of attitudinal responses to the ads. The survey questions about responses to the ads are based on a standard of measuring ad effectiveness that dates back to the 1960s (Lucas and Britt, 1963) and follow recent surveys measuring tobacco countermarketing advertisements (Eisenberg et al., 1998; Sly, Heald, and Ray, 2001; Unger et al., 2001). Respondents who reported seeing an ad were asked whether the ad was convincing, grabbed their attention, gave them good reasons not to smoke, and/or whether they talked to their friends about the ad.

To evaluate truthsm in terms of these reactions, we created average measures across all truthsm ads. For each respondent who saw one or more truthsm ads, we calculated the fraction of total ads seen that the respondent found convincing, attention grabbing, etc. For the question "Would you say the ad grabbed your attention?" (1=yes, 0=no), we created truthsm campaign averages as follows: if a respondent saw a total of four truthsm ads and three grabbed their attention, their average response to truthsm ads would be $\frac{3}{4}$ or 75 percent; these percentages were then averaged across all respondents to create an overall score for the campaign. This exercise was repeated for "gave good reasons not to smoke" and "talked to friends about the ad."

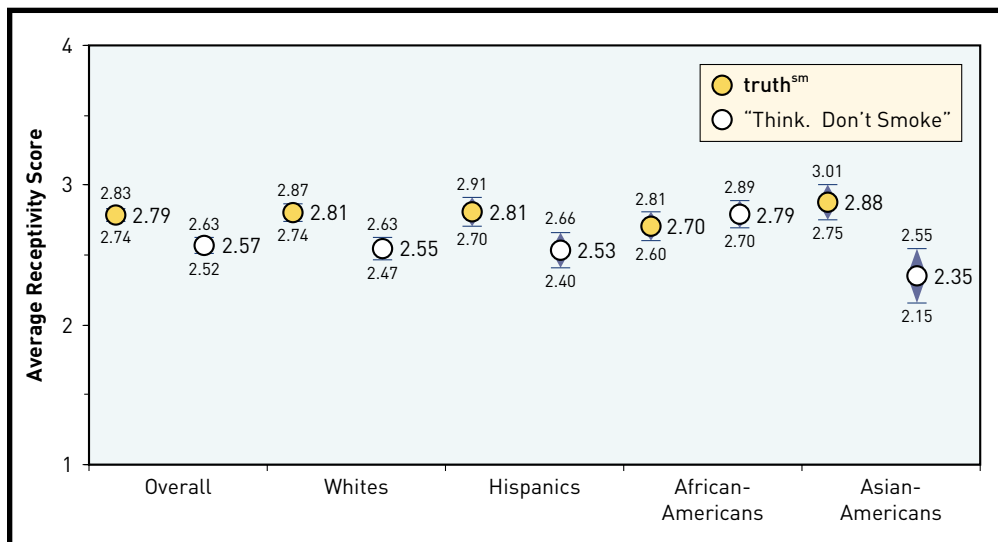
Figure 4 summarizes average reactions to the truthsm campaign by age group. Nearly 90 percent of 12 to 17 year olds said the truthsm ads they saw were convincing, and 85 percent said the ads gave them good reasons not to smoke; 84 percent of 18 to 24 year olds found the ads convincing, and 70 percent said the ads gave them good reasons not to smoke. There were no significant differences for "grabbed their attention" or "talked to friends" between the two age groups.

YOUTHS' REACTIONS TO THE **truth**sm AND "THINK. DON'T SMOKE" CAMPAIGNS BY RACE/ETHNICITY AND SMOKING STATUS

To explore how reactions to the two campaigns vary by race/ethnicity and by smoking status, we report an overall "receptivity" score based on the sum of all of the measures reported above (i.e., convincing, grabbed attention, gave good reasons not to smoke, and talked to friends). To create receptivity scores for **truth**sm and TDS, we first calculated an individual score for each ad that is the sum of the four reactions to the ad. Individual ad scores could thus take on values from 0 to 4. For example, if a respondent indicated that the ad was convincing, grabbed their attention, gave them good reasons not to smoke, and stimulated peer communication, the ad received a score of 4. These scores were then averaged across all the **truth**sm and TDS ads the respondent saw to give an overall receptivity score for **truth**sm and TDS.

We report the average receptivity scores for **truth**sm and TDS for 12 to 17 year olds overall and by race/ethnicity in Figure 5. The average receptivity score for **truth**sm is 2.79 versus 2.57 for TDS. Youths of all races and ethnicities were equally receptive to **truth**sm, while African-Americans were more receptive to the TDS campaign than all other races/ethnicities. This finding may be confounded by the fact that African-American youths are less likely to smoke than other races/ethnicities (Farrelly, Faulkner, and Mowery, 2000) and hence, more receptive to TDS messages. In addition, White, Hispanic, and Asian youths were more receptive to **truth**sm than to TDS, while African-Americans were equally receptive to both campaigns. As discussed earlier, these results may reflect the selective attention phenomenon, where African-Americans are considerably more able to recall the "Boy on the Bus" TDS ad than other races/ethnicities. Responses to selected **truth**sm and TDS ads are discussed below.

