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Why Consumers Misattribute Sponsorships to Non-Sponsor Brands: Differential Roles of Item and Relational Communications

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Brands engaged in sponsorship of events commonly have objectives that depend on consumer memory for the sponsor–event relationship (e.g., sponsorship awareness). Consumers however, often misattribute sponsorships to nonsponsor competitor brands, indicating erroneous memory for these relationships. The current research uses an item and relational memory framework to reveal sponsor brands may inadvertently foster this misattribution when they communicate relational linkages to events. Effects can be explained via differential roles of communicating item information (information that supports processing item distinctiveness) versus relational information (information that supports processing relationships among items) in contributing to memory outcomes. Experiment 1 uses event-cued brand recall to show that correct memory retrieval is best supported by communicating relational information when sponsorship relationships are not obvious (low congruence). In contrast, correct retrieval is best supported by communicating item information when relationships are obvious (high congruence). Experiment 2 uses brand-cued event recall to show that, against conventional marketing recommendations, relational information increases misattribution, whereas item information guards against misattribution. Results suggest sponsor brands must distinguish between item and relational communications to enhance correct retrieval and limit misattribution. Methodologically, the work shows that choice of cueing direction is critical in differentially revealing patterns of correct and incorrect retrieval with pair relationships.

Keywords: consumer memory, cued recall, sponsorship, marketing, item and relational information

Brands regularly engage in activities like event sponsorship as a form of marketing. Worldwide spending to secure sponsorship rights was estimated to reach US$62.8 billion in 2017 (International Events Group, 2017). To put this in perspective, this is greater than the gross domestic product of over half the countries in the world, as listed in the International Monetary Fund's (2017) World Economic Outlook. Moreover, it does not include the additional monies spent by brands on collateral marketing activities intended to leverage these investments, estimated at around twice the amount spent on rights fees (Weeks, Cornwell, & Drennan, 2008). For the brands involved, objectives for undertaking sponsorships can vary; however, memory-based effects like creating brand and sponsorship awareness among consumers are consistently ranked among the most important—around 80% of sponsors report that awareness metrics are valuable in determining return on investment (International Events Group, 2015).

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Despite the importance attached to awareness outcomes, there are several issues of concern with how effectively these are achieved when competitor brands are present in the sponsorship environment. One of the most notable findings is that consumers do not always attribute sponsorships to those brands that are true sponsors, but instead often misattribute them to nonsponsor competitor brands. As an example, consider survey research conducted in China at the time of the Beijing Olympics in which respondents were asked to name the official Olympic sponsor in various product categories (Rein, 2008). The work found that within the sports-shoe category, 50% of respondents correctly attributed the sponsorship to Adidas, whereas 40% incorrectly misattributed it to Nike (with 10% incorrectly indicating that local Chinese sports-shoe brand Li Ning was the sponsor). Within the soft-drink category, 60% of respondents believed Pepsi was an official sponsor, when the true sponsor was actually Coke. This is not an isolated case. For example, findings by market research firm Global Web Index (2014), in relation to the soccer World Cup in Brazil in 2014, showed that many viewers attributed sponsorships to true sponsors but that large proportions also misattributed them to rival brands (e.g., Visa 41% vs. nonsponsor MasterCard 25%; Budweiser 26% vs. nonsponsor Heineken 13%; Adidas 36% vs. nonsponsor Nike 31%; McDonalds 49% vs. nonsponsor Subway 17%). As pointed out in that research, misattribution to nonsponsors is common and is not limited just to those brands that might seem naturally linked to sports—frequently, it is the direct market

rivals of true sponsors that are incorrectly named. Given the substantial funds that brands invest in sponsorship, it is striking that such large proportions of consumers have quite poor memory for the actual true relationships.

Part of the explanation for sponsorship misattribution is undoubtedly because of some nonsponsor brands attempting to promote themselves in a way that gives consumers the impression they are legitimate sponsors—a tactic known as *ambush marketing* (Mazodier, Quester, & Chandon, 2012). In the current work, however, we consider a somewhat counterintuitive and unexplored source of confusion, namely, that misattribution to nonsponsor brands can inadvertently be generated by sponsor brands themselves, when they communicate relational linkages with the sponsored event (i.e., when they communicate information about the brand–event relationship). Based on item and relational information ideas from the memory literature, it can be argued that when a brand promotes a sponsorship in a way that links the sponsored event to the brand in general, without highlighting distinctive brand-specific information, misattribution of sponsorships to competitor brands is likely to occur because competitor brands can often share the same relational context. Communicating a general link between the sponsor and event without emphasizing distinctive brand-specific attributes is common (Kelly, Cornwell, Coote, & McAlister, 2012) and is potentially responsible for why many consumers misattribute sponsorships to rival brands. It is the inadvertent competitor brand misattribution stemming from this type of communication that is the focus of the current work.

We use Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) item and relational information framework to explain how this misattribution comes about and how it can be minimized. We additionally use the framework to highlight that when evaluating memory-based awareness outcomes, such as with cued recall measures, sponsors need to consider the type of information that has been communicated as well as their measurement goals. That is, depending on whether item or relational communications have been used, it may be necessary to gauge both correct and incorrect memory for sponsorship information separately, using different measures for each. In the following sections, we review key memory-based effects in sponsorship before describing how these can be explained using Einstein and Hunt's item and relational information framework. These ideas are quite nuanced, so we develop the theoretical arguments in some detail prior to reporting two experiments that test predictions. Our work contributes to the applied marketing literature by using basic memory ideas to explain sponsorship misattribution. It also contributes to the basic memory literature by highlighting the complexity of memory phenomena outside the lab, and the value of using experimental memory tasks that accommodate this complexity as a way of testing the applicability and limits of how we study memory.

