An expanded framework for measuring the effectiveness of destination advertising

Edward G. McWilliams
Tourism Division, Texas Department of Commerce

John L. Crompton
Department of Recreation, Park and Tourism Sciences, Texas A&M University

Destination advertising campaigns are typically evaluated by conversion studies or by advertising tracking studies. A major limitation of these evaluations is that they assume receivers of the advertising message follow a highly involved decision process when making leisure travel decisions. These framework fail to consider how destination advertising influences low involvement decisions which are likely to characterize repeat visitation, or trips deemed to be of low risk or low importance. The paper offers a framework which allows the impact of advertising on low involvement decisions to be measured. It uses data from an evaluation of a State of Texas tourism advertising campaign to illustrate how the framework can be operationalized. © 1997 Elsevier Science Ltd

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This study focuses on defining how travelers differentially respond to advertising and on developing an expanded framework for evaluating the return on investment on destination advertising. The data were derived from an evaluation of a destination campaign commissioned by the Tourism Division of the Texas Department of Commerce, which is a typical state destination marketing organization. State travel office budgets in the US totalled $330.8 million in the fiscal year 1992–1993, of which more than $101 million was spent on advertising. However, this represents a small proportion of the total public and private travel industry advertising, which was estimated to be $1.91 billion in 1993. Tourism advertising investments of this magnitude have resulted in an increased emphasis on efforts to evaluate their effectiveness.

There is widespread acknowledgement of the difficulty associated with establishing a causal relationship between advertising and sales. The difficulty is summarized by the aphorism, 'I know that half of my advertising is wasted, but I don't know which half.' Recognizing the limitations, studies seeking a relationship between investment in advertising and sales volume are still commonly undertaken, in order to obtain a general 'feel' for whether the advertising is having any effect.

Compared to traditional retail businesses, destination marketing organizations are particularly disadvantaged in their advertising evaluation efforts because they lack the direct sales figures, or, 'single source' data which are sales data provided by computer scanned bar codes. These organizations are accountable to their membership or elected officials, but they do not possess such a readily accessibly measure indicating general trends in the relationship of advertising to sales. Visitors' responses to a destination marketing organization's advertising are reflected by visitation across a jurisdiction, embracing a large number of tourism establishments. This diffusion of outlets at which expenditures are made makes it especially difficult to derive any assessment of advertising effectiveness. Further, visitors must travel to the destination to experience the service and the destination may be a long distance from their point of origin. These logistics make it more difficult to undertake studies to evaluate the impact of advertising, than it is for consumer goods where advertising and consumption typically occur in the same geographic locale.
Most destination marketing organizations produce advertising campaigns that encourage the reader or viewer of the advertising to clip a coupon, tear out a magazine tip-in card, mail back a postcard, or call a 1–800 telephone number to receive travel literature on the destination’s attractions. Research efforts that are described as conversion studies or coupon conversion studies consist of surveying a sample of people who requested travel literature through one of these mechanisms. Typically, these studies collect demographic, tripographic and expenditure information from respondents who traveled to the destination. Although conversion studies are most useful for comparing one media vehicle to another, or one advertising creative execution versus another, they are also widely used in the tourism field to assess overall advertising impact.

This impact is typically assessed by projecting expenditures made by this sample to the total population of inquirers, with the implicit assumption that their travel to the destination was the result of the advertising campaign. Some conversion studies include calculation of a return on investment by projecting visitor revenues and dividing them by the expense of the advertising. In the first conversion study to appear in the literature, Woodside and Reid obtained a 28% response rate to a mail survey, and reported a conversion rate of 53.4%. From these responses, revenues of $206.08 per party were projected, yielding a total economic return to the destination from the advertising of $4.35 million.

Woodside has pointed out that to measure the effectiveness of advertising in causing visits to a destination, requires the use of a true field experimental design. He offered a hypothetical example of how such studies may be designed. However, the authors are unaware of studies which incorporate such a rigorous design being reported in the literature.