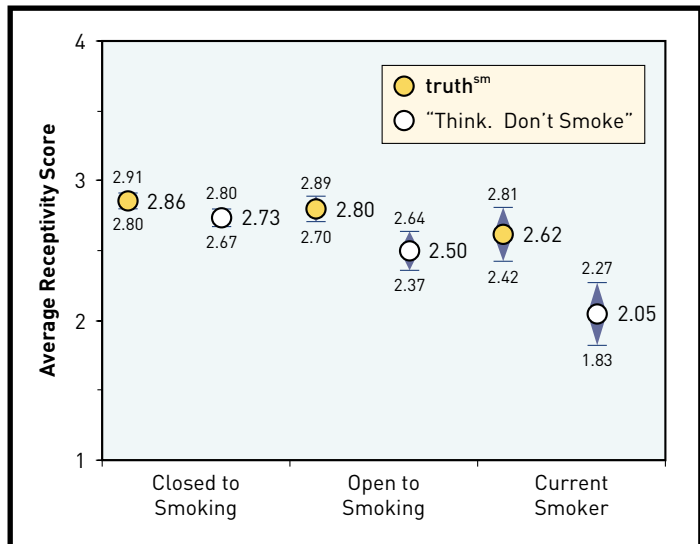
Figure 5: Average Receptivity Scores for **truthsm and "Think. Don't Smoke" Ads by Race/Ethnicity (Ages 12-17)**



Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

To assess how well received the **truth**sm and TDS campaigns are among those most at risk, we report the receptivity scores for both campaigns for 12 to 17 year olds by smoking status. We categorized youths into three stages of smoking: never smokers who are open (susceptible) to smoking, never smokers closed to smoking, and current smokers (Mowery, Brick, and Farrelly, 2000; Leventhal and Cleary, 1980; Flay, 1993). As shown in Figure 6, youths who are closed to smoking are 5 percent more receptive to **truth**sm than TDS, but this difference is much less pronounced than the differences for smokers and those at risk of smoking. For open to smoking youths and current smokers, the average receptivity scores for **truth**sm were 12 and 28 percent higher, respectively, than for TDS. In other words, TDS did the least well among youths in greatest need of messages that discourage smoking, despite the fact that confirmed awareness was roughly equal across stages of smoking for TDS (confirmed awareness is also equal across stages of smoking for **truth**sm — data not shown).

Figure 6: Average Receptivity Scores for **truthsm and "Think. Don't Smoke" Ads by Smoking Uptake (Ages 12–17)**



Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

RESPONSE TO VARIOUS COUNTERMARKETING MESSAGES

Recent literature has evaluated the effectiveness of tobacco countermarketing ads in terms of the types of messages delivered. Pechmann and Reibling (2000a), for example, examined several state tobacco countermarketing campaigns, including those of Arizona, California, Florida, Massachusetts, and Vermont. Individual ads from these campaigns were assessed using surveys of 7th and 10th graders that asked about each ad's message content. The ads were categorized according to their message content to assess which types of messages were most effective at denormalizing smoking behaviors and reducing smoking rates. The types of messages that Pechmann and Reibling analyzed included the short-term effects of smoking, tobacco marketing practices (i.e., industry manipulation), and refusal skills. They found that youths were most persuaded by ads, such as those from Vermont's campaign, that delivered a refusal skills message portraying attractive young people refusing to smoke.

In another study, Goldman and Glantz (1998) used 186 focus groups to analyze 118 advertisements from the state campaigns of California, Massachusetts, and Michigan. They also grouped the ads according to their message content, categorizing them as industry manipulation, secondhand smoke, addiction, cessation, youth access, short-term effects, long-term effects, or romantic rejection. In contrast to the results found by Pechmann and Reibling, Goldman and Glantz found that ads using industry manipulation and secondhand smoke messages were most effective in persuading youth audiences.

Although these studies are informative about what types of countermarketing messages might resonate with adolescents, they present conflicting findings, in part due to differences in study designs and ad content. An advantage of the data presented in this report is that they are based on a large, nationally representative sample of youths and permit comparisons across a variety of messages in a uniform format.

In this report, we adapt a classification approach similar to that of Goldman and Glantz (1998) and Pechmann and Reibling (2000a) by summarizing reactions to several ads that represent different types of message content found in the **truthsm** and TDS campaigns. The following messages and themes are commonly found in **truthsm** and TDS ads:

- Industry manipulation — This strategy confronts the tobacco industry by providing youths with knowledge of the industry's attempt to manipulate them, thereby suggesting that smoking is not an act of independence.
- Long-term health effects — This theme describes the potential long-term health consequences of smoking, such as lung cancer, emphysema, and death.
- Short-term health effects — This strategy counters the industry's portrayal of smoking as glamorous and attractive by showing the immediate health and cosmetic consequences of smoking.
- Refusal skills — This strategy portrays young people refusing to smoke and details their reasons for not smoking.

Based on their unique correspondence to each of the categories described above, we summarize reactions to the following ads: "Body Bags," "Beach," "Daily Dose," "Karate Class," and "Boy on the Bus." The first three are **truthsm** ads, and the last two are TDS ads. This choice of ads is also based on a minimum confirmed awareness of 20 percent among 12 to 17 year olds. This limit ensures sufficient sample sizes of

youths who have seen the ads, facilitating greater accuracy in comparing responses across ads. Each ad is briefly described below.

