

Content Class as a Contextual Cue in the Cognitive Processing of Publicity Versus Advertising

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Claims about the superiority of news over advertising are a cornerstone of public relations practice. Drawing on the dual processing models in social cognition (Chaiken, 1980, 1987; Petty & Cacioppo, 1986), this study defines the difference between news and advertising in terms of *content class*, a contextual variable that serves as a cue during cognitive processing of mediated messages. An experimental study using a $2 \times 2 \times 2$ factorial design ($N = 329$) manipulated content class, argument strength, and product involvement using 16 full-page prototype articles and ads for 4 products that might be found in a new college magazine. Content class interacted with product involvement to impact the amount of processing by participants (based on recall and cognitive responses measures) and with argument strength to bias message evaluations (based on valence of cognitive thoughts, believability assessments, and attitudinal-conative measures). The results provide only qualified support for claims about the superiority of news over advertising and suggest caution by public relations practitioners when promoting advantages of publicity.

Do people process information differently when it is presented in the form of news versus advertising? Public relations practitioners traditionally have promoted the superiority of publicity over other forms of promotion, particularly advertising. Claims generally center around the greater attention paid to news as well as the greater credibility of news. Practitioners frequently attribute this superiority to the third-party endorsement accorded by news workers who devote coverage to a product, service, or cause (for a review, see Hallahan, in press).

The notion that news is superior to advertising is corroborated in opinions expressed throughout communication literature (Alcalay & Taplin, 1989; Doob, 1948; Habermas, 1962/1989; Hallahan, 1996; McGuire, 1973; Reeves, Chaffee, & Tims, 1982; Schudson, 1984). The scanty empirical research conducted to date suggests that news leads to enhanced learning and recall (Cameron, 1994), greater believability (Schwarz, Kumpf, & Bussman, 1986), more positive attitudes (Salmon, Reid, Pokrywczski, & Willett, 1985; Straughan, Bleske, & Zhao, 1994), and higher behavioral intent (Schwarz et al., 1986; Straughan, Bleske, & Zhao, 1994). Other research, however, found no effect on behavioral intent but suggested that assessments of credibility are moderated by factors such as involvement and familiarity (Chew, Slater, & Kelly, 1995).

Separately, researchers have observed that individuals readily distinguish between news and advertising (Levitt, 1969) and process the two differently (McLeod, Pan, & Rucinski, 1988). Advertisements have been suggested as being more interesting and informative than news (Salmon et al., 1985). Ads also have been found to be comprehended more accurately (Jacoby & Hoyer, 1982, 1989), but individuals also impute meanings from ads that are different from news (Preston, 1967; Preston & Scharbach, 1971).

This study reports results of an experimental study that sought to examine claims about the cognitive processing of news and advertising by presenting participants the same information in both formats using stimuli material that follow conventions commonly found in media today, rather than a simple labeling procedure. This study extends previous research by conceptualizing the difference between news and advertising in terms of content class, a hitherto unexplicated communication variable, and by suggesting the process by which content class operates as a contextual source variable. Drawing on the dual processing models in the social cognition literature (Chaiken, 1980, 1987; Petty & Cacioppo, 1981a, 1981b, 1986), this study also examines the potential role of two explanatory variables in this process, namely involvement and argument strength. In so doing, this study frames this important question for public relations practitioners within a broader theoretical framework that has been the focus of extensive attention in recent years (i.e., alternative processing strategies used by audiences exposed to persuasive messages).

CONCEPTUALIZING DIFFERENCES BETWEEN ADVERTISING AND PUBLICITY

Communicators interested in promoting a product, service, candidate, or cause through the mass media primarily have two avenues available to them: advertising and publicity (Sandler & Secunda, 1993).

Advertising involves the purchase of time or space in public media. Most experts consider advertising the mainstay of marketing's promotion mix (McCarthy, 1960; van Waterschoot & Van Den Bulte, 1992). Although more costly than publicity, advertising allows a message sponsor to create and place a message in the media on a repeated basis, with a high level of control (Balasubramanian, 1991). The disadvantages cited for advertising center around the fact that people sometimes avoid ads (Cummings & Venkatesan, 1976), react negatively to persuasion attempts (Brehm, 1966), or discount messages through attributions about the sponsors' persuasive intent (Kelley, 1972; Settle & Golden, 1974; Sparkman, 1982).

Publicity, by contrast, involves obtaining editorial coverage of a product or service in the editorial or entertainment (i.e., nonadvertising) portions of media, particularly in the form of news. Publicity largely has been ignored as a serious research interest (Hallahan, 1996; Merims, 1972; Moran, 1990). As with advertising, people are exposed to publicity as part of daily living. However, publicity appears as part of media content that people actively search to obtain information or might simply scan for diversion. In publicity, a message's ultimate source is ambiguous to audiences, who often attribute the source to the media presenter or channel and often do not understand how information sources shape and subsidize media content (Gandy, 1982). Because publicity seekers must rely on the judgments of third-party gatekeepers and do not pay direct fees for placements, messages are believed to be beyond the control of the sponsor (Soley & Craig, 1992) and thus more credible (Hovland, Janis, & Kelley, 1953; Hovland & Weiss, 1953; Robinson & Kohut, 1988). However, this advantage is offset by a lack of control over the message by the sponsor and by limited opportunities for repetition within the same vehicle.

Content Class: Differentiating News Versus Advertising

Conventional wisdom in the public relations practice suggests that the superiority of news is a property inherent in editorial material, the implied endorsement carried in editorial coverage of a product, service, or cause, for example. However, differences between news and advertising (or entertainment) can be better conceptualized as a process of differential inference making by audiences (Markus & Zajonc, 1985), based on the content class in which the message appears.

Content class is defined here as a classification variable for differentiating media content based on the perceived purpose of the communication. Anderson and Meyer (1988) suggested that each of the major categories of media content follows a distinct set of conventions and that different rules or "contracts" apply between the message producer and audience. Under the *reality* contract for news, audiences believe information is real, important, and could affect their lives. Under the *ad-*

vertising contract, a message sponsor's persuasive intent is understood and dictates that audiences scrutinize messages. Under the *entertainment* or fantasy contract, audiences understand that they should suspend belief.