Congruence and Relational Links as Sources of Misattribution

Within the sponsorship literature, a general finding is that memory-based awareness effects for sponsor–event pairings are best achieved when there is a logical connection, or congruence, between the two entities (based on attributes like having a shared audience, shared geography, shared image, or perceived relevance to each other; Olson & Thjomoe, 2011). For example, it would be assumed that a sponsorship between a sports-oriented brand like Adidas and a sporting event like soccer would be better remembered than a sponsorship between an airline brand like United Airlines and a soccer event. Thus, sponsor–event pairings are usually discussed as being high congruence (Adidas and soccer) or low congruence (United Airlines and soccer), with high congruence pairings generally suggested to perform best in terms of memory outcomes (Cornwell, Weeks, & Roy, 2005).

Research by Cornwell, Humphreys, Maguire, Weeks, and Tellegen (2006) and Simmons and Becker-Olsen (2006) has demonstrated that although memory performance is usually superior for high congruence sponsorship pairings, memory for low congruence sponsorships can often be improved to similar levels by articulating some relational linkage between the members of the pair. Indeed, the idea of communicating relational linkages as a way of leveraging sponsorship investments has been advocated by a large number of researchers in the sponsorship literature, although most do not necessarily distinguish between benefits for high and low congruence sponsor–event pairings (Coppetti, Wentzel, Tomczak, & Henkel, 2009; Olson & Thjomoe, 2011; Speed & Thompson, 2000; Wolfsteiner, Grohs, & Wagner, 2015). As an example, it might be recommended that Adidas communicate about its sponsorship of a soccer event by highlighting the benefits players get from using its sports products. Similarly, it might be recommended that United Airlines communicate its sponsorship of the soccer event by highlighting that players need reliable air transport to get to soccer games on time. Theoretical explanations for why communicating relational linkages is beneficial are typically based on associative memory network models that assume these communications create or reinforce a linkage between the sponsor and event in memory (Cornwell et al., 2006).

In the current work, we use Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) item and relational information framework to argue that although communicating relational linkages can help to support memory for the true sponsor–event pairing, these can also foster misattribution to competitor brands. This is because relational information can apply similarly to same-industry competitors. For example, communicating that soccer players can benefit from using a sponsor's sports products can apply to Adidas but it also applies to similar sporting brands like Nike or Puma. Explaining that reliable air transport is needed to get soccer players to their games applies to United Airlines but is just as applicable to other airline brands like American or Delta. When these relational linkages apply to competitor brands, and those brands are salient in consumers' minds (e.g., because of their own marketing activities), the likelihood of misattribution increases. Johar and Pham (1999) reported that consumers often misattribute sponsorships to nonsponsor brands that are naturally congruent with events (e.g., sports brands and sporting events). That finding, however, does not account for the large proportions of misattribution to nonsponsor market rivals of true sponsors that are not naturally congruent with events, such as those noted earlier by Global Web Index (2014) with the soccer World Cup.

Here, we highlight that when sponsors communicate relational linkages, this can inadvertently foster misattribution to brands similar to the sponsor, regardless of whether or not those brands are congruent with the event. This is important because relational communications are widely advocated in the literature, and commonly observed in practice (Kelly et al., 2012), yet may actually be

detrimental. Furthermore, unlike effects stemming from natural brand–event congruence, these communications are directly controllable by sponsors themselves. In the following section, we elaborate on the detail of Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) item and relational information framework to explain these effects.

Item and Relational Information

Item and relational information can be considered as two different types of information that people might process when confronted with a setting composed of multiple elements. An individual processes item information when seemingly unrelated elements are encountered (e.g., when exposed to items for which no clear relationship is apparent: *chord*, *lobster*, *shuttle*, *elbow*) or when task demands encourage processing of distinctive attributes of each element (Humphreys, 1978; R. R. Hunt & Einstein, 1981). Relational information is processed when related elements are encountered (e.g., when exposed to items for which a shared relationship is apparent: *apple*, *orange*, *peach*, *plum*) or when task demands encourage processing of relationships among elements (Humphreys, 1978; R. R. Hunt & Einstein, 1981). The distinction between these two types of information has been used as the basis for much research in memory (Clark, 1992; Gronlund & Ratcliff, 1989; Hockley & Cristi, 1996) and has also been examined in some applied contexts like marketing (Malaviya, 2007).

In the current work, we provide a nuanced explanation of item and relational information ideas as applied to communications about sponsor–event relationships in order to explain the commonly reported problem of sponsorship misattribution. Specifically, we propose that there is potential for both item and relational information to be processed within any sponsorship setting in which people encounter brand and event information together. Brands and events will likely be processed as item information if they are perceived as unrelated (e.g., United Airlines, soccer) or as relational information if they are perceived as related (e.g., Adidas, soccer). The type of processing is important to understand because it has implications for the way information is subsequently retrieved, including when it is incorrectly retrieved, such as when competitor brands are incorrectly misattributed with sponsorships.