The "Body Bags" ad, which was described above, highlights the fact that tobacco kills 1,200 people per day and that tobacco companies obscure this fact. "Beach" is also a very confrontational ad but uses humor to deliver its industry manipulation message. This ad shows young people dragging black body bags onto a beach. Numerous body bags are lying on the beach as if they are enjoying the sun while the young people in the ad begin throwing one of the body bags into the air with a beach blanket. The ad ends with a young man holding a sign that says "What if cigarette ads told the truth?" This ad conveys a message of industry deception, implying that cigarette ads evade the truth by failing to show the harmful effects of tobacco.

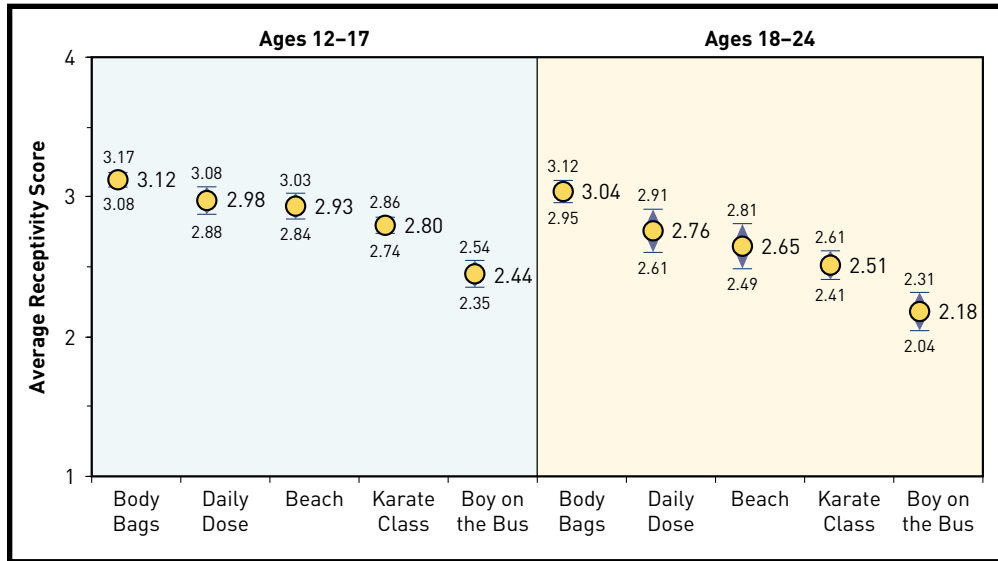
The "Daily Dose" series employs a mixture of industry manipulation and long-term effects messages. All "Daily Dose" ads feature a young person holding a digital sign with flashing numbers that shows statistics about tobacco products and cigarette use. These ads communicate simple but stark facts about tobacco (e.g., Every 8 seconds, tobacco companies lose another customer; Cigarette smoke contains more poisons than rat poison; Cigarette advertising is like peer pressure, with a \$5 billion budget). These ads highlight industry marketing practices as well as potential long-term consequences of smoking, such as death. Through its style and execution, the "Daily Dose" series has been one of the primary vehicles for implementing **truthsm**'s strategy of empowering youths with facts about the tobacco industry.

The two TDS ads discussed in this section, "Karate Class" and "Boy on the Bus," both deliver a refusal skills message. However, "Karate Class" is unique among TDS ads in that it highlights one of the primary short-term health effects of smoking — the inability to keep up in sports because of smoking. "Karate Class" first shows a girl refusing a boy's offer to smoke before a karate class. The girl refuses the cigarette and goes on to do well in the class, while the boy who smokes has difficulty keeping up.

Like most other TDS ads, "Boy on the Bus" focuses on refusal skills with a message that smoking is not cool and youths do not have to smoke to fit in with others. The ad shows an African-American teenager sitting on a school bus with his friends as he talks to an interviewer about the reasons why he does not smoke. When asked if he has ever tried cigarettes, the boy confidently replies "Nope" and then cites several reasons for why he has never tried cigarettes. The boy says that he "never wanted to" try cigarettes, although some of his friends have. He further asserts that smoking is "stupid as far as I am concerned." This ad conveys the message that youths do not have to smoke to be cool. It also presents the boy as a "mainstream" African-American teenager whose view that smoking is stupid is more common among teenagers than the alternative that smoking is cool. "Boy on the Bus" therefore challenges the often-held perception among adolescents that most teens their age smoke.

We report receptivity scores for these ads for 12 to 17 and 18 to 24 year olds rather than individual ad reactions to facilitate comparisons across ads. Youths 12 to 17 years old were most receptive to "Body Bags," followed by "Daily Dose" and "Beach" (Figure 7). The receptivity score for "Beach" is similar to "Daily Dose" but higher than "Karate Class," while "Boy on the Bus" is considerably lower than all other ads.