Content class operates as a contextual source variable. Balsam (1985) defined *context* as all aspects of an experiential environment presented concurrently with a stimulus¹ and that modulate the control exerted by other stimuli. Among the ways context operates is through *stimulus generalization*, wherein the physical context in which a stimulus occurs affects perception of the stimulus, and thus, the "relationship between the cue and the context ... defines a physical stimulus" (p. 5). Content class operates latently (i.e., without being manifested or contained in the message itself) and is inferred (correctly or incorrectly) by the audience.²

This study diverges from previous research about third-party endorsement effects, notably Cameron (1994), by conceptualizing content class effects as an on-line process that occurs as people process information (Hastie & Park, 1986), rather than a memory-based phenomenon in which audiences recall the source of a message from memory and take that information into account when evaluating information. Audience members are hypothesized to use the context in which the message is being presented as a cue as they deftly shift between messages of varying content classes found in media, based on media literacy skills acquired through experience (Huston & Wright, 1983).

During the preattention period of processing (Greenwald & Leavitt, 1984), individuals are hypothesized to categorize content based on formal features and the setting in which the message appears. In turn, audience members invoke alternative proven rules for processing through a priming process that activates the particular associative networks or hierarchical cognitive knowledge structures, or schemas, that appear to be appropriate in a given situation (Higgins, Bargh, & Lombardi, 1985).³

¹The idea that format influences perception of content was suggested earlier by Ausubel (1960), who identified *advanced organizers* as structures of a message that operate as prereading events and help readers use background information they already know as an aid in interpreting a message. The notion of content class parallels, but differs from, Trevisani and Weigold's (1993) *channel attribution construct*, which they described as an indirect media effect involving audience perceptions about the channel (medium).

²Contextual message effects have been the focus of extensive research in advertising and consumer behavior in recent years (e.g., Bryce & Olney, 1988; Han, 1992; Lord & Burnkrant, 1988; McClung, Park, & Sauer, 1985; Murry, Lastovicka, & Singh, 1992; Pavelchak, Antil, & Munch, 1988; Saliba, 1992; Soldow & Principe, 1981; Yi, 1990).

³Thus, audiences invoke either a *news schema* or *advertising schema* (or *entertainment schema*) each time they encounter a message in the media. Separately, Wright (1987) suggested that knowledge about persuasion (*schemer schema*) serves as a control schema that moderates processing of messages.

Dual Processing Models

This conceptualization of content class as a contextual cue fits neatly within the theoretical framework of the dual processing models found in the social cognition literature. Most notably, these include the Elaboration Likelihood Model (ELM; Petty & Cacioppo, 1981a, 1981b, 1986; Petty & Priester, 1994) and the Heuristic-Systematic Model (HSM; Chaiken, 1980, 1987; Chaiken, Liberman, & Eagly, 1989).

The ELM and HSM are strikingly similar despite several important conceptual differences. Both models suggest that individuals strive to make correct judgments but exert varying levels of effort to process information, that is, elaborate on a message. Individuals with high motivation and ability are posited to process information effortfully (Petty & Cacioppo, 1986) or systematically (Chaiken, 1987). Individuals with low motivation and ability find it sufficient to rely on simple peripheral cues (Petty & Cacioppo, 1986) or heuristics (Chaiken, 1980), such as content class.⁴

Petty and Cacioppo (1986) defined peripheral cues as “stimuli in the persuasion context that can affect attitudes without necessitating processing of the message arguments” and operate by triggering affect or invoking “guiding rules” (Petty & Cacioppo, 1986, p. 18).⁵ By comparison, Chaiken suggested that heuristic processing can involve any variable in which a judgment is mediated by a simple decision rule (Tversky & Kahneman, 1974). Chaiken specified that the use of heuristics is driven by the availability and accessibility (Higgins & Bargh, 1987) of information stored in memory in the form of schemas. Both models suggest that persuasion resulting from peripheral route or heuristic processing is less stable, more susceptible to counterpersuasion, and less predictive of behavior.

⁴Content class, when treated as a contextual variable, can be viewed with the framework of the role of context factors in the ELM model generally. ELM researchers have used the model to investigate the effect of the *number of sources* (Petty & Cacioppo, 1986), *source independence* (Harkins & Petty, 1987), *distraction* (Moore, Hausknecht, & Thamodaran, 1986), *repetition* (Schumann, Petty, & Clemons, 1990), and *order of presentation* (Haugtvedt & Wegener, 1994). ELM researchers have also conceptualized as peripheral cues *source expertise and credibility* (Petty, Cacioppo, & Goldman, 1981), the *celebrity or noncelebrity status* of the source (Cole, Ettenson, Reinke, & Schrader, 1990; Heath, Mothersbaugh, & McCarthy, 1993; Hennessey & Anderson, 1990; Petty, Cacioppo, & Schumann, 1983), *source attractiveness* (Cole et al., 1990; Haugtvedt, Petty, Cacioppo, & Steidley, 1988; Moore et al., 1986), and *source favorableness* (Andrews & Shimp, 1990).

⁵The ELM defines *relatively biased processing* as occurring when variables such as content class encourage or inhibit the generation of either favorable or unfavorable thoughts. Petty and Cacioppo (1986) described biased processing as elaboration that is governed by a “top-down” form of processing wherein elaboration might be governed by a relevant attitude schema that guides processing in a manner that favors maintenance of strengthening of the original schema.

HYPOTHESIS

Most claims by public relations practitioners about the superiority of news versus advertising suggest that the content class effect favoring news is universal and unconditional. However, the dual processing models suggest that various factors related to motivation and ability can moderate the processing of persuasive messages. This study sought to investigate the effects of content class by experimentally manipulating two of the moderating variables commonly examined in dual processing research, argument strength and involvement.