Many conversion studies have been reported since the pioneering work of Woodside and Reid, but there has been relatively little evolution in their approach. Many of them contain methodological flaws, which relate to weaknesses in the research process. These weaknesses include: (1) problems with expenditure recall; (2) problems of non-response bias; (3) problems with measurement without consideration of the stage in the travel decision process; (4) failure to consider impact of competitors’ advertising; (5) problems with sample frame and size; (6) lack of focus on program objectives; (7) poor sampling procedures and design flaws. These types of flaws led Messenmer and Johnson to observe:

The general conclusion…is that traditional conversion studies suffer from methodological and design problems which limit their usefulness. (p 14)

Without question, the conversion study approach has been extensively misused. This situation has produced inaccurate and inflated results which have negatively affected the credibility of the evaluation research conducted in the tourism industry. (p 50)

These methodological concerns frequently have been compounded by fundamental theoretical weaknesses which derive from limitations of the implied behavioral decision framework undergirding conversion studies. Davidson raised this issue when he observed, ‘We need a better understanding of the travel decision process and how marketing impacts that process’ (p 8). Similarly, Pitegoff noted ‘most conversion studies do not consider the evaluative frame, i.e., in what context is the promotional material ordered and used as part of the trip planning process’ (p 8). Siegel and Ziff-Levine observed that the underlying assumption of conversion studies in that ‘all advertising-driven visitations occur as a result of the inquiry/fulfillment process’ (p 28).

Pitegoff and Davidson both question the appropriateness of assuming the same decision process and, hence, of using similar research methods/assumptions, for such diverse groups as repeat travelers and first-time visitors; day visitors and long stay vacationers; or visitors on shopping trips and those visiting friends and family. However, neither author offered suggestions for a framework which might be appropriate for describing and explaining any of the decision processes associated with these diverse types of trips.

Siegel and Ziff-Levine directly addressed the issue of the lack of a comprehensive behavioral framework in accountability research. They presented two models, one of the conversion process and one of the advertising tracking process. These two approaches have typically been used to assess advertising impacts. They observed:

In order to assess the relative merits of the conversion study as a vehicle for evaluating the effectiveness of tourism advertising campaigns, it is essential for the industry to have an understanding of how advertising works. Once a model of advertising impact has been agreed upon, it becomes much easier to achieve consensus as to the research paradigms that are required to assess its impacts (p 27).

The authors’ description of how advertising works under the conversion study model follows a sequential flow over time that leads from production of the advertising to visitor awareness, positive image development, inquiry/fulfillment, motivation and conversion (Figure 1).
This model of the communication process suggests there is a series of mental steps through which potential visitors to a destination must climb before deciding to go there. This sequence follows the AIDA model (Attention-Interest-Desire-Action) first proposed by Strong. Since that time a host of similar hierarchical models have been proposed. Perhaps the most widely accepted of these is the hierarchy of effects model developed by Lavidge and Steiner, which incorporates six stages: awareness; knowledge; liking; preference; conviction; and purchase.

An alternative to the conversion approach for measuring effectiveness of tourism advertising is the advertising tracking model (Figure 2). This approach has not been used as frequently as conversion studies. It describes changes in levels of a destination’s awareness and its image in target markets, before and after those markets have been exposed to the destination’s advertising campaign. Both methods assume a similar hierarchical thought process, but in advertising tracking studies a request for information is viewed as an optional, rather than a necessary, condition for conversion behavior. The advertising tracking approach assumes that potential visitors may be ‘converted’ to purchase a tourism service solely on the basis of awareness and image building impacts, as opposed to the conversion approach which requires information search manifested by an overt response action prior to conversion. Siegel and Ziff-Levine note:

According to the advertising tracking model, the main goals of the advertising campaign are to: (1) generate advertising awareness among the target audience; (2) generate awareness of the destination as a place to visit; i.e., get it on the shopping list of acceptable destinations; (3) create a positive image of the destination vis-a-vis its competitors; (4) motivate consumers to travel to the destination in the near future, through (2) and (3) above; and (5) influence travel behavior, by converting those motivated by advertising to actually visit the destination. (p 29).