Figure 7: Average Receptivity Scores for Individual *truth*sm and "Think. Don't Smoke" Ads



Note: Upper and lower ranges represent 95 percent confidence intervals that account for the survey design weighting.

Appendix Table A-5 reports receptivity scores for each ad by gender and race/ethnicity. Youths 12 to 17 years old are equally receptive to “Body Bags,” “Daily Dose,” and “Beach” regardless of their race/ethnicity. Receptivity to “Boy on the Bus” and “Karate Class,” however, does vary by race/ethnicity. In particular, “Boy on the Bus” received a significantly higher score among African-Americans (2.86) than among Whites (2.23) or Asians (2.17). This is further evidence of the selective attention phenomenon discussed above where “Boy on the Bus” likely appeals more to African-Americans because that ad prominently features a young African-American teenager. Hispanics also found “Boy on the Bus” more appealing (2.62) than Whites or Asians. “Karate Class” also received a higher receptivity score (2.86) among African-Americans than Whites (2.76).⁴ There were no significant differences in receptivity scores between males and females for any of the ads.

⁴This difference is significant at the 10 percent level ($p < 0.10$).

SUMMARY

The results presented in this report suggest that the **truth**sm campaign has raised awareness of tobacco countermarketing efforts among both teens and young adults. We find that unprompted awareness of any tobacco countermarketing campaign among 12 to 17 year olds nearly doubled during the first 10 months of the **truth**sm campaign. During this time, the percentage of youths who saw at least one **truth**sm ad (75 percent confirmed awareness) quickly leapfrogged the percentage of youths aware of TDS (66 percent). Youths also consistently had more favorable reactions to **truth**sm than TDS. While both smoking and nonsmoking youths were equally receptive to **truth**sm, smokers and those at risk of smoking were less receptive to TDS ads than committed nonsmokers. Furthermore, all races/ethnicities were equally receptive to the **truth**sm campaign, whereas TDS resonated most with African-American youths who are less likely to smoke than Whites. As a whole, these findings suggest that TDS appealed the least to the most relevant audiences.

Possibly the most notable finding of this report is that ads featuring refusal skills messages generate weaker responses than ads using industry manipulation or health effects messages. This finding is similar to the 1998 findings of Goldman and Glantz but in contrast to Pechmann and Reibling (2000a), who find refusal skills messages to be among the most effective. Based on our research, it is important for studies to examine youths' receptivity to tobacco countermarketing messages by their smoking status. The **truth**sm campaign's core strategy revolves around industry manipulation and long-term health effects messages, as illustrated by "Body Bags." This ad delivers a simple and direct message that the tobacco industry markets a product that kills 1,200 people per day. In contrast, the TDS campaign primarily features refusal skills messages as illustrated by the "Boy on the Bus" ad. TDS's "Karate Class" is an exception for the campaign and highlights a short-term health consequence of smoking. This ad elicited more positive responses than the TDS campaign as a whole, suggesting that short-term health messages are more appealing than refusal skills messages.

These findings are congruent with the theory that advertising's strength lies in directing previously held beliefs toward a tangible end rather than in transmitting new values (Schudson, 1984). **truth**sm empowers risk-taking and rebellious youths to act defiantly (i.e., not to smoke or quit) against a powerful institution of authority, the tobacco industry. On the other hand, TDS ads show a weaker communicative relation with these risk-taking youths who are open to the idea of smoking than it does to those firmly opposed to smoking. Those who have already decided not to smoke, and have their reasons, relate to the TDS ads. Those who do not share the thoughts and feelings of the youths presented in the TDS ads simply do not relate to the ad. This latter group, however, has greater potential to become future smokers and should therefore be the main focus of a tobacco countermarketing campaign.

The **truth**sm campaign relies on hard-hitting ads that provide youths, regardless of their smoking status or race/ethnicity, with important information about tobacco use. Results in this report demonstrate that television remains an important vehicle for delivering tobacco countermarketing messages to youths. In addition, respon-

dents clearly differentiated between campaigns featuring messages of industry manipulation and those relying on refusal skills. Combined with the demonstrated success of Florida's countermarketing campaign (Sly, Heald, and Ray, 2001; Sly, Hopkins, and Ray, 2001), these findings provide strong support for a hard-hitting industry manipulation strategy. These findings also provide valuable information to states in the process of developing their own tobacco prevention campaigns.