Theoretical Framework

Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) item and relational information framework integrates the memory perspectives of cognitive organization and levels of processing. The view of early memory theorists adhering to a cognitive organization perspective (Bower, 1970; Puff, 1979) was that good memory performance requires an episode be encoded in an organized manner based upon similarities across items of information. If a memory representation can be thought of as a set of encoded features, cognitive organization theorists would argue that similar features across related items produce integration or overlap across representations in memory. This facilitates subsequent retrieval by reducing the search set. Given a memory cue, only related memory representations that share some overlap or integration with the cue are activated, essentially limiting search to a class of associated representations and making retrieval more efficient. In contrast, levels of processing theorists (Craik & Lockhart, 1972; Lockhart, Craik, & Jacoby, 1976) claimed that good memory performance results from an emphasis on the processing of salient differences across items of information. For these theorists, individual items are encoded as discrete representations based on distinctive features and are subsequently identifiable because of this distinctiveness.

Einstein and Hunt (1980; R. R. Hunt & Einstein, 1981) innovatively proposed that the contrasting operations of similarity and difference encoding might function together such that optimal memory performance occurs when both forms of processing take place at encoding and are used in conjunction at retrieval. The researchers argued that similarity encoding (as per cognitive organization) applies to the processing of relational information, whereas distinctiveness encoding (as per levels of processing) applies to the processing of item information. Considering these two types of processes as complementary, they explained that for optimal retrieval of a stored memory, relational information serves to activate the general category to which the representation belongs, and item information can be used to accurately distinguish the target trace from within this limited group of representations.

As a caveat to their ideas, Einstein and Hunt (1980; R. R. Hunt & Einstein, 1981) highlighted that in order for both item and relational information to be utilized at retrieval, both must have been earlier encoded. They explained that the encoding of each type of information is dependent upon first, the items' natural *semantic relatedness*, and second, the person's *orientation toward encoding*. Semantic relatedness refers to how naturally associated items are perceived to be. When a setting involves obviously related items, in which similarities are more salient than differences, relational information will be predominantly encoded. For settings with unrelated items, however, in which differences are more salient, item information will be predominantly encoded. This aspect of encoding is assumed to be largely automatic.

Orientation toward encoding, on the other hand, refers to the way the person, at encoding, may additionally be oriented to attend to either the relatedness or the distinctiveness of the items, regardless of whether such is obvious (Einstein & Hunt, 1980; R. R. Hunt & Einstein, 1981). If they are oriented to attend to relatedness, then relational information will be encoded. If they are oriented to attend to distinctiveness, then item information will be encoded. This nonautomatic aspect of encoding supplements natural semantic relatedness encoding and determines whether the person encodes material as just one type of information or as both (R. R. Hunt & McDaniel, 1993). Better memory performance occurs when semantic relatedness and orientation toward encoding complement each other and result in encoding of both types of information. That is, memory is best for semantically unrelated items when people are oriented to encode relational information, and for semantically related items when oriented to encode item information.

Considerable empirical support has been provided for these ideas, beginning with Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) original work employing word lists and recall tasks. Participants were exposed to lists of words from either several obvious categories (e.g., animals, fruits, insects) or several obscure categories (e.g., things that make noise, things that are green, things that are liquid). Words in the obvious category list were assumed to be naturally encoded as relational information, and words in the obscure category list naturally as

item information. Half of the participants were told to consider and rate each word in the list for pleasantness (to orient item processing), and half were told to sort the words into categories (to orient relational processing). Supporting predictions, results showed that words in the obvious category list were better recalled when rated for pleasantness than when sorted into categories, whereas words in the obscure category list were better recalled when sorted into categories than when rated for pleasantness.

Application to Brand–Event Sponsorship

Within sponsorship, *semantic relatedness* can explain the commonly reported congruence effect described earlier (Olson & Thjomoe, 2011). The entities in a seemingly unrelated (or low congruence) brand–event sponsorship pair will predominately be encoded separately as item information, making it difficult for the relationship to be retrieved or for one member of the pair to cue the other. In contrast, a seemingly related (or high congruence) brand–event sponsorship pairing will predominately be encoded as relational information, supporting subsequent retrieval of both together or retrieval of one member of the pair given the other as a cue.

Further, ideas about *orientation toward encoding* help to reveal how communications intended to leverage these sponsorships might function. As previously discussed, a common recommendation in the marketing literature is that sponsor–event relational linkages should be communicated to facilitate sponsorship memory outcomes, in particular, for low congruence sponsorships (Cornwell et al., 2006). Using the Einstein and Hunt (1980; R. R. Hunt & Einstein, 1981) framework, benefits for low congruence sponsorships can be explained in that relational communications orient people to process relational information, which is in addition to the item information naturally encoded as a result of low semantic relatedness (low congruence). An issue not addressed in past sponsorship research, however, and one that Einstein and Hunt's ideas make apparent, is that communicating relational information for high congruence sponsorships might be somewhat unnecessary, as the brand–event pair has already been encoded as relational information. For high congruence sponsorships, there may be more value in communicating brand-specific item information as a form of complementary processing. This runs counter to the blanket recommendation in marketing of simply communicating relational linkages for all sponsorships (Olson & Thjomoe, 2011; Speed & Thompson, 2000).

In the sections that follow, we outline work that builds on these ideas. We consider implications for item and relational processing in competitive contexts like sponsorship, in which people might be exposed to information about more than one brand (including brands similar to the sponsor) even though only one brand is a true sponsor. In doing so, we outline how the provision of relational information can foster incorrect retrieval and how the provision of item information can guard against it. We also consider issues around examining brand–event pair relationships and how this can dictate the preferred cueing direction in cued recall tasks when measuring sponsorship awareness effects.