Baker et al. proposed a model that differs from that of Siegel and Ziff-Levine in that it includes a feedback learning loop. This loop indicates that after the destination choice has been made, additional learning or information collection may occur. The loop is repeated as incremental components of the trip are researched and planned. Their model also followed the learning hierarchy sequence.

Lacking in all the behavioral frameworks discussed in the tourism advertising, accountability

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**Figure 1** The conversion model (source: Seigel and Ziff-Levine, 1990)

**Figure 2** Advertising tracking model (source: Seigel and Ziff-Levine, 1990)
research literature is a process which explains if, and how, advertising influences trips which individuals deem to be of low personal importance, or for which they believe they already have a strong knowledge base derived from previous visitation. It has been pointed out that the hierarchy models do not hold in all contexts. For example, actions may precede attitude formation and past behavior is likely to be a dominant factor in determining attitude. Consistent with this criticism, Ehrenberg suggested that in many contexts, the key role of advertising was in reinforcing previous purchase decisions, rather than in persuading people to make a first-time or brand-switching decision. His ATR model (Awareness-Trial-Reinforcement) emphasizes reinforcement. It suggests that potential visitors first gain awareness and interest in a destination, then try it. If there is satisfaction with the experience, then desire to return in the future is reinforced. This recognizes that: (1) previous visitors use their experience with a destination, or that of trusted and respected friends, as their information base with which to make a destination selection decision; and (2) attitudes developed from previous visits are likely to be resistant to persuasive advertising whose messages may be counter to that experience, but receptive to advertising that reinforces it.

Krugman appears to have been the first in the general marketing literature to address the role of advertising in types of decisions where a potential visitor is not motivated to engage in information gathering or in complex decision processes. He suggested that the norm was low involvement advertising reception with very little active learning occurring. Krugman coined the term ‘learning with low involvement’ and stated that people do not watch television or read magazines to acquire information on what brand of repeat purchase consumable products, such as toothpaste, they should buy. In the present context, Krugman would contend that in situations of low involvement, although potential tourists may be disinterested, they may still be receivers of advertising messages. Thus, repeated exposure to the messages may result in gradual learning and ultimately to visitation.

Krugman proposed that only in high involvement situations do individuals filter messages and selectively attend to those which are pertinent. Involvement is a psychological construct which has been examined extensively in the social-psychological marketing, and consumer behavior literatures (Assael and Costley provide reviews). Its prominent role in the context of recreation and tourism decision-making has been increasingly recognized in recent years. Invovlement is defined as ‘the level of importance, relevance or arousal that a person has toward an object or service or purchase situation’; that is, ‘a person’s perceived relevance of an object based on inherent needs, values and interests’ (p 342). When a decision is considered to be important to a participant’s ego, self-esteem or needs, or when there is a high level of financial, social or psychological risk, then a high involvement state is likely to exist. In such contexts, a potential tourist is likely to seek out the use information about alternative destinations and follow a comprehensive process of decision-making. On the other hand, if the trip is not important or relevant to visitor’s self esteem, values, or needs, or is perceived to have minimal risk associated with it, then visitors are less likely to gather information about destination alternatives and are more likely to use simple, non-comprehensive decision-making processes.

The purpose of this paper is to illustrate the potential importance of advertising impacts on low involvement decisions, and to identify the range of high and low involvement segments in any given target market. This is done by using the conceptual taxonomy shown in Figure 4. In contrast to the hierarchical high involvement models on which most current advertising measures are based, this framework embraces the full set of responses, from very low to very high involvement, with which a destination marketer is confronted. The cells in the taxonomy are defined later in the paper.