Message Quality and Strength

Both the ELM and HSM recognize the important role that message quality plays in persuasion. Under the ELM, Petty and Cacioppo (1981a, 1981b) differentiated between strong and weak arguments. Their original conceptualization defined a strong message as one that generated predominantly favorable responses among participants when they are asked to think about the message, whereas a weak message generated predominantly unfavorable thoughts. More recently, in response to criticisms (Areni & Lutz, 1988; Boller, Swasy, & Munch, 1990), ELM researchers have shifted to a relational approach that emphasizes “stronger” and “weaker” arguments (Petty, Schumann, Richman, & Strathman, 1993; Petty & Wegener, 1991). By contrast, the HSM has focused on argument quality or strength in terms of message ambiguity, which has been operationalized based on the mere number of arguments presented (Chaiken, 1980), the importance or relevance of the copy points (Chaiken & Maheswaran, 1994), and the consistency or inconsistency of the arguments presented (Maheswaran & Chaiken, 1991).

Involvement

Involvement, a motivation variable, has received extensive examination in consumer behavior but considerably less attention in communication (Chaffee & Roser, 1986; J. E. Grunig, 1978, 1989, 1997; Salmon, 1986).⁶ Because the term has been applied variously as a property term of individuals, products, and behaviors, the involvement construct suffers from a multiplicity of definitions (Greenwald &

⁶In public relations, Heath and Douglas (1990, 1991; see also Heath, 1994, 1997) recognized the critical part that involvement plays in the audience responsiveness to messages and to issues. Similarly, involvement is a central construct in J. E. Grunig's situational theory (J. E. Grunig, 1978, 1989, 1997), which focuses on the degree to which people feel “connected” to an issue as a predictor of the probability people will become active members of a public concerned with issues.

Leavitt, 1984; Johnson & Eagly, 1989, 1990; Park & Mittal, 1985; Salmon, 1986). Among researchers who have examined dual processing theories, Petty and Cacioppo (1986) focused on *issue involvement* or *personal relevance*, which they defined as “intrinsic importance, personal meaning, and consequences” (pp. 82–83). In a similar way, HSM researchers have addressed *response involvement* and *personal relevance* (Chaiken, 1980), *topic relevance* (Liberman & Chaiken, 1992, 1996), and *task importance* (Chaiken & Maheswaran, 1994; Maheswaran, Mackie, & Chaiken, 1992).

Involvement can be distinguished further as situational involvement or enduring involvement (Houston & Rothschild, 1978). *Situational involvement* occurs whenever individuals must make a decision or perform a task, even if they have little prior experience or interest in the action at hand. An example is purchasing replacement plumbing or furnace parts for one’s home. Situational involvement is transitory and can vary over time based on the number, magnitude, and duration of its consequences (Petty & Cacioppo, 1986). By contrast, *enduring involvement* pertains to the ongoing importance or relevance of a topic to individuals in their daily lives. Although individuals might seek out information in the media to help solve a problem, enduring involvement is probably the more useful dimension of involvement that drives patterns of media consumption over a wide range of topics.

This study focused specifically on *product involvement*, a form of enduring involvement, because product promotion is the domain in which comparisons between advertising and publicity are particularly relevant. Many marketers are especially interested in the value of publicity vis-à-vis advertising. Zaichkowsky (1985) defined product involvement as “a person’s perceived relevance of the object based on inherent needs, values, and interests” (p. 342). Products have been categorized variously as high- or low-involvement products (Beardon, Netmeyer, & Mobley, 1993; Kapferer & Laurent, 1985–1986; Laurent & Kapferer, 1985; McQuarrie & Munson, 1987; Mittal & Lee, 1988; Traylor & Joseph, 1984; Zaichkowsky, 1985, 1986). High-involvement products have been described as relevant, unusual, difficult to understand, risky, or otherwise worthy of a consumer’s attention. Low-involvement products, by contrast, are commonplace, easy to use, involve minimal risk or consideration, stimulate little interest, or are simply not available to consumers locally.

Predictions Under Dual Processing

Both the ELM and HSM suggest that argument strength and involvement interact to influence the effects of a peripheral or heuristic cue, such as content class. Argument quality is predicted to have its principal persuasive influence among individuals with high motivation (such as high product involvement). A peripheral cue (ELM) or heuristic (HSM) would be expected to have no effect (ELM) or minimal

effect (HSM) among the same group. On the other hand, among individuals with low motivation (e.g., low product involvement), both models suggest that peripheral cues or heuristics allow audiences to use a simple cue, such as content class, to make a summary judgment without attending to the arguments presented. Thus, the familiar saw, "If it's in the news, it must be true."

This study used this proposition to examine the possible effects of news versus advertising and framed its principal research question in the form of the following testable hypothesis:

- H1a: Under conditions of high motivation (i.e., high product involvement), argument strength—not content class—leads to greater persuasion.
- H1b: However, under conditions of low motivation (i.e., low product involvement), content class has greater persuasive impact.

Measuring Content Class Effects

To test this hypothesis, this study identified a hierarchy of five dependent measures in which the hypothesized findings might be detected. Going beyond the more limited dependent measures found in earlier research, these included measures that focused on the amount of *message processing* in which audiences engaged (recall and number of cognitive thoughts generated), as well as measures dealing with *message evaluation* (valence of thoughts, believability assessments, and attitudinal or behavioral change).

Recall is the ability to retrieve and reconstruct from memory specific information and represents the pass-through acquisition of message content (Cameron, 1994; du Plessis, 1994; Petty, Cacioppo, & Schumann, 1983; Singh & Rothschild, 1983; Singh, Rothschild, & Churchill, 1988). If individuals are prompted to attend to news more than advertising (Simon, 1986), it would be expected that they engage in more extensive processing and should be able to recall more details in news messages compared to ads.

Number of cognitive thoughts draws on cognitive response theory, which suggests that persuasion is moderated by the level and type of responses generated by audiences (Greenwald, 1968; Petty, Ostrom, & Brock, 1981). Cognitive response theorists suggest that memory processes go beyond the simple pass-through acquisition of knowledge. Instead, audiences react to persuasive messages and incorporate those reactions into the information stored in memory. Significantly, these elaborated thoughts are what are recalled and serve as the basis for subsequent behavior (Markus & Zajonc, 1985). Cognitive response researchers have demonstrated that the extent of processing, or the amount of thinking in which a person engages, can be measured by asking participants to verbalize and list their thoughts at the time they had processed a particular message. Because news is supposed to

inform, it was hypothesized that people would be more willing to process news more elaboratively than advertising because the information might be viewed as more valuable to them and would not be dismissed as merely a persuasion attempt to sell them something.