Competitive Contexts and Rejection of Incorrect Alternatives

In recent work, and of relevance to competitive sponsorship contexts, R. R. Hunt (2003, 2013) has examined the idea that in everyday settings, memory for items often involves not only identification of a correct item but also rejection of salient incorrect competing items that might otherwise be plausible responses (see also Roediger & McDermott, 1995). For example, in a store setting when someone is confronted with an array of fruit and must remember which type a spouse had asked to be purchased, they might need to correctly remember *peaches* while correctly rejecting similar alternatives like *plums*. Simply remembering the relational link between *must purchase* and *fruit* is inadequate. R. R. Hunt (2003, 2013) has noted that distinctiveness of the to-be-remembered target item within the relevant context of similarity is critical in such situations. Although distinctive item information can help with identification of the correct alternative, it is only useful in rejecting available incorrect competing alternatives if it assists with differentiating correct and incorrect alternatives. Remembering that the fruit to be purchased has attributes like being a stone fruit or sweet tasting, or beginning with the letter *p*, all represent peach-specific forms of item information that can allow correct identification of *peaches*. None of these, however, allows correct rejection of plausible alternatives, for which the item information also applies, like *plums.* Remembering an item-specific attribute like *furry-skinned*, however, does allow for correct rejection of *plums* because peaches have furry skin and plums do not. Thus, item information is useful in supporting accurate memory in competitive settings but only if it allows differentiation between correct and incorrect alternatives on a relevant dimension.

To illustrate using a sponsorship example, remembering that the sponsor of a soccer event is a famous sports-shoe brand might help with correctly naming Adidas as sponsor. It will not, however, help with correctly rejecting other salient sports-shoe brands like Nike or Puma, to which the *is a sponsor* label could also plausibly apply. Item information that affords distinctiveness to Adidas within the sports-shoe context would instead be necessary (e.g., has a unique three-striped logo) alongside the sponsor tag. Thus, it can be said that relational information is helpful in encoding associations between items, but it may not assist with distinguishing similar target and nontarget items at retrieval if it applies to both. Instead, item information is necessary to correctly identify the target item. Item information can only help with rejection of similar salient competing options, however, when it affords distinctiveness to the target item on a dimension in which target and nontargets differ. The *is a sponsor* label is still necessary but is not sufficient alone, as this could plausibly apply to any of the brands.

The ideas presented so far can be summarized as follows. An item and relational information framework can explain the commonly reported congruence effect in sponsorship. That is, memory can be driven by the semantic relatedness of the brand–event pair. Orientation toward encoding then suggests that communication of relational linkages should facilitate correct retrieval of brand–event relationships for low congruence sponsorships, whereas communication of brand-specific item information should support correct retrieval for high congruence sponsorships. Importantly, and running counter to conventional marketing recommendations, communication of relational linkages may inadvertently foster

incorrect retrieval of similar nonsponsor competitor brands if these are salient. In contrast, communication of distinctive sponsor-specific item information should help to guard against incorrect retrieval of similar nonsponsor competitor brands. Table 1 provides a summary of these ideas. In the next section, we highlight an additional consideration that must be taken into account when examining item and relational information in competitive contexts like brand–event sponsorships. Specifically, the paired nature of brand–event relationships means that direction of cueing in cued recall tasks is critical to consider.

Pair Relationships and Cued Recall Tasks

Hunt's work has predominantly involved presenting participants with lists/groups of words and testing for memory using recognition and category-cued recall tasks (Einstein & Hunt, 1980; R. R. Hunt, 2003, 2013; R. R. Hunt & Einstein, 1981). In these tasks, relational information is usually instantiated at a list/group level accommodating several words, whereas item information is usually at the individual word level or varies between lists. Participants are asked to either identify or retrieve as many words in each category as possible using recognition or category-cued recall. Although it has not been a major focus in Hunt's work, cued recall tasks following exposure to lists of word pairs are assumed to function similarly (Marschark & Hunt, 1989), but such that each pair can potentially establish a pair-specific relational context and item information is necessary at the pair level to facilitate accurate memory. Because there are only two members in a pair, however, cued recall requires that one member serve as a recall cue, leaving the other member as the only correct recall target. Incorrect responses may be given, but those will come from outside the pair (e.g., as a result of preexisting or inadvertently created relational linkages to plausible alternatives and the absence of distinctive item information). Examining item and relational information at the pair level in this way has special implications for evaluating memory effects in contexts like brand–event sponsorship. This is because the choice of cue in the recall task (event cue or brand cue) can limit the way item and relational effects are revealed, and can limit the possible incorrect responses that can be observed.

Consider the practical example of someone who views a sponsored sporting event on TV or reads about a brand sponsoring an event online. Although this may be set amid other information (including other marketing messages), the person is essentially being exposed to a sponsor–event pair relationship. Depending on brand–event congruence, sponsors might then supplement this pair with sponsor-specific item communications or sponsor–event relational communications to support consumer memory, and to limit misattribution to competitor brands. This supplementary information can be important, particularly if competitor brands are also encountered at this time through some presence in the media (e.g., reports about other brands vying for the sponsorship) or when engaged in their own marketing activities (e.g., coincidental marketing activities or ambush marketing activities). The efforts of sponsor brands are ultimately intended to foster consumer awareness of the sponsor–event relationship and not any competitor–event relationship. Depending on objectives, sponsors might hope that subsequent exposure to their brand will cue memory for the linked event, and gauge this with *brand-cued event recall* ("Adidas is the sponsor of *?*"). Alternatively, they might hope an event cue will prompt memory for the brand, and assess this with *event-cued brand recall* ("The soccer event is sponsored by *?*"). Correct retrieval of the sponsor–event relationship is deemed an indicator of sponsorship awareness, whereas incorrect retrieval of a competitor–event relationship indicates misattribution (Tripodi, Hirons, Bednall, & Sutherland, 2003). Both cueing directions are regularly used by sponsorship practitioners, although not together (Tripodi et al., 2003), and both directions have appeared in the academic literature (Cornwell et al., 2006). Both depend on the foundational brand–event pair relationship being adequately established in memory.