REFERENCES

- The American Association for Public Opinion Research (AAPOR). 1998. *Standard Definitions: Final Dispositions of Case Codes and Outcome Rates for RDD Telephone Surveys and In-Person Household Surveys*. Ann Arbor, Michigan: AAPOR.
- Bauer, U.E., T.M. Johnson, R.S. Hopkins, and R.G. Brooks. 2000. "Changes in Youth Cigarette Use and Intentions Following Implementation of a Tobacco Control Program: Findings from the Florida Youth Tobacco Survey, 1998–2000." *Journal of the American Medical Association* 284(6):723–728.
- Columbia University Expert Panel on Countermarketing. 1996. "Research Synthesis on the Effects of Tobacco Advertising and Counter-Advertising on Youth Tobacco Use Behavior." Report to the Office on Smoking and Health, Centers for Disease Control. New York: Columbia University.
- Coughlin, P.J. 1998. "The Mangini Paper." Mangini v. R.J. Reynolds Tobacco Company, No. 959516 (San Francisco Superior Court).
- Eisenberg, M., L. Hye-ryeon, M. Burgoon, B. Beach, E. Alvaro, and R. Givens. October 1, 1998. "Evaluation of the TEPP Media Campaign: Report No. 1, Historical Impact of the TEPP Media Campaign." Arizona Cancer Center, Tobacco Education and Prevention Program.
- Evans, D., J. Wasserman, E. Bertolotti, and S. Martino. 2001. "Process Evaluation Phase II: Social Marketing and the truth Campaign." Draft manuscript.
- Farrelly, M.C., D.L. Faulkner, and P.D. Mowery. June 2000. *Legacy First Look Report 1: Cigarette Smoking Among Youth: Results from the 1999 National Youth Tobacco Survey*. Washington, DC: American Legacy Foundation.
- Flay, B.R. 1993. "Youth Tobacco Use: Risks, Patterns, and Control." In *Nicotine Addiction: Principles and Management*, J. Slade and C.T. Orleans, eds., pp. 365–385. New York: Oxford University Press.
- Goldman, L.K., and S.A. Glantz. 1998. "Evaluation of Antismoking Advertising Campaigns." *Journal of the American Medical Association* 279(10)(March):772–777.
- The Intelligence Report. August 2000. Big Tobacco and Their Youth Prevention Programs. <http://www.thetruth.com/tig/current/tob_ind_trend.cfm>.
- Leventhal, H., and P.D. Cleary. 1980. "The Smoking Problem: A Review of the Research and Theory in Behavior Risk Modification." *Psychological Bulletin* 88:370–405.
- Lucas, D.B., and S.H. Britt. 1963. *Measuring Advertising Effectiveness*. New York, McGraw Hill.
- McGuire, W.J. 1981. "Behavioral Medicine, Public Health and Communication Theories." *Health Education* (May–June)12(3):8–13.
- Moon Howard, J., E. Arnold, and M.L. Haviland. "Assessing the Efficacy of Anti-Smoking Messages for Urban Youth at Risk: A Comparison of the American Legacy Foundation and Philip Morris Ad Campaigns." Presented at the 129th Annual Meeting of the American Public Health Association, Atlanta, GA, October 2001.
- Mowery, P.D., P. Dean Brick, and M.C. Farrelly. October 2000. *Legacy First Look Report 3: Pathways to Established Smoking: Results from the 1999 National Youth Tobacco Survey*. Washington, DC: American Legacy Foundation.
- Pechmann, C., and E.T. Reibling. 2000a. "Anti-Smoking Advertising Campaigns Targeting Youth: Case Studies from USA and Canada." *Tobacco Control* 9(Suppl. II):ii18–ii31.

- Pechmann, C., and E.T. Reibling. 2000b. "Planning an Effective Anti-Smoking Mass Media Campaign Targeting Adolescents." *Journal of Public Health Management and Practice* 6(3):80-94.
- Pechmann, C., and D.W. Stewart. 1990. "The Effects of Comparative Advertising on Attention, Memory, and Purchase Intentions." *Journal of Consumer Research* 17(September):180-191.
- Perry, C.L. 1999. "The Tobacco Industry and Underage Youth Smoking: Tobacco Industry Documents from the Minnesota Litigation." *Archives of Pediatrics & Adolescent Medicine* 153(September):935-941.
- Pierce, J.P., W.S. Choi, E.A. Gilpin, A.J. Farkas, and C.C. Berry. 1998. "Tobacco Industry Promotion of Cigarettes and Adolescent Smoking." *Journal of the American Medical Association* 279(7):511-515.
- Schudson, M. 1984. *Advertising, The Uneasy Persuasion: Its Dubious Impact on American Society*. New York: Basic Books.
- Sly, D.F., G.R. Heald, and S. Ray. 2001. "The Florida 'truth' Anti-tobacco Media Evaluation: Design, First Year Results, and Implications for Planning Future State Media Evaluations." *Tobacco Control* 10: 9-15.
- Sly, D.F., R.S. Hopkins, and S. Ray. 2001. "Influence of a Counteradvertising Media Campaign on Initiation of Smoking: The Florida 'truth' Campaign." *American Journal of Public Health* 91(2)(February): 233-238.
- Teenage Research Unlimited. 1999. "Counter-Tobacco Advertising Exploratory Summary Report." (Report prepared for the states of Arizona, California, and Massachusetts Public Health Anti-Tobacco Media Campaigns). Northbrook, IL.
- Unger, J.B., T.B. Cruz, and D. Schuster. 2001. "Measuring Exposure to Pro- and Anti-tobacco Marketing Among Adolescents: Intercorrelations Among Measures and Associations with Smoking Status." *Journal of Health Communication* 6: 11-29.