Thus, the intent of the framework was to expand the sample beyond the narrow segments used in conversion and advertising tracking studies, to embrace all leisure travelers from a given origin market to a given destination. Conversion studies are typically limited to individuals who responded to advertising by requesting travel literature, inferring the use of a high involvement decision process. Advertising tracking studies utilize a probability sample of the target audience and thus embrace a larger portion of the leisure travel population, but these studies are still limited to those individuals who recall seeing a destination’s advertising. Advertising tracking studies typically examine shifts in attitude, cognitive knowledge and travel intent toward a destination. This approach infers a complex thought process for visitor decision-making. There is a need for a more comprehensive framework which incorporates the influence of advertising on low involvement visitor decisions that do not follow the Learning Hierarchy sequence.

Data used to illustrate the taxonomy’s potential were collected by the Texas Tourism Division. However, the focus of the paper is on suggesting a conceptual approach to measuring impacts on low involvement, rather than on the particular numbers generated.

**Research design and data collection**

In a true field experiment, two groups of subjects are required: a treatment groups and a control group. Subjects are randomly assigned to the two
groups before the treatment is administered. Effectiveness of the advertising is then evaluated by comparing results from the treatment group who were exposed to the advertising, which those from the control group who were not exposed to it. The data collection method used in this study was dictated by a series of extraneous pragmatic and political factors over which the researchers had no control. It forced some adaptation to a true experimental design. Three modifications had to be made. First, instead of measuring responses from the same respondents in both the control and treatment groups before and after the treatment, different groups from the same population were used for the pre and post measures. Thus, instead of using a panel of subjects for the pre and post treatment measures, the panel was replaced with a random cross-sectional sample which was measured before treatment, and an entirely different cross-sectional sample that was measured after treatment.

Commenting on this variation on the two-group before−after design, Parasuraman stated that, ‘Successive measurements in longitudinal studies can be obtained from a physically different, but representative sample of units … ’ (p 140) and that ‘using cross-sectional samples instead of a panel of respondents may have advantages … ’ (p 135). The primary advantage of this design is the control it offers for the effects of testing, that is, an attitude or behavior change observed due to the subjects becoming sensitized to responding to a survey. The primary limitation of this adapted design is loss of individuals as the primary unit of analysis. Aggregate or group differences in means may be studied using this mixed design, but identification of changes by individuals is not possible because the same individuals do not remain in the study sample for both the pre- and post-measurements. A second modification of a true experimental design was the absence of a control group. The primary concern associated with this was that events other than the advertising may have occurred in the time period between the pre and post measures, which could have produced any change emerging from a comparison of the measures. The time period between the two measures was approximately 5 months. The researchers are unaware of any major events relating to Texas (which was the subject of the advertising) or the general economy during that period which would have biased the post-measure responses, but recognized this was a potential error source and limitation of the study.

The population under study was comprised of residents in eight US cities which were identified as target geographic markets for the Texas Tourism Division’s advertising campaign. The cities were classified as Tier 1, 2 or 3 markets, based on their distance from Texas (Figure 3). The campaign consisted of a series of 30 and 60 second television commercials which were broadcast on national cable and on selected local cable and network channels, and a group of 22 print advertisement purchased in 51 general consumer and travel magazines. The schedule for the media campaign is shown in Figure 3.

The research design can be illustrated in the following form:

<table>
<thead>
<tr>
<th>PRE-MEASURE</th>
<th>TREATMENT</th>
<th>POST-MEASURE</th>
</tr>
</thead>
<tbody>
<tr>
<td>R₁, GROUP 1</td>
<td>A</td>
<td>R₂, GROUP 2</td>
</tr>
<tr>
<td>R₃, GROUP 3</td>
<td>B</td>
<td>R₄, GROUP 4</td>
</tr>
</tbody>
</table>

Where R₁−R₄ indicate a randomized selection procedure was used to select each of the four groups; Treatment A is the advertising campaign in the Tier 1 and Tier 2 cities; and Treatment B is the advertising campaign in the Tier 3 cities.