Although each of these cueing directions can reasonably serve as a measure of sponsorship awareness, the impact of supplementary item and relational communications may not be revealed similarly across both directions for two reasons. First, the value of sponsor-specific item communications in supporting correct retrieval is unlikely to be shown if participants are not asked to recall the sponsor (as with brand-cued event recall). Second, the strength of relational linkages to competitor brands may not be revealed via incorrect retrieval if linkages to true sponsor brands are stronger and when participants are only asked to recall the brand most strongly linked to the event (as would occur with event-cued brand recall following exposure to brand–event pairs). We elaborate on these issues in the remainder of this section.

Correct retrieval and the importance of event-cued brand recall. The first issue relates to cueing direction when seeking to assess correct retrieval of the sponsor–event relationship, and is particularly relevant when evaluating the impact of sponsor-specific item information. Classic research in memory indicates that in cued recall tasks, increasing the salience or meaningfulness of one member of a cue–target pair is beneficial to recall if that member is the target but not if it is the cue (Horowitz, Norman, & Day, 1966; R. G. Hunt, 1959; Kanak & Neuner, 1970). This is because item processing for one member of a pair increases the availability and/or discriminability of that item in memory (making it more retrievable) but does not necessarily increase the

Table 1
Item and Relational Information Impacts on Correct and Incorrect Retrieval for High and Low Congruence Sponsorships

	Type of information communicated	
Measurement focus	Brand-specific item information	Brand-event relational information
Correct retrieval	Beneficial for high congruence sponsorships but not low congruence sponsorships	Beneficial for low congruence sponsorships but not high congruence sponsorships
Incorrect retrieval	Guards against competitor misattribution for both high and low congruence sponsorships	Fosters competitor misattribution for both high and low congruence sponsorships

availability/discriminability of the other linked item (Horowitz et al., 1966; Kanak & Neuner, 1970). Thus, communicating sponsor-specific item information by highlighting that the sponsor is a large sports-shoe brand with a three-striped logo will be useful in helping respondents cued with *soccer event* to correctly retrieve *Adidas* (event-cued brand recall), but will be less useful in helping respondents cued with *Adidas* to correctly retrieve *soccer event* (brand-cued event recall). For this reason, the alternative cueing direction, *event-cued brand recall*, will be more effective in gauging correct retrieval for the sponsor following communications emphasizing sponsor-specific item information. Naturally, if a brand or event organizer were interested in communicating event-specific item information, then *brand-cued event recall* would be the more useful direction.

In contrast, assessing the value of supplying relational information about the sponsorship may be demonstrated using either cueing direction, because relational linkages emphasize the association between the two entities rather than just one particular member (Einstein & Hunt, 1980; R. R. Hunt & Einstein, 1981). The provision of relational information can help to increase the availability of both members of the pair, as well as the association between them, making them each useful retrieval cues for the other. This accords with basic research examining associative symmetry between pairs of items in episodic memory, which suggests that associations are essentially symmetrical if the same type of item is used for both members of the pair and if both are similarly available in memory (Kahana, 2002). Differences in overall levels of recall may still exist when brand-to-event and event-to-brand linkages are not symmetrical because of item availability and preexisting linkages (Cornwell et al., 2006; Kahana, 2002; Tripodi et al., 2003), but the provision of additional relational information should not differentially impact one particular cueing direction.

Incorrect retrieval and the importance of brand-cued event recall. The second issue relates to using an appropriate cueing direction when seeking to assess the extent to which competitor brands have become associated with the event (incorrect retrieval). Not all sponsorship practitioners are likely to be proactive in measuring erroneous sponsorship recall, and of those who do, many may simply look at incorrect responses following their examination of correct recall (Tripodi et al., 2003). However, such an approach may not always be optimal—here, we suggest sponsors need to be more strategic in measuring erroneous recall, particularly when there are concerns competitors might be misattributed with the sponsorship (e.g., when competitors are present, or when assessing misattribution that results from sponsor relational communications). We expect that *brand-cued event recall* will be more informative than will event-cued brand recall for evaluating this incorrect retrieval. Notably, this is the opposite direction we recommended for measuring correct retrieval.

When people are asked to retrieve one member of a pair using the other as a cue, it is usually appropriate for them to offer a single response, which is assumed to be the response most strongly linked to the cue in memory (Chappell & Humphreys, 1994). Thus, if a sponsorship pairing and its associated communications have established a relational link between the event and sponsor, as well as a somewhat weaker inadvertent relational link between the event and similar competitors, then using an event-cued brand recall task with a single response should usually result in recall of the more strongly linked sponsor brand only (Cornwell, Humphreys, Quinn, & McAlister, 2012). Response competition between the alternatives sees only the strongest trace explicitly offered as a response. This is because the recall task is considered complete once the strongest response has been given, unless the participant is instructed otherwise (we outline an argument against instructing participants to offer multiple responses shortly). This type of event-cued brand recall is therefore unlikely to fully reveal the extent to which weaker connections to other brands exist, or have been created, and may therefore fail to reveal the extent to which sponsor communications have inadvertently benefited competitors. Erroneous recall of nonsponsor competitor brands will still occasionally be seen, but only when the linkage to the competitor is stronger than the linkage to the sponsor (e.g., in cases when the competitor has a strong natural semantic relationship with the event, or when a sponsor's relational linkage communications apply strongly to a competitor).