APPENDIX A: AWARENESS OF AND REACTION TO TOBACCO COUNTERMARKETING MESSAGES — DETAILED TABLES

Table A-1. Aided Awareness of Health Messages — Fall 2000 LMTS-II [95% Confidence Interval]

	Ages 12–17			
	Any Tobacco	Drugs	Alcohol	STDs
Overall (n=6233)	94.7% [93.7–95.7]	80.0% [78.2–81.8]	54.1% [51.9–56.3]	57.5% [55.3–59.7]
Males (n=3045)	94.7% [93.3–96.1]	78.3% [75.7–81.0]	53.0% [49.9–56.2]	56.2% [53.0–59.3]
Females (n=3188)	94.6% [93.2–96.0]	81.7% [79.4–84.1]	55.2% [52.1–58.2]	58.9% [55.9–61.9]
Whites (n=3040)	95.1% [93.7–96.5]	79.6% [77.1–82.2]	51.5% [48.4–54.5]	52.6% [49.6–55.7]
Hispanics (n=1288)	94.1% [91.8–96.4]	84.3% [81.1–87.6]	60.7% [56.2–65.2]	64.2% [59.7–68.5]
African-Americans (n=987)	92.4% [89.9–94.8]	77.6% [73.7–81.5]	59.7% [55.3–64.2]	70.7% [66.6–74.9]
Asian-Americans (n=647)	97.0% [95.2–98.6]	81.1% [75.1–87.2]	55.3% [47.1–63.5]	51.9% [43.6–60.2]
	Ages 18–24			
	Any Tobacco	Drugs	Alcohol	STDs
Overall (n=4459)	88.9% [87.4–90.4]	76.4% [74.4–78.3]	39.8% [37.5–42.2]	56.6% [54.2–58.9]
Males (n=1874)	90.3% [88.1–92.4]	78.0% [75.0–80.9]	40.1% [36.5–43.7]	58.6% [55.0–62.2]
Females (n=2585)	87.5% [85.5–89.5]	74.7% [72.0–77.4]	39.5% [36.5–42.5]	54.4% [51.3–57.5]
Whites (n=2277)	89.2% [87.3–91.2]	76.5% [73.8–79.2]	38.6% [35.4–41.7]	52.3% [49.0–55.5]
Hispanics (n=816)	89.7% [86.4–92.9]	77.1% [72.8–81.5]	42.1% [36.8–47.3]	58.9% [53.6–64.1]
African-Americans (n=817)	87.7% [84.3–91.1]	77.8% [73.7–81.8]	44.8% [39.8–49.9]	75.2% [70.9–79.4]
Asian-Americans (n=369)	88.6% [81.9–95.2]	71.4% [62.9–79.8]	37.7% [27.7–47.6]	50.2% [40.2–60.2]

Table A-2. Unaided Awareness of Antismoking Campaigns and Themes — Fall 2000 LMTS-II [95% Confidence Interval]

Ages 12–17				
	Any Antismoking Campaign	Main Theme: <i>truth</i> sm	Main Theme: "Think. Don't Smoke"	Main Theme: "Tobacco is Whacko"
Overall (n=6233)	45.6% [43.4–47.8]	47.6% [44.4–50.8]	6.5% [4.9–8.1]	0.4% [0.07–0.67]
Males (n=3045)	48.3% [45.2–51.5]	53.6% [49.2–58.1]	6.2% [4.1–8.4]	0.1% [0.0–0.2]
Females (n=3188)	42.8% [39.8–45.8]	40.4% [35.9–44.9]	6.8% [4.4–9.2]	0.6% [0.0–1.1]
Whites (n=3040)	47.7% [44.7–50.8]	49.3% [44.9–53.7]	6.8% [4.6–9.0]	0.3% [0.0–0.6]
Hispanics (n=1288)	42.8% [38.2–47.4]	40.4% [33.8–46.8]	6.5% [2.8–10.2]	0.7% [0.1–2.0]
African-Americans (n=987)	39.7% [35.3–44.1]	48.5% [41.5–55.6]	5.0% [2.3–7.7]	0.6% [0.1–1.8]
Asian-Americans (n=647)	47.4% [39.0–55.7]	53.9% [42.5–65.3]	3.7% [0.7–6.7]	0.5% [0.1–1.1]
Ages 18–24				
	Any Antismoking Campaign	Main Theme: <i>truth</i> sm	Main Theme: "Think. Don't Smoke"	Main Theme: "Tobacco is Whacko"
Overall (n=4459)	42.8% [40.4–45.2]	52.0% [48.4–55.7]	3.8% [2.4–5.3]	0.0% [0.0–0.1]
Males (n=1874)	48.1% [44.4–51.7]	57.1% [52.0–62.2]	4.4% [2.1–6.7]	0.1% [0.0–0.2]
Females (n=2585)	37.3% [34.3–40.2]	45.3% [40.4–50.1]	3.1% [1.6–4.5]	0.0% [0.0–0.0]
Whites (n=2277)	46.7% [43.5–49.9]	50.3% [45.7–54.9]	3.8% [1.9–5.8]	0.1% [0.0–0.2]
Hispanics (n=816)	32.6% [27.7–37.5]	64.2% [55.9–72.5]	2.5% [1.0–4.4]	0.0% [0.0–0.0]
African-Americans (n=817)	35.5% [30.7–40.3]	52.5% [44.2–60.8]	5.2% [1.9–8.4]	0.0% [0.0–0.0]
Asian-Americans (n=369)	41.2% [31.5–50.9]	59.0% [45.5–72.5]	3.0% [0.0–6.0]	0.0% [0.0–0.0]