A telephone survey was used to screen potential participants and collect data. A random sample was drawn using random digit dialing in the selected markets. Potential participants were screened based upon the following criteria: (1) the participant was a resident of the target metropolitan region; (2) was an adult aged 25−64 (the target age segment); and (3) had taken a vacation outside his or her home state in the past 24 months or planned to take a

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### Table: Definition of tiers and advertising schedule

<table>
<thead>
<tr>
<th>Tier 1</th>
<th>Tier 2</th>
<th>Tier 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 250 Miles from Texas</td>
<td>25 to 600 Miles from Texas</td>
<td>More than 600 Miles from Texas</td>
</tr>
<tr>
<td>Television Advertising</td>
<td>Point</td>
<td>125 Gross Media Points</td>
</tr>
<tr>
<td>Air Time</td>
<td>March 14 - May 28</td>
<td>February 21 - May 7</td>
</tr>
<tr>
<td>Print Advertising</td>
<td>Reach = 0.63 Frequency = 4.3</td>
<td>Reach = 0.63 Frequency = 4.3</td>
</tr>
<tr>
<td>Target Cities</td>
<td>New Orleans Oklahoma City Little Rock</td>
<td>St. Louis Wichita Jackson, MS</td>
</tr>
</tbody>
</table>

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*Figure 3* Definition of tiers and advertising schedule

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vacation in the next 24 months outside the home state. In cases where there was initially no response, three follow-up calls were made. Those who still could not be contacted, who did not meet the screening criterion or who refused to participate, were replaced by the next randomly selected telephone digit.

One thousand pre-advertising and one thousand post-advertising telephone interviews were completed, consisting of 125 respondents in each target market. Pre-advertising data were collected between 15 January and 15 February, before the target population was exposed to any broadcast advertising. Post-advertising data were collected during the month of June, following completion of television advertising in the sample markets.

The analysis used in the study reported here was limited to those individuals who reported traveling to Texas in the last 2 years. It was assumed that all respondents had been exposed at least once to Texas tourism advertising (Cell 1 in Figure 4). This assumption was based on the media schedule and advertising reach which was used. Six of the eight cities used in the sample received 125 gross media rating points (Figure 3). Media rating points are the broadcast media's standard for describing the potential reach of advertising in terms of the percentage of population exposed one time per week to the advertisement. One rating point equals 1% of the defined market. Gross rating points are the sum of all ratings generated during a 1 week schedule of advertising for the time slots and channels selected. Thus, in these six markets viewers were exposed to the Texas tourism advertising on an average of 1.25 times per week. In the other two markets, on average, only one-fourth of the viewing population was exposed each week to the Texas tourism advertising.

A limitation of this assumption is that the gross rating points measure does not emphasize the advertising's 'reach'. Hence, it is possible over the period during which the advertising was run, that some proportion of the sample was not exposed at all to the advertisements. In future studies, the assumption that all study respondents had been exposed to the advertising could be verified by using more sophisticated monitoring techniques now available in the US through A. C. Neilson and other companies, which enable household exposure to advertising to be confirmed as a condition for sample selection.

Print media were also purchased differently for the two treatment groups. Print media are measured by the percent of the target population exposed to the advertisements and their frequency of exposure to the advertisements. Residents in Tier One and Tier Two were exposed to a print campaign designed to reach 60% of the target age and income segment with an average of 4.6 advertisement exposures over the campaign period. Sixty percent of the Tier Three residents were exposed to advertisements 4.3 times during the campaign.

A taxonomy of visitor reactions to destination advertising

The taxonomic framework shown in Figure 4 embraces both high and low involvement decision-makers. It is explicated in the following paragraphs. The taxonomy was developed to expand the traditional measures of effectiveness which had been used previously to measure impact of the Texas Tourism Division's media advertising investment. It embraces all possible reactions to the Division's advertising among those who traveled to Texas in the past 2 years. In contrast, the traditional conversion study is confined to measuring the influence of destination advertising on those in Cells 9 and 11 of Figure 4.

Cell 2 in Figure 4 incorporated leisure travelers to Texas who indicated no awareness of the State's advertising. They responded negatively to two questions: 'You may be familiar with advertising for a state on the television or radio, or in newspapers or magazines. Which states in the US have you seen or heard travel advertising for recently?' This unaided recall question was followed by an aided recall question, 'Have you seen or heard any advertising recently about Texas?'