At first glance, it might seem that a reasonable solution to gauging levels of erroneous competitor recall, as well as correct sponsor recall, would be to request participants list all brands that come to mind given an event cue rather than just one. Such an approach has been used in past item and relational information research examining category-cued recall for lists/groups of words (R. R. Hunt, 2003, 2013) and is not uncommon in sponsorship (Tripodi et al., 2003). There are problems with this approach, however, if the goal is to specifically assess the strength of a direct event-to-brand relationship. When respondents are asked to offer multiple responses, it is possible that some contamination of the cue–target relationship occurs, because a first response to a given cue can implicitly serve as an additional cue for other subsequent responses rather than all responses stemming just from the initially provided cue (Nelson, McEvoy, & Schreiber, 1990). For example, given the category cue *fruit*, the person may initially retrieve *apple*, and then use both *fruit* and *apple* together as cues to retrieve *orange*, and so on, rather than just the fruit cue alone (see Humphreys & Chalmers, 2016, for a discussion). This issue has also been raised in the sponsorship literature by Cornwell et al. (2012), who described this type of retrieval as being based on a constellation of sponsorship information in memory rather than just strength of the event–brand relationship (i.e., *soccer* may be used to retrieve *Adidas*, and then *soccer* and *Adidas* together used to retrieve *Nike*, rather than *soccer* itself eliciting *Nike*). Thus, an event-cued brand recall task requesting multiple brand responses can help illustrate the associative networks that develop in memory but does not necessarily provide a pure measure of the strength of event–brand linkage. Asking for multiple responses can lead to overestimates of the extent competitors have become directly associated with the event.

The more informative alternative for evaluating incorrect retrieval is to employ the reversed cueing direction (*brand-cued event recall*), in which respondents give a separate response to a competitor brand cue and to a sponsor brand cue, so as to gauge the strength of memory connection for each. Research by Humphreys et al. (2010) and Weeks, O'Connor, and Martin (2017) has previously examined recall to sponsor and competitor cues to show how ambusher communications can impact competitor–event recall. It is likely to be equally useful here in examining erroneous retrieval resulting from sponsor item and relational communications.

In summary, understanding how brand–event relationships are (mis)remembered, and how this is impacted by item and relational communications, requires careful consideration of cueing direction (refer to Table 2 for a summary). For correct retrieval, the value of providing distinctive sponsor-specific item communications will be best evidenced using event-cued brand recall, whereas the value of providing sponsor–event relational communications may be measured in either cueing direction. To assess incorrect retrieval, when seeking to understand the extent to which competitor brands have become associated with an event, it may be most useful to employ brand-cued event recall using competitor cues and sponsor cues. In practice, this means that sponsors need to be quite considered in their approach to measurement, depending on communications employed and whether they want to gauge correct retrieval, incorrect retrieval, or both.

Predictions

In the current work, we use two cued-recall experiments to examine our item and relational information predictions for brand–event sponsorships. Experiment 1 employs an event-cued brand recall dependent measure, and Experiment 2 employs a brand-cued event recall dependent measure. We have four general predictions. First, based on ideas about semantic relatedness, we expect better memory performance for high congruence sponsorships than low congruence sponsorships. Second, in accordance with correct retrieval ideas about orientation toward encoding, we expect that providing relational communications will be of more value to low congruence sponsorships than to high congruence sponsorships, and, conversely, that item communications will be of more value to high congruence sponsorships than to low congruence sponsorships. Third, we expect that contrary to conventional thinking in sponsorship, the provision of relational communications will foster incorrect retrieval of similar nonsponsor competitor brand relationships (misattribution), irrespective of congruence, particularly when competitors are present in the sponsorship context. In contrast, we expect that the provision of item communications will guard against incorrect retrieval of similar nonsponsor competitor brand relationships. Finally, in line with our discussion of cueing direction differences, we anticipate that Experiment 1 (event-cued brand recall) will be most diagnostic of the differential value of using item and relational communications to support correct retrieval. Experiment 2 (brand-cued event recall) should be most informative with regard to revealing how item and relational communications differentially contribute to incorrect retrieval, or misattribution.

The Current Research

Both experiments in the current research make use of the simulated news story paradigm adopted from previous sponsorship research. In this paradigm, participants are presented with a series of brief fictitious news story reports about upcoming sponsorships and are then given a subsequent memory test (Cornwell et al., 2006; Humphreys et al., 2010; Johar & Pham, 1999). Participants receive exposure to several news stories to allow for reliable estimates of recall (rather than just a single vignette in which recall can be driven by idiosyncratic or case-specific features). News stories have ecological validity as test materials given that they represent one way consumers learn about sponsorships in everyday life, and are similar to other types of brief marketing narratives consumers can encounter in day-to-day media. Although the news story format and list structure might not be how people always encounter sponsorship information (real-life exposures may be spread out over time or occur via varied media types), the procedure does allow for tightly controlled instantiations of the relevant information comparisons, and hence affords strong internal validity. Our goal with using the news story paradigm is therefore to allow a test of our theoretical predictions rather than to suggest news stories as being the only, or dominant, way sponsorship information is encountered.