Valence of thoughts, which also draws on cognitive response theory, involves the types (rather than number) of thoughts generated (Cacioppo & Petty, 1981; Petty & Cacioppo, 1986). Thought valence can be defined as the proportion of positive versus negative thoughts. Wright (1973) argued that positive thoughts (support arguments and source bolstering) are a necessary condition for the acceptance of persuasive messages. If news is more expert and trustworthy, it was posited that news messages would generate more positive thoughts while generating fewer negative responses in the form of counterarguments and source derogations.

Believability assessments represent a self-reported assessment by respondents about the degree of skepticism or incredulity generated by the message (Cozzens & Contractor, 1987; Gunther, 1992). Consistent with prior research on source credibility, it is reasonable to expect that higher believability leads to greater message acceptance, although the long-term impact might be questionable (e.g., the sleeper effect; Allen & Stiff, 1989).

Attitudinal-behavioral measures. Finally, it was hypothesized that content class effects can be measured through attitudinal-behavioral measures commonly used in consumer research. *Attitude toward the message* incorporates both news and advertising as an extension of the more narrowly defined attitude toward the ad (Aad) construct found in the advertising literature. Aad has been shown to be an important mediating variable that can influence assessments about brands featured in ads (Lutz, 1985; Mackenzie & Lutz, 1989; Mackenzie, Lutz, & Belcher, 1986; Mitchell & Olson, 1981). *Attitude toward the brand* is a special case of the generic *A(o)* construct used by marketing researchers in assessments of the products (Heath & Gaeth, 1994), representing a measure of cognitive and affect response to the topic of the message (vs. the message). *Purchase intent* is a special case of behavioral intention (Ajzen & Fishbein, 1977; Sheppard, Hartwick, & Warshaw, 1988) and represents a self-reported probability statement that a particular behavior (e.g., product purchase) will be undertaken. Because these three measures are often highly correlated, their combined effects are often treated as single attitudinal measure of message effectiveness or persuasiveness.

METHOD

To investigate content class effects, a mixed factorial experiment was conducted among undergraduates at a university in the upper Midwest. The $2 \times 2 \times 2$ factorial design manipulated content class (news vs. advertising) and argument strength

(strong vs. weak) across participants. Product involvement (higher vs. lower) was treated as a within-subjects factor.

Participants ($N = 329$) were randomly assigned to conditions to read four promotional messages pertaining to products of potential interest to college students. The pretext of the study was that students were helping evaluate articles and ads for a new monthly *Collegiate* magazine. Immediately on reading the messages, participants completed a questionnaire that captured all data used in the analysis. The session took about 50 min and was conducted in a classroom setting; participants earned extra credit in one of several courses from which participants were recruited.

Stimuli Materials

A set of 16 stimuli pages messages were created—half in the form of ads and half in the form of news. For each of the four products, a distinct ad format was created following generally accepted advertising conventions. Then, the arguments presented in the ad were varied as either strong or weak (see next section). Using a format similar to a newsweekly, corresponding editorial features were then created using the same art elements as the advertising and the same arguments found in the strong and weak ads, respectively. Each participant read four target stimuli—one message for each for the four products. The prototype magazine included a cover, a publisher's letter, and two filler items in front of and at the end of the targeted messages. Stimulus messages were counterbalanced based on products, content classes, and arguments to eliminate order effects.

Independent Variables

Content class was operationalized as messages presented in either article or ad form. In lieu of a simple labeling procedure (Cameron, 1994; Chaiken & Maheswaran, 1994; Hennessey & Anderson, 1990; Schwarz, Kumpf, & Bussman, 1986), actual magazine pages were produced to simulate as closely as possible normal media processing. Special effort was made to eliminate unintended sources of variance. Both ads and articles used the same illustrations and headlines. The length of each message was approximately the same, and the same arguments were presented in approximately the same order in both. One consequence was that the advertising copy used was somewhat longer than might be found otherwise.

Product involvement. To operationalize two levels of product involvement, a list of 35 potential products was developed, based on previous product involvement research (Kapferer & Laurent, 1985–1986; Laurent & Kapferer 1985; McQuarrie & Munson, 1987; Zaichkowsky, 1985). From this list, a panel of students ($N = 173$) was asked to rate each of the products on a six-item, 7-point seman-

tic differential scale. The items were drawn from the importance dimension of Zaichkowsky's product involvement inventory and included *matters to me/doesn't matter to me*, *important to me/not important to me*, *relevant to me/not relevant to me*, *of concern to me/of no concern to me*, *means a lot to me/ means nothing to me*, and *involving/not involving*. Items were randomly reversed, then recoded for consistency of direction, where 7 indicates *highest involvement* and 1 indicates *lowest involvement*. From these ratings, four products were chosen for inclusion: shampoo, soda, flashlight-type batteries, and college spiral-bound notebooks.

A fictitious brand identity and positioning theme was then created for each product: natural-oil enriched shampoo (Aztec brand), an imported soda with natural fruit flavors (Coalinga Cooler), environmentally safe batteries (EcoSpark), and customized notebooks that improved note-taking and allowed students to earn better grades (Take Note!). The use of fictitious brands was designed to eliminate systematic variance resulting from pre-existing preferences for extant brands.

Argument quality. In operationalizing argument quality, it was decided to focus on argument strength, the mainstay of most ELM research, to equalize the nature of the messages as much as possible. An effort was made to create claims that might be expected to be found in either an ad or news story supplied by a manufacturer but that varied in intensity and avoided negative valence or meaningless hype. This procedure is consistent with Areni and Lutz's (1988) distinction between argument strength and argument valence contained in their critique of early ELM research. This parallels the procedure used by Miniard, Bhatla, Lord, Dickson, and Unnava (1991) as well as Petty, Schumann, Richman, and Strathman (1993).