The respondents in Cell 2 were further sub-divided into Cells 3 and 4. Those in Cell 3 reported that the advertising had no influence on their decision to visit or to extend their trip, and there was no evidence to suggest their response needed qualifying. They responded in the last category to the question, 'Did the Texas travel advertising influence your travel decision very much, somewhat, not very much or not at all?'

The proportion of respondents assigned to Cell 4 was ascertained by a pre–post comparison of responses to a composite variable. The research design did not allow for pre–post comparison of subject scores since this was not a panel design. Instead, a comparison was made of the relative size of the group which was unaware of the advertising (Cell 2) and yet responded affirmatively to at least one of the following three measures:

- Mentioned Texas in the vacation consideration set which was operationalized by two questions, 'When you think about vacation and leisure travel, what states come to mind as destinations you would consider visiting?' or 'When thinking of warm weather destinations, which states come to mind?'
- The interview said, 'I and going to read some places people go on vacation. For each, please tell me how interested you are in traveling to that particular place for your next vacation.... Please

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tell me how interested you are in traveling to Texas for your next vacation. Would you be 'very interested', 'somewhat interested,' 'not very interested,' 'not at all interested,' or 'don't know?'?" Those responding in the first two categories were deemed to be interested in traveling to Texas.

- Likelihood of traveling to Texas was operationalized by the question, 'In planning your vacation during the next 3 years, how likely is it that you would consider taking a vacation in Texas? Would you be very likely, somewhat likely, not too likely, or not at all likely to consider taking a vacation in Texas?' Those responding in the first two categories qualified for inclusion in this composite variable.

The difference in the size of this group between pre and post measures was attributed to influence of the advertising. It was assumed that individuals in this group were unaware that they were influenced by the advertising, because awareness of the advertising and its effects remained subconscious. Advertising studies on the value of repeated exposures show that influence can exist at a subconscious level." Attitude shifts in this group were inferred to have resulted from the advertising on the basis of shifts in pre–post measures of the composite variable comprised of preference, interest or intent to travel to Texas. Causality was not inferred with this group because of the research design's limited ability to control extraneous variables. Thus, travel which resulted from respondents included in this group was not included in impact estimates. Nevertheless, this discussion has been included in the paper to describe how these cells could be operationalized in future studies using a tighter experimental design.

Leisure travelers assigned to the remaining cells were aware of the advertising (Figure 4). Cell 5 consisted of those who responded affirmatively to either of the two questions to which Cell 2 travelers responded negatively. Thus, Cell 5 consisted of those travelers who reported aided or unaided recall to Texas Tourism advertising.

Respondents in Cell 5 were assigned into either Cell 6 or Cell 7 based upon their response to the question, 'Did the Texas travel advertising influence your travel decisions very much, somewhat, not very much, or not at all?' Thus, Cell 6 included all leisure travelers who were aware of the advertising, but reported they were not influenced by it, and they did not request travel literature from the State of Texas.

Cell 7 was comprised of travelers who were aware of the advertising and conscious that they had been influenced by it in some way. It is subdivided into those who did not request travel literature and those who did. Cell 8 represents a segment not captured by the conversion study approach: all leisure travelers who were aware of the advertising, but were not influenced by it, and they did not request travel literature from the State.

Cell 9 represented the segment which is often described as the gross conversion population in conversion studies. It divides into two subsets. Cell 10 was that proportion of the gross conversion population not influenced by the travel literature.
This group would be expected to show no shift in pre–post measures of cognitive beliefs or attitudes about leisure travel to Texas. Cell 11 consists of all leisure travelers who requested literature and whose decisions were consciously influenced by it. It was comprised both of the traditional net conversion population associated with conversion studies, and of those who reported that travel information caused them to alter their travel itinerary, resulting in additional destinations visited or an increase in length of stay. These individuals responded either 'very much' or 'somewhat' to the question, 'Did the state travel information influence your decision to travel, the length of the trip, or the areas you visited in Texas?' Those who were assigned to Cell 10 responded 'not very' or 'not at all' to this question.