In the current experiments, each participant was presented with 12 sponsorship news stories. These included both low and high congruence sponsor–event pairings, together with supplementary nonspecific sponsor filler information, sponsor-specific item information, or sponsor–event relational information. In conjunction with this, and to enable examination of differences resulting from competitor presence, news stories also contained one of three types of competitor information: no competitor information, competitor-specific item information, or competitor–event relational information. Although we expected that any competitor presence within this context will support misattribution, for completeness, a competitor-specific item information condition was included (analogous to when competitors are present through coincidental brand-specific communications), as was a competitor–event relational information condition (analogous to when competitors are present as a result of ambush marketing type communications that imply a link to the event). Memory was assessed using cued recall: Experiment 1 used an event-cued brand recall dependent measure, and Experiment 2 used a brand-cued event recall dependent measure. Erroneous recall was assessed via competitor brand intrusions in Experiment 1 (recall of nonsponsor competitor brands as sponsor), and cue substitution generalization responses in Experiment 2 (recall of events to nonsponsor competitor brands).

Table 2
Cueing Direction Effectiveness Depending on Measurement Focus (Applies to Both High and Low Congruence Sponsorships)

	Type of information communicated	
Measurement focus	Brand-specific item information	Brand-event relational information
Correct retrieval	Event-cued brand recall most diagnostic of memory	Brand-cued event recall and event-cued brand recall both diagnostic of memory
Incorrect retrieval	Brand-cued event recall most informative of strength of competitor association	Brand-cued event recall most informative of strength of competitor association

Stimulus Development

The stimuli were fictitious news stories that participants heard via a headset, much like what might be heard as part of a radio broadcast or podcast. Presenting the stories in this way ensures exposure consistency across participants and simulates the incidental manner in which sponsorship information is often encountered. The brands used were well known and prominent within the market place (e.g., Adidas), and the events were fictitious with names that could be easily placed in an event category (e.g., the Hands-Off Soccer Cup). News stories were developed for each of 12 events, with different versions based on high and low congruence of sponsor, the type of supplementary sponsor information heard (filler, item, relational), and the type of competitor information included (none, item, relational). Appendix A includes high congruence examples, and Appendix B includes low congruence examples. Although the news stories were fictitious, they were modeled on real sponsorship media coverage conveying commentary about both sponsor and competing brands. It is not uncommon for news stories to mention sponsor and competitor brands in the same article, particularly when discussing competitive sponsorship deals (e.g., Critchley, 2016; Reuters, 2015).

For control purposes, all news stories were structured similarly across six sentences, but the wording differed to ensure a sense of realism. In the condition in which no competitor information was provided, the first sentence of each story noted that despite competition from market rivals, the sponsor brand had secured a sponsorship deal with the given event. The second and third sentences explained the sponsor was pleased with this outcome and provided a brief description of the event. The fourth sentence described a statement by an event official about the event, which extended into the fifth sentence. The sixth sentence served as the sponsor information manipulation sentence (sponsor mentioned as part of filler, item, or relational information). In the conditions in which competitor information was included, the first sentence of each news story was altered to include the name of a specific market rival, the fourth sentence was altered to contain a statement from the competitor about the event, and the fifth sentence was altered to serve as the competitor manipulation sentence (contain competitor-specific item information or competitor–event relational information). Competitors were always major market rivals of the named sponsor. Choice of brands was supported via company profile checks using the Global Market Information Database, with consideration of the need for brands prominent in the Australian market place, as study participants were in Australia.

For the information manipulations, sponsor filler information was designed to mention the sponsor and event but not highlight distinctive attributes of the sponsor or the sponsor–event relationship. Brand-specific item information (for both sponsors and competitors) was designed to elaborate on some distinctive brand-specific attribute. Brand–event relational information (for both sponsors and competitors) was designed to connect the brand and event in a meaningful way such that a logical relationship was made apparent.

Stimulus Pretesting

Following ethics committee approval, students from undergraduate psychology courses at a large Australian public university were recruited to pretest aspects of the experimental stimuli. All were native English speakers who indicated they had lived in Australia for at least 15 years, and hence had an understanding of event sponsorship.

Perceived sponsor–event congruence. To ensure the chosen sponsor–event pairings appropriately represented high and low congruence sponsorships, 30 pretest participants rated perceived congruence between each sponsor–event pair using a 6-point scale anchored with *poorly matched* and *well matched*. Overall ratings for high congruence pairs were significantly higher than for low congruence pairs (Ms = 5.578 and 2.511), $F(1, 28) = 759.049$, $p < .001$, $\eta_p^2 = .964$. Moreover, a series of t tests revealed this was evident across each set of two brands (one high and one low congruence) per event (all with $p < .001$; see Table 3).

Perceived sponsor–competitor similarity. Choice of sponsor and competitor brands was checked to ensure participants perceived each sponsor–competitor pair as similar (see Table 4). Ratings from 98 participants showed each pair of brands was perceived as having moderate to high brand similarity ($M = 3.241$, using a 4-point scale anchored with *no similarity* and *high similarity*), making them appropriate for use. Competitor–event congruence was consequently inferred via this perceived sponsor–competitor similarity.

Table 3
Mean Congruence Ratings for Brands Paired with Each Event

Event	Congruent sponsor	Mean	Incongruent sponsor	Mean
Hands-Off Soccer Cup	Adidas	5.667	Macleans	2.067
Day-Break Relay Run	Gatorade	5.467	Google	3.000
Highlights Hair Spectacular	Clairol	6.000	Tetley	1.600
Fresh-Track Offroad Rally	Bridgestone	5.400	Gillette	3.467
Enlightened Living Electronics Fair	Sony	5.867	Perrier	2.133
Nautical Mile Backstroke Cup	Arena	5.733	Marriott	2.733
Speed Dialer Texting Challenge	Motorola	5.933	Kodak	2.400
Fantasy Parade Fashion Show	Armani	5.467	Dell	2.000
In-Print Writer's Competition	BIC	5.600	Bolle	2.067
Party-On New Year Countdown	Casio	5.133	Avis	3.133
Quick Fingers Remote Control Race	Duracell	4.867	Lee	2.800
Spend Smart Credit Management Expo	Visa	5.800	Mobil	2.733

Note. Means across the two sponsorship types for each event differed significantly (at $p < .001$).