For each of the selected products, background information was collected from manufacturers and sources, such as *Consumer Reports*, to identify a set of 14 to 17 attributes applicable for each product. A copy platform was then created that featured an ideal persuasive claim for the product and served as the basis for messages containing strong arguments. A corresponding claim that was considered plausible, but less compelling, was then created for each of the attributes. These served as the basis for constructing weak messages. For example, as 1 of the 59 pairs of copy points constructed, the contrasting claims for the shampoo were as follows:

- Strong: Aztec contains 5.5% avocado oil in addition to other natural cleansing agents.
- Weak: Aztec contains 1/8th of 1% avocado oil, which works together with its active detergent and cleaning agents to cleanse your scalp.

While still in the copy platform stage, before preparing the final text, the strength and believability of the claims were pretested. Each claim for a product was randomly assigned into one of two questionnaires for each product—a total of eight different three-page surveys. Claims were reproduced verbatim, followed by

four 7-point semantic differential measures. Students in a separate pretest pool ($N = 119$) were randomly assigned to complete separate questionnaires on two different products. Each student in the pretest saw only one set of claims for each product, resulting in 60 pairs of student evaluations (strong vs. weak versions) for each claim. A 3-item strength index for each argument was computed by taking the mean of the *strong/weak*, *powerful/not powerful*, and *convincing/not convincing* items, using a 7-point scale where 7 indicates *strong* and 1 indicates *weak*. In 54 of the 59 original sets of claims, the strong arguments were found to be stronger statistically (paired t tests, all significant at $p \leq .01$). The remainder were all in the correct direction but fell short of significance levels. These claims were modified to assure that two sets of arguments were created that, in fact, represented levels of stronger and weaker argument strength. A separate analysis of the fourth semantic differential item, *believable/not believable*, suggests that participants similarly found the strong arguments to be more believable than the weak arguments (t tests, all $p < .01$).

Dependent Measures

Recall and cognitive responses. Immediately after reading the stimulus materials, participants were given 3 min, on an unaided basis, to write down everything they could remember about what they had read, following cognitive thought-listing procedures (Cacioppo & Petty, 1981; Greenwald, 1968; Slater, Chipman, Auld, Keefe, & Kendall, 1992). Then, on separate sheets that identified the topic of each message (e.g., college notebooks), students were asked on an aided basis to respond to the following questions: What was said? What were your thoughts and feelings at the time? What made this message persuasive or not persuasive?

Recall comments were analyzed by determining the percentage of readers who could recall the brand name as well as by counting the number of attributes or copy points recalled. Cognitive responses (i.e., elaborations or comments, as opposed to merely points recalled from the message) were similarly counted and classified as negative or positive. Cognitive responses were broken down further as being product-related or nonproduct thoughts, that is, any extraneous comments not pertaining to the product itself. These ranged from comments about the source, sponsor, and format of messages to extraneous comments unrelated to the study. Analyses were conducted by a coder blind to the hypotheses and validated by a second coder, who examined a random sample of responses representing 20% of responses. The 91% concurrence rate provided evidence of adequate coder reliability.

Believability and attitudinal measures. Bipolar, 7-point semantic differential scales were used to measure believability assessments and the attitudinal-be-

havioral measures. Half of the items were randomly reversed in direction and later recoded for consistency of valence where 7 indicates *high* and 1 indicates *low*. For each of these scales, a mean index was computed and used as the basis for analysis.

Believability was operationalized using a 5-item scale that included *informative/not informative*, *trustworthy/untrustworthy*, *accurate/inaccurate*, *convincing/unconvincing*, and *believable/not believable*.

Attitude toward the message was obtained by asking participants to complete the sentence, "The message on [name of product] was ...," using a 5-item scale composed of *interesting/boring*, *attention-getting/not attention-getting*, *good/bad*, *liked it/didn't like it*, and *fun/not fun*.

Attitude toward the brand was measured by asking participants to complete the sentence, "I would describe [name of product] as ...," using a 6-item scale composed of *good/bad*, *pleasant/unpleasant*, *high quality/low quality*, *like it/don't like it*, *desirable/not desirable*, and *favorable/unfavorable*.

Behavioral (purchase) intent was measured by asking participants to describe their plans to purchase each of the products, assuming the products were available in their area, using a 4-item scale made up of *intend to/don't intend to*, *likely to/not likely to*, *don't plan to/plan to*, and *willing to/not willing to buy the product*.

RESULTS

Manipulation Checks

All scales demonstrated adequate reliability (all Cronbach's $\alpha \geq .85$). No confounds were detected based on the several demographic measures incorporated in the study including gender, major (communication or other), size of hometown, or grade point average.

Manipulation checks for content class showed the participants correctly classified each message (all *t* tests were significant at $p \leq .001$). The manipulation check for ads was composed of a three-item, 7-point semantic differential scale composed of *looked like an ad/didn't look like an ad*, *read like an ad/didn't read like an ad*, and *was an ad/wasn't an ad*, where 7 indicates *thought the message was an ad* and 1 indicates *didn't think the message was an ad*. A separate, corresponding scale was used to verify respondents correctly identified news. Similarly, an argument strength manipulation check, using the same items used in the pretest, found that the strong arguments, in fact, were rated as stronger at statistically significant levels for soda, batteries, and notebooks (all at $p \leq .01$). However, the argument strength for shampoo, although in the predicted direction, fell short of statistical significance (strong, $M = 3.85$; weak, $M = 3.64$, $p \leq .22$).