In summary, total leisure travel visitation to Texas was comprised of the number of travelers in Cells 3, 4, 6, 8, 10 and 11. However, some of these travelers were not influenced by the State’s advertising. The impact of Texas’ advertising was conceptualized as being comprised of the number of visitors and their associated expenditures, who qualified for inclusion in Cells 4, 8, 10 and 11. In comparison, the traditional net conversion study is concerned only with those in Cell 11. Cells 8 and 10 were comprised of low and medium involvement decision makers, respectively, who were influenced by the advertising. Cell 4 was also comprised of low involvement individuals who were impacted by the advertising. However, since the study design used different random groups rather than the same subjects in the pre- and post-surveys, it was not possible to measure the economic impact of advertising on individuals in this group. However, in future studies which use a panel design, those in Cell 4 could also be included.

**Results**

The questions listed in the previous section of the paper were used to derive percentages of the total population of leisure travelers from the eight target markets assigned to each cell. They are shown in Figure 5.

The share of travel volume influenced by advertising was then applied to the estimates of leisure travel volume to Texas from the eight target markets developed by D. K. Shifflet Inc. The formula used to estimate leisure travel volume influenced by the advertising was:

\[
\text{Advertising influenced leisure travel volume} = (i) \text{ Share of each target market} \times \text{total leisure travel from all markets to Texas}. \\
(ii) \text{These data were aggregated for all eight origin markets and multiplied by percent share of travel influenced by advertising (Cell 7, Figure 5).}
\]

![Figure 5](image) 1992–1993 percentage of share of Texas travelers sequenced by advertising recall and influence
Impact of Advertising on Direct Spending was calculated by the following formula:

\[
\text{ROI} = \frac{\text{Cell 7 travelers 1992–1993 expenditures}}{\text{The largest market media budget for 1992 and 1993}} \quad \text{AND} \quad \frac{\text{Cell 7 travelers 1992–1993 expenditures}}{\text{Annual Texas Tourism Division Budget for 1992 and 1993}}
\]

The two methods provide the low and high extreme ranges for potential advertising impacts. The second measure is likely to be conservative because use of the Division’s full budget includes activities which are related to trade and tourism business development activities that are not directly related to the advertising. However, because the primary mission of the Division is to promote out-of-state leisure travelers to come to Texas, the full Division budget was used in the calculation.

Traveler expenditures for 1992 and 1993 from the target markets were summed and divided by the sum of the 1992 and 1993 Texas Tourism Division market media expenditures to yield an estimated return on investment of $401.87. That is, for every $1 invested by Texas in target market media promo-

tion, $401.87 was returned from these eight markets in direct traveler expenditures (Table 1). The target market budget represents approximately 10% of the total Texas Tourism Division Budget and 14% of its annual media expenditures.

It is likely that the national media expenditures and other Division promotions also have an effect on these markets. Thus, a minimum return on investment estimate was calculated by applying the full Tourism Division budget to this return. This calculation results in a return of $38.80 in direct traveler expenditures from the target markets for every dollar spent (Table 1).

**Implications for tourism marketing**

The study’s goal was to use a study undertaken by the Texas Tourism Division to illustrate the potential impact of advertising in low involvement decisions. Limitations associated with the study’s research design mean that the numbers produced should be interpreted with caution. However, it is the principle of evaluating advertising impacts on low involvement decisions and the conceptual approach to measuring those impacts that are of central importance in this paper.

Results of the study support the contention that visitors use alternate decision processes under circumstances of high and low involvement with a travel destination. The results indicated that up to 67% (Cells 3, 4 and 6 in Figure 5) of total travel volume from the markets studied were derived from individuals who displayed limited cognitive activity in their selection of a travel destination. This proportion is similar to that reported by Fesenmaier and Johnson. The lack of cognitive activity or planning explains the low percentage of travelers who typically request travel literature from destination marketing organizations.