Table A-3. Where Tobacco Countermarketing Messages Were Seen/Heard — Fall 2000 LMETS-II [95% Confidence Interval]

	Ages 12–17				
	Television	Radio	Print	Billboard	Internet
Overall (n=6233)	90.9% [89.5–92.2]	42.5% [40.3–44.7]	55.8% [53.5–58.0]	50.0% [47.7–52.3]	14.7% [13.2–16.3]
Males (n=3045)	92.0% [90.2–93.8]	38.5% [35.4–41.6]	52.9% [49.7–56.1]	53.3% [50.0–56.5]	15.9% [13.7–18.2]
Females (n=3188)	89.7% [87.7–91.7]	46.8% [43.6–49.9]	58.8% [55.7–61.9]	46.5% [43.4–49.7]	13.4% [11.3–15.6]
Whites (n=3040)	90.1% [88.2–92.0]	41.9% [38.9–45.0]	55.6% [52.5–58.7]	47.5% [44.3–50.6]	12.4% [10.4–14.5]
Hispanics (n=1288)	91.7% [88.9–94.4]	44.6% [39.8–49.4]	58.9% [54.2–63.5]	52.7% [47.9–57.5]	17.9% [14.0–21.8]
African-Americans (n=987)	92.7% [90.4–95.0]	45.9% [41.2–50.6]	53.3% [48.5–58.1]	58.7% [54.1–63.4]	18.9% [15.2–22.6]
Asian-Americans (n=647)	90.6% [85.9–95.2]	38.4% [30.1–46.7]	59.2% [51.0–67.4]	38.3% [29.8–46.7]	18.6% [11.9–25.4]
	Ages 18–24				
	Television	Radio	Print	Billboard	Internet
Overall (n=4459)	89.4% [87.7–91.0]	40.4% [37.9–42.9]	38.5% [35.9–40.9]	44.8% [42.2–47.3]	8.6% [7.2–9.9]
Males (n=1874)	88.3% [85.8–90.8]	42.7% [38.8–46.5]	40.7% [36.9–44.4]	47.5% [43.6–51.3]	11.1% [8.7–13.4]
Females (n=2585)	90.5% [88.4–92.5]	38.0% [34.8–41.1]	36.1% [32.9–39.3]	41.9% [38.7–45.2]	6.0% [4.5–7.4]
Whites (n=2277)	88.4% [86.2–90.6]	40.0% [36.7–43.4]	36.5% [33.2–39.9]	41.9% [38.5–45.2]	7.0% [5.3–8.8]
Hispanics (n=816)	92.8% [89.5–96.1]	38.8% [33.3–44.3]	36.8% [31.3–42.2]	49.0% [43.4–54.6]	9.6% [6.5–12.6]
African-Americans (n=817)	94.1% [91.4–96.8]	46.4% [41.0–51.8]	49.3% [43.9–54.6]	52.7% [47.4–58.1]	14.7% [10.4–18.9]
Asian-Americans (n=369)	86.1% [79.5–92.7]	35.4% [25.0–45.7]	42.4% [31.9–52.8]	47.4% [36.6–58.2]	7.9% [3.8–11.9]

Table A-4. Confirmed Awareness of *truth*sm and "Think. Don't Smoke" — Fall 2000 LMTS-II [95% Confidence Interval]

	Ages 12–17	
	<i>truth</i> sm	TDS
Overall (n=6233)	74.9% [72.9–76.8]	65.5% [63.4–67.7]
Males (n=3045)	79.6% [76.9–82.2]	64.2% [61.1–67.2]
Females (n=3188)	69.9% [67.1–72.8]	67.0% [64.1–69.9]
Whites (n=3040)	74.8% [72.1–77.5]	61.9% [58.9–64.9]
Hispanics (n=1288)	72.7% [68.4–76.9]	70.5% [66.3–74.7]
African-Americans (n=987)	76.7% [72.8–80.6]	73.2% [69.1–77.3]
Asian-Americans (n=647)	79.0% [72.0–86.0]	67.2% [59.8–74.7]
	Ages 18–24	
	<i>truth</i> sm	TDS
Overall (n=4459)	67.9% [65.7–70.2]	53.1% [50.7–55.5]
Males (n=1874)	72.7% [69.5–75.9]	52.5% [48.8–56.1]
Females (n=2585)	62.9% [59.9–65.9]	53.8% [50.7–56.9]
Whites (n=2277)	68.3% [65.2–71.3]	50.5% [47.2–53.7]
Hispanics (n=816)	70.0% [65.2–74.9]	54.3% [48.9–59.6]
African-Americans (n=817)	67.4% [62.6–72.2]	64.9% [60.0–69.8]
Asian-Americans (n=369)	65.1% [55.3–74.9]	53.4% [43.6–63.3]

Table A-5. Receptivity Scores for Individual Ads — Fall 2000 LMMS-II [95% Confidence Interval]