A manipulation check showed that two distinct classes of products with varied levels of involvement were created successfully. Using the same six-item semantic

differential product involvement scale from the pretest, scores showed that spiral-bound notebooks that promised easier note taking ($M = 5.03$, $SD = 1.53$) and environmentally safe batteries ($M = 4.88$, $SD = 1.61$) produced comparatively higher levels of involvement. By contrast, the fictitious imported soda featuring fruit juice ($M = 4.53$, $SD = 1.48$) and the natural shampoo ($M = 3.91$, $SD = 1.75$) produced lower levels of involvement. The differences in the product involvement scores between products across groups were statistically significant (t tests, all $p \leq .01$), and a subsequent factor analysis showed that the four products neatly collapsed into two distinct groups with virtually no overlap across factors. Using a repeated measures multivariate analysis of variance (MANOVA) procedure, the results for the two product categories were then collapsed into a single measure to enhance the stability of the measures and reduce the vagaries stemming from the use of a single product in making comparisons. The results for notebooks and batteries thus were collapsed and termed *higher involvement products*, whereas the results for soda and shampoo were combined as *lower involvement products*.

Overview of Findings

No support was founded for the hypothesized prediction, based on the ELM and HSM, that individuals who were highly involved with a product would be primarily influenced by argument quality and that individuals with low product involvement would be persuaded primarily by the content class in which the message appeared, that is, news versus advertising. Such a finding would have been evident by the presence of three-way interactions involving content class, argument strength, and product involvement for the principal dependent measures.⁷

Similarly, the results suggest no evidence that news is universally superior to advertising. Nevertheless, the findings reveal important results, which can be summed up in terms of two separate sets of two-way interactions. These are summarized in the right column of Table 1.

The data suggest that content class interacted with product involvement to affect the *amount of processing* in which participants engaged, whereas argument strength interacted with content class to moderate *message assessments*. These two sets of findings are examined separately.

⁷This study parallels the nonsignificant results reported by Petty et al. (1993), who followed similar procedures. This study joins a long series of studies that have failed to replicate dual processing findings, particularly ELM findings that use any operationalizations other than those concocted originally by Petty and Cacioppo and their colleagues (Allen, 1991; Allen & Reynolds, 1993; Bitner & Obermiller, 1985; Eagly & Chaiken, 1993; Hamilton, Hunter, & Boster, 1993; Johnson & Eagly, 1989, 1990; Kahle & Homer, 1985; Miniard, Dickson, & Lord, 1988; Mongreau & Stiff, 1993; Stiff, 1986; Stiff & Boster, 1987; for responses, see Petty, Kasmer, Haugtvedt, & Cacioppo, 1987; Petty, Wegener, Fabriger, Priester, & Cacioppo, 1993).

TABLE 1
Main Effects for Content Class

	<i>All</i>		<i>News</i>		<i>Advertising</i>		<i>F</i>	<i>p</i>	<i>Content Class Interactions</i>
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>			
Process measures									
Recall									
Brand name (%)	.558	.48	.555	.49	.560	.49	.49	.793	Product involvement
Attributes (number)	3.333	1.83	3.395	1.85	3.270	1.83	2.44	.122	Product involvement
Number of cognitive thoughts									
Total	3.321	1.62	3.362	1.68	3.279	1.56	1.53	.216	None
Product-related	2.579	1.61	2.633	1.68	2.521	1.54	2.48	.115	None
Nonproduct	.743	1.16	.729	1.16	.758	1.17	.34	.561	Product involvement
Evaluative measures									
Valence of thoughts (% positive)									
Total	.559	.42	.603	.40	.516	.43	17.03	.001	Argument strength
Product-related	.611	.43	.667	.40	.556	.44	23.34	.001	Argument strength
Nonproduct	.338	.45	.342	.45	.334	.45	3.47	.074	Product involvement
Believability assessments	4.794	1.36	4.968	1.32	4.619	1.39	25.27	.001	Argument strength
Attitudinal measures									
Combined ^a	4.501	1.61	4.724	1.56	4.278	1.65	26.54	.001	Argument strength
Attitude toward message	4.551	1.54	4.767	1.45	4.334	1.59	28.25	.001	Argument strength
Attitude toward brand	4.749	1.58	4.951	1.49	4.545	1.65	23.99	.001	Argument strength
Purchase intent	4.207	2.11	4.459	2.08	3.955	2.11	19.25	.001	Argument strength

Note. Believability and attitudinal measures based on 7-point semantic differential scale ranging from 1 (*low*) to 7 (*high*).

^aBased on multivariate analysis of variance procedure combining Attitude Toward Message \times Attitude Toward Brand \times Purchase Intent, with $F(2, 321)$ degrees of freedom.

Interaction of Content Class and Product Involvement for Process Measures

The main effects data in Table 1 provide no evidence that news is superior to advertising on any of the process measures. News and advertising classes performed equally in terms of brand name recall, attribute recall, and number of cognitive responses generated.

Curiously, however, the data in Table 2 suggest significant differences in the amount of processing in which people engaged based on product involvement. At first glance, these appear to be counterintuitive. Brand names for lower involvement products (i.e., soda and shampoo; $M = 60\%$) were recalled more than for higher involvement products (i.e., college notebooks and environmentally safe batteries; $M = 51\%$). Similarly, participants recalled more attributes and copy points about lower involvement products ($M = 3.647$) than for higher involvement products ($M = 3.013$). Finally, although participants generated about the same number of cognitive thoughts overall (lower involvement products: $M = 3.352$; higher involvement products: $M = 3.291$), $F(1, 327) = .78, p \leq .30, ns$, the makeup of those thoughts was different when the product-related and nonproduct thoughts are compared. Higher involvement products ($M = 2.693$) generated a larger number of product-related thoughts compared to lower involvement products ($M = 2.465$). The pattern was reversed for nonproduct thoughts: Lower involvement products ($M = .826$) produced significantly more nonproduct thoughts compared to higher involvement products ($M = .659$).

These unexpected findings can be explained by examining the recall measure results in Table 3, which details a strong Content Class \times Product Involvement interaction. The data suggest wide variation for the amount of processing based on product involvement for the news condition, whereas the scores for advertising hovered within a very narrow range and were not influenced by product involvement.

In the case of brand name recall, only 46% of participants could recall a reasonable approximation of the name for higher involvement products when presented as news, whereas 65% who read news could recall the brand names for the lower involvement products. Brand name recall was virtually the same for both groups (65%) when presented as advertising, $F(1, 327) = 8.18, p \leq .005$. For attribute recall, a slightly different pattern was evident. The attribute recall for higher involvement products was roughly similar between news and advertising (news: $M = 2.956$; ads: $M = 3.081$), whereas lower involvement product ads produced greater attribute recall ($M = 3.457$). Reading the news story about lower involvement products produced the greatest recall of all at a marginally significant level ($M = 3.833$), $F(1, 327) = 3.19, p \leq .055$.