The results suggest that it is likely to be misleading for destination marketing organizations to rely on conversion studies to generate either accurate accountability measures or accurate visitor profiles. In this study of markets with a high propensity to travel, only 24% of leisure travelers over a 2 year period requested travel literature. In a traditional conversion study only the profiles or economic impacts of these high involvement visitors would be captured. Destination marketing organizations should develop more comprehensively designed accountability studies which embrace all segments of the travel market.

Media schedules and vehicles should reflect the behavior patterns and media choices of the involvement segments. Low involvement segments often have shorter planning horizons. Radio and outdoor advertising may have significant impacts on this segment, where frequent repetition is a critical
<table>
<thead>
<tr>
<th>Origin ADI</th>
<th>Percent of total pleasure travel to Texas</th>
<th>1992</th>
<th>Total number of person days</th>
<th>Travel spending ($Millions)</th>
<th>Percent of total pleasure travel to Texas</th>
<th>1993</th>
<th>Total number of person days</th>
<th>Travel spending ($Millions)</th>
<th>Combined Aggregate number of person days</th>
<th>Travel spending 1992–1993 ($Millions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cedar Rapids-Waterloo-Dubuque, IA</td>
<td>0.39</td>
<td>795 000</td>
<td>88.3</td>
<td>0.15</td>
<td>325 500</td>
<td>38.4</td>
<td>(1992–93)</td>
<td>126.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Jackson, MS</td>
<td>0.09</td>
<td>183 600</td>
<td>20.4</td>
<td>0.05</td>
<td>108 500</td>
<td>12.8</td>
<td>1 121 000</td>
<td>292 100</td>
<td>33.2</td>
<td></td>
</tr>
<tr>
<td>Little Rock, AR</td>
<td>0.54</td>
<td>1 101 600</td>
<td>122.3</td>
<td>0.74</td>
<td>1 605 800</td>
<td>189.5</td>
<td>2 707 400</td>
<td>311.8</td>
<td></td>
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<td>New Orleans, LA</td>
<td>0.73</td>
<td>1 489 200</td>
<td>165.3</td>
<td>0.96</td>
<td>2 083 200</td>
<td>245.8</td>
<td>3 572 400</td>
<td>411.1</td>
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<td>Oklahoma City, OK</td>
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<td>355.5</td>
<td>2.10</td>
<td>4 557 000</td>
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<tr>
<td>Springfield-Decatur-Champaign, IL</td>
<td>0.08</td>
<td>163 200</td>
<td>18.1</td>
<td>0.05</td>
<td>108 500</td>
<td>12.8</td>
<td>271 700</td>
<td>30.9</td>
<td></td>
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</tr>
<tr>
<td>St. Louis, MO</td>
<td>0.89</td>
<td>1 815 600</td>
<td>201.5</td>
<td>0.53</td>
<td>1 150 100</td>
<td>135.7</td>
<td>3 237 400</td>
<td>337.2</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Wichita—Hutchinson, KS</td>
<td>0.90</td>
<td>1 836 000</td>
<td>203.8</td>
<td>0.02</td>
<td>434 000</td>
<td>51.2</td>
<td>2 270 000</td>
<td>255.0</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Share of market influenced by advertising (Cell 7 Figure 5): Total travel spending in these 8 origin locations whose travel was influenced by advertising:

\[
\sum \text{Travel spending} = 2399.1 \text{X 0.33} = 791.703
\]

ROI estimates return on investment based on spot media budget

\[
\text{ROI} = \frac{\text{Total travel spending}}{\text{Spot media budget}}
\]

Conservative return on investment based on 1992–1993 total tourism budgets

\[
\text{ROI} = \frac{\text{Total travel spending}}{\text{Total tourism budget}}
\]
element. In contrast, high involvement segments are likely to respond to information based advertisements, testimonials and offers of more information. Media schedules directed to this group should coincide with their longer planning horizons.

References