	Ages 12–17				
	Body Bags	Daily Dose	Beach	Karate Class	Boy on Bus
Overall (n=6233)	3.12 [3.08–3.17]	2.98 [2.88–3.08]	2.93 [2.84–3.03]	2.80 [2.74–2.86]	2.44 [2.35–2.54]
Males (n=3045)	3.08 [3.01–3.15]	2.88 [2.76–3.01]	2.91 [2.78–3.04]	2.77 [2.69–2.86]	2.38 [2.24–2.51]
Females (n=3188)	3.17 [3.11–3.23]	3.10 [2.96–3.24]	2.97 [2.84–3.09]	2.82 [2.74–2.90]	2.54 [2.40–2.68]
Whites (n=3040)	3.11 [3.05–3.17]	3.03 [2.91–3.14]	2.94 [2.81–3.08]	2.77 [2.68–2.85]	2.23 [2.09–2.38]
Hispanics (n=1288)	3.17 [3.05–3.28]	2.93 [2.64–3.23]	2.92 [2.74–3.09]	2.83 [2.72–2.95]	2.62 [2.41–2.83]
African-Americans (n=987)	3.11 [2.95–3.26]	2.82 [2.58–3.06]	2.93 [2.75–3.09]	2.94 [2.84–3.05]	2.86 [2.73–2.99]
Asian-Americans (n=647)	3.22 [3.04–3.40]	2.95 [2.40–3.50]	2.79 [2.54–3.05]	2.68 [2.47–2.89]	2.17 [1.75–2.59]
	Ages 18–24				
	Body Bags	Daily Dose	Beach	Karate Class	Boy on Bus
Overall (n=4459)	3.04 [2.95–3.12]	2.76 [2.61–2.91]	2.65 [2.49–2.81]	2.51 [2.41–2.61]	2.18 [2.04–2.31]
Males (n=1874)	2.96 [2.83–3.09]	2.62 [2.38–2.86]	2.62 [2.40–2.83]	2.44 [2.27–2.62]	2.10 [1.89–2.31]
Females (n=2585)	3.13 [3.04–3.23]	2.94 [2.81–3.06]	2.71 [2.49–2.93]	2.57 [2.45–2.69]	2.27 [2.11–2.44]
Whites (n=2277)	2.98 [2.87–3.09]	2.69 [2.47–2.91]	2.63 [2.42–2.83]	2.38 [2.24–2.52]	1.85 [1.63–2.03]
Hispanics (n=816)	3.07 [2.92–3.23]	2.90 [2.64–3.16]	2.88 [2.59–3.17]	2.93 [2.74–3.13]	2.49 [2.21–2.77]
African-Americans (n=817)	3.25 [3.14–3.37]	3.00 [2.87–3.14]	2.72 [2.34–3.09]	2.74 [2.58–2.89]	2.48 [2.31–2.65]
Asian-Americans (n=369)	2.91 [2.74–3.07]	2.09 [1.04–3.12]	2.29 [1.81–2.76]	2.27 [1.59–2.96]	2.90 [2.27–3.54]

APPENDIX B: MEASURING AWARENESS OF SPECIFIC TOBACCO COUNTERMARKETING ADS

The **truthsm** ads included in the LMTS-II were chosen based on schedules provided to us by Arnold Communications, Legacy's advertising firm. The TDS ads were chosen based on ad tracking information from Video Monitoring Service. We included ads in the survey that were airing on TV in the weeks preceding the survey or were currently running during the survey period. Ads were presented in the surveys in random order.

Awareness of the campaign ads is estimated by asking questions with the following format: "Have you recently seen an antismoking or antitobacco ad on TV that shows..." followed by a very brief description of the beginning of the ad. "Body Bags," for example, shows a group of young people unloading large white body bags onto a city sidewalk from a truck parked outside of a major tobacco company. One teenager in the ad uses a megaphone to speak to the tobacco executives inside the building and asks if they know how many people tobacco kills everyday. The young people then leave the body bags in front of the building to provide a graphic display of 1,200 bodies to tobacco executives. Following the format described above, we ask about awareness of this ad in the following way: "Have you recently seen an antismoking or antitobacco ad on TV that shows young people unloading large white bags from a truck onto a city sidewalk?" If the respondent replies affirmatively, he/she is asked to describe what happened in the ad to confirm that they saw the ad. Throughout this report, we refer to this measure as confirmed awareness of the ad.

Telephone interviewers were provided video copies of all ads in the survey and are trained to probe respondents if the answers provided are too vague (e.g., tobacco, smoking, don't smoke). To facilitate the coding of responses by interviewers, the survey included coded responses for the interviewers that were not read to respondents. When the respondent's description did not closely match any of the response categories, the interviewer would capture the verbatim response. Each verbatim response was later coded to indicate whether or not the respondent saw the ad.

Respondents who indicated confirmed awareness of an ad were subsequently asked a series of questions about their reactions to that ad. These included questions about whether or not the respondent found the ad to be convincing, whether it grabbed their attention, whether it gave them good reasons not to smoke, and whether they talked to their friends about the ad. Each series of questions about confirmed awareness and reactions to the various ads was presented to the respondent in random order.