These results suggest that reading information as news about products in which they had low involvement might have provided an incentive to process the mes-

TABLE 2
Main Effects for Argument Strength and Product Involvement

	Argument Strength		Product Involvement	
	Strong	Weak	Higher	Lower
Process measures				
Recall				
Brand name (%)	.570	.545	.512	.603***
Attributes (number)	3.416	3.249	3.013	3.647***
Number of thoughts				
Total	3.305	3.360	3.352	3.291
Product-related	2.559	2.550	2.693	2.465***
Nonproduct	.706	.781	.659	.826***
Evaluative measures				
Valence of thoughts (% positive)				
Total	.656	.462***	.587	.531**
Product-related	.721	.501***	.622	.600
Nonproduct	.387	.296**	.405	.284*
Believability	4.980	4.319***	4.976	4.613**
Attitudinal and conative				
Combined ^a	4.823	4.127***	4.519	4.481
Attitude toward message	4.780	4.319***	4.450	4.652**
Attitude toward brand	5.064	4.443***	4.882	4.616***
Purchase intent	4.643	3.769***	4.228	4.182

Note. Believability and attitudinal measures based on 7-point semantic differential scale ranging from 1 (*low*) to 7 (*high*).

^aBased on multivariate analysis of variance procedure combining Attitude Toward Message × Attitude Toward Brand × Purchase Intent, with $F(2, 321)$ degrees of freedom.

* $p \leq .05$. ** $p \leq .01$. *** $p \leq .001$.

TABLE 3
Product Involvement × Content Class Interactions

	Higher Product Involvement				Lower Product Involvement			
	News		Ads		News		Ads	
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>
Recall measures								
Brand name (%)	.461*	.49	.563	.49	.648*	.47	.557	.55
Attributes (number)	2.956*	1.70	3.081	1.78	3.833*	1.80	3.457	1.86
Nonproduct thought measures								
Number of thoughts	.565*	1.15	.754	1.24	.890*	1.27	.762	1.06
Valence of thoughts (% positive)	.451*	.47	.367	.47	.265*	.41	.304	.43

*Interactions for news significant at $p \leq .001$.

sage more thoroughly, which would explain the overall higher recall of brand names and product attributes. Although an interaction similar to the recall findings was not found for cognitive thoughts related to the products themselves (interaction $F < 1$), a similar pattern to the recall data was found for the nonproduct-related comments. News for higher involvement products resulted in the fewest nonproduct thoughts ($M = .565$), whereas lower involvement products produced the largest number of nonproduct comments ($M = .890$), $F(1, 327) = 3.47, p \leq .063$. Although these results are statistically significant at only a marginal level, their importance becomes clearer when the valence of these same nonproduct thoughts is considered (Table 3, nonproduct thought measures). Reading about high-involvement products in the form of news generated the most positive comments ($M = .451$) compared to the other groups, whereas the lowest proportion of positive thoughts was found for the lower involvement product messages presented as news ($M = .265$), $F(1, 26) = 4.24, p \leq .049$. This suggests that readers engaged in less counterarguing about products for which they have high levels of involvement. Again, the difference in the findings for higher and lower involvements varied within a very narrow range when the same information was presented as advertising.

Interaction of Content Class and Argument Strength for Evaluative Measures

Separate from the process measures discussed in the previous section, a separate set of Content Class \times Argument Strength interactions were found for the evaluative measures that qualified the main effects in Table 1. Argument strength moderated the influence of content class on the valence of cognitive thoughts generated and as well as attitudinal-behavioral measures. Specifically, the presence of weak arguments worked to lower message assessments for advertising.

Table 4 reveals an overall pattern of interactions in which no statistically significant differences were discerned among news and ads presented with strong arguments or news presented with weak arguments. However, the presentation of weak arguments in ads produced significantly lower message evaluations. This pattern was unaffected by levels of product involvement (see Table 2).

The interactive effect is most evident in the scores for the believability and attitudinal-behavioral measures in the right column of Table 4. Ads with weak arguments were judged less believable ($M = 4.794$; weak ads: $M = 4.369$), $F(1, 322) = 5.31, p \leq .021$. When examined using a MANOVA procedure, the combined effects of attitude toward the message, attitude toward the brand, and purchase intent were similarly significant ($M = 4.50$; weak ads: $M = 3.819$), $F(2, 321) = 11.48, p \leq .001$. Thus, so were the effects for each of the underlying measures: attitude toward the message, $F(1, 327) = 3.189, p \leq .005$; attitude toward the brand, $F(1, 327) = 14.07, p \leq .001$; and purchase intent, $F(1, 322) = 8.02, p \leq .001$.

TABLE 4
Effects of Content Class and Argument Strength on Evaluative Measures

	<i>Strong Arguments</i>				<i>Weak Arguments</i>			
	<i>News</i>		<i>Ads</i>		<i>News</i>		<i>Ads</i>	
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>
Evaluative measures								
Valence of thoughts (% positive)								
Total thoughts	.672	.39	.639	.41	.532	.40	.343	.41
Product-related (<i>ns</i>)	.758	.37	.686	.41	.577	.42	.425	.43
Nonproduct (<i>ns</i>)	.378	.46	.396	.47	.312	.44	.282	.43
Believability assessment	5.090	1.29	4.895	1.34	4.869	1.33	4.369*	1.40
Attitudinal and conative measures								
Combined ^a	4.916	1.56	4.736	1.53	4.539	1.51	3.819***	1.61
Attitude toward message	4.895	1.47	4.666	1.49	4.639	1.43	4.002***	1.61
Attitude toward brand	5.138	1.46	4.989	1.53	4.773	1.50	4.100***	1.65
Purchase intent	4.733	2.11	4.552	1.98	4.181	2.02	3.361**	2.06

Note. Believability and attitudinal measures based on 7-point semantic differential scale ranging from 1 (*low*) to 7 (*high*).

^aBased on multivariate analysis of variance procedure combining Attitude Toward Message \times Attitude Toward Brand \times Purchase Intent, with $F(2, 321)$ degrees of freedom.

* $p \leq .05$. ** $p \leq .01$. *** $p \leq .001$.

.005. Note that the same trend could be detected for product and nonproduct thought valences. However, only the results for total thoughts approached statistical significance ($M = .559$; weak ads: $M = .343$), $F(1, 300) = 3.52$, $p \leq .062$.

DISCUSSION

These results shed important insights on the role that content class might play in the processing of persuasive messages when sponsors have the option of presenting information as either news or advertising.

Under the dual processing models, a peripheral or heuristic cue such as content class can operate in one of four ways. One role is as a simple cue used only by individuals with low motivation to process information. This study found no evidence to support this explanation. Individuals with both high and low involvement were influenced by the content class in which messages appeared. This fact might be explained by the artificial, forced-exposure situation created in the experimental setting or by a failure to create a truly low-involvement manipulation. However, a strong theoretical explanation is that heuristic and systematic message processing can operate concurrently—an idea addressed in the HSM but not the ELM (Chaiken, 1987).

A second possible explanation is that the source of a message (news or advertising) serves as an argument found in ELM and HSM when individuals engage in central route or systematic processing. However, an analysis of the nonproduct thoughts generated revealed only 39 content-class-related thoughts were mentioned among the 4,372 cognitive responses generated. These results suggest people did not consciously take content class into account when assessing arguments.

The results of this study provide some support for the third and fourth explanations found in the ELM and HSM about the possible roles of contextual cues in information processing. Indeed, the findings reported here suggest that content class both served as a source of motivation to process information and as source of processing bias that influenced the kinds of cognitive thoughts generated and message evaluations (Petty, Gleicher, & Baker, 1991). Content class moderated the amount of effort that audiences were willing to exert to process information, but its effects interacted with the audience's level of product or topic involvement. Instead of being motivated to process more information about products in which they already have high involvement, the presentation of information as news operated as a cue that more thorough analysis was not necessary. At the same time, the presentation of information about low-involvement products served as an incentive to process and, thus, compensated for otherwise low levels of involvement. Under the HSM's *sufficiency principle*, when audiences reach a threshold of confidence in making a judgment, processing will cease. However, systematic processing will be invoked whenever a simple heuristic is not sufficient to make a judgment (Chaiken, 1987; Chaiken et al., 1989). The ongoing challenge confronting persuasive communicators, of course, is to motivate audiences so they will pay attention and actually process a persuasive communication (MacInnis, Moorman, & Jaworski, 1991; Petty & Cacioppo, 1986). These results suggest that some advantage might be inherent in news because people are predisposed to process news instead of advertising (Hallahan, in press).

These results also are important because they help clarify previous claims about the unqualified superiority of news over advertising. Although news was shown to generate more favorable main effects, advertising presented with quality arguments performed equally as well as news on virtually all of the evaluative measures. News scored higher than advertising on the believability measure only. Although HSM theorists point out that the effects of heuristic processing can be attenuated in the presence of strong systematic processing (Chaiken, 1987; Chaiken et al., 1989; Maheswaran, Mackie, & Chaiken, 1992),⁸ it is important to emphasize it was only when advertisements were presented with weak arguments that paid

⁸Attenuation would explain some of the findings for the evaluative measures, in which scores for news were somewhat higher than those for advertising but fell short of being higher at statistically significant levels, except for believability assessments. Attenuation imposes a ceiling effect on measurable results and leaves open the question whether news actually might be superior to advertising, but any differences are indiscernible in the presence of extensive systematic processing.

messages performed at statistically lower levels than news. This would suggest that public relations practitioners must be cautious about making claims concerning the superiority of publicity. This finding is consistent with Hunt and J. E. Grunig's (1994) observation that there is "little research evidence that people actually believe journalists have endorsed a product when they run a story or that editorial copy has greater credibility than advertising copy" (p. 383).

At the same time, these findings underscore the importance of strong arguments for marketers who are considering using advertising to communicate product information. The apparent bias against advertising, coupled with expectations about strong arguments to be found in ads,⁹ suggest that audiences are quite discerning when processing ads. On the other hand, audiences might exhibit greater latitude or flexibility in terms of the quality of arguments that they are willing to accept as credible when information is presented as news. Such findings are consistent with correspondence theory (Smith & Hunt, 1978). Stated another way, argument quality might not be as important in publicity as it is in advertising. The mere presence of information presented as news might have a compensatory, heuristic effect that enhances an otherwise weak argument. This is underscored by the fact that news with weak arguments appeared to perform just as well as news presented with strong arguments and as well as advertising with strong arguments. This would suggest that any advantage that news enjoys is limited to instances when the arguments presented are ambiguous,¹⁰ marginally strong, or even weak.

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⁹Because it addresses message expectancies, the HSM accommodates at least one alternative explanation for the results. Language expectancy theory (Burgoon & Miller, 1985) argues that people develop expectations about language behaviors, which subsequently affect acceptance or rejection of persuasive messages. Use of language that negatively violates normative expectations inhibits persuasive effectiveness. Expectancy theory might explain the dramatically lower assessments for weak ads: Individuals expect a favorable message in an ad, but their expectations were unmet when presented with a weak argument. The obverse argument could be made for news. When a reader expects a balanced or even critical treatment in news but finds content more favorable than expected, the persuasive effect is enhanced. Thus, it could be argued that implied third-party endorsement effects involve audience processing of messages that positively exceed expectations.

¹⁰The HSM specifies that heuristic cues operate by influencing recipients' perception of the probable validity of a persuasive message and by setting up expectancies about the message, which influences recipients' processing of message content. The HSM posits that conditions under which heuristic cues bias systematic processing are circumscribed and generally limited to situations in which message content is amenable to interpretation. Heuristics operate to disambiguate message content (Chaiken et al., 1989, pp. 228–229).

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