Table 4
Similarity Ratings for Brands Selected as Sponsor and Competitor

High congruence with event			Low congruence with event		
Sponsor	Competitor	Brand similarity	Sponsor	Competitor	Brand similarity
Adidas	Puma	3.152	Macleans	Colgate	3.404
Gatorade	Powerade	3.656	Google	Yahoo	3.232
Clairol	L'Oreal	3.071	Tetley	Lipton	3.222
Bridgestone	Goodyear	3.485	Gillette	Schick	3.444
Sony	Panasonic	3.444	Perrier	Evian	3.061
Arena	Speedo	2.606	Marriott	Hyatt	3.141
Motorola	Nokia	2.869	Kodak	Fuji	3.152
Armani	Gucci	3.374	Dell	Acer	3.000
BIC	Pilot	3.253	Bolle	Oakley	3.030
Casio	Seiko	3.051	Avis	Hertz	3.303
Duracell	Energizer	3.566	Lee	Levi's	3.162
Visa	MasterCard	3.596	Mobil	Shell	3.505

Sentence manipulations. Sponsor information sentences were pretested to ensure these contained the type of information necessary for the experimental manipulations (filler, item, relational). Using two separate 6-point scales anchored with *strongly disagree* and *strongly agree*, 60 participants rated the extent to which the sentences provided unique sponsor-specific information (i.e., item information), and the extent to which the sentences helped to associate the sponsor and event together (i.e., relational information). As anticipated, sponsor filler sentences were rated similarly neutral on both item and relational measures (Ms = 3.325 and 3.340, respectively), $F < 1$; sponsor item information sentences were rated higher on the item measure and lower on the relational measure (Ms = 4.331 and 3.631, respectively), $F(1, 59) = 40.422$, $p < .001$; and sponsor relational information sentences were rated lower on the item measure and higher on the relational measure (Ms = 3.942 and 4.329, respectively), $F(1, 59) = 12.565$, $p = .001$. For the competitor information manipulation sentences, 60 different pretest participants gave ratings. Results showed that competitor item information sentences were rated higher on the item measure and lower on the relational measure (Ms = 4.492 and 3.654, respectively), $F(1, 59) = 41.878$, $p = .002$, and competitor relational information sentences were marginally lower on the item measure and higher on the relational measure (Ms = 4.192 and 4.383, respectively), $F(1, 59) = 3.902$, $p = .053$. Thus, all sentences were appropriate for use.

Experiment 1

Method

Participants and design. Experiment 1 used a 2 (sponsor–event congruence: high, low) × 3 (sponsor information type: filler, item, relational) × 3 (competitor information type: none, item, relational) mixed factorial design. Sponsor–event congruence and sponsor information type were within-subjects variables, and competitor information type was a between-subjects variable. Event-cued brand recall was the dependent variable. The participants were 144 undergraduate psychology students from a large Australian public university who received course credit. All were native English speakers who had lived in Australia for at least 15 years. They were tested in individual partitioned testing cubicles.

Materials and procedure. Participants were randomly assigned to one of the three competitor information conditions as they arrived at the testing sessions. They then heard a series of 12 news stories within that competitor information condition (one story for each of the 12 events). Each set of news stories was organized to ensure six were for high congruence sponsorships and six were for low congruence sponsorships, and that within each set of six, there were two with sponsor filler information, two with sponsor-specific item information, and two with sponsor–event relational information. The manipulations were counterbalanced to ensure that every event was presented an equal number of times at each level of congruence and for each type of sponsor information, with sequences varied to avoid order effects.

Distractor content was placed before and after the series of sponsorship news stories. This included a series of 12 horoscope readings and 12 global region weather forecasts read by different announcers, and was incorporated to reduce participants selectively attending to the sponsorship information, and to minimize session primacy and recency effects. A cover story suggested that the presentation was of radio broadcaster test content, and thus that it might sound a bit repetitive. They were told to listen to the content in the same manner as they might listen to a radio broadcast and that they would be asked for feedback about the announcers afterward. The rationale was to create reasonably naturalistic incidental listening conditions. Responses during debriefing indicated that this was successful, with almost all participants indicating they had listened in a relatively casual manner and none reporting an awareness of the sponsorship information manipulations. Memory for sponsorship information was tested by listing each of the 12 events from the news stories and asking for the name of the brand that the announcer had indicated would be sponsoring each particular event (event-cued brand recall).

Results

For our analysis, we consider both correct recall and incorrect recall, and report results separately to address our predictions as discussed earlier. Recall scores represent the proportion of responses that were correct or incorrect across the 12 sponsorship news story cues. Unlike recognition measures in which a single composite measure can be derived (i.e., by correcting the proportion of hits based on the proportion of false alarms to distractor items), this is not feasible with recall measures because the domain of possible distractor items is essentially undefined.

Correct retrieval (event-cued brand recall). A 2 (sponsor–event congruence: high, low) × 3 (sponsor information type: filler, item, relational) × 3 (competitor information type: none, item, relational) mixed analysis of variance (ANOVA) was performed, with event-cued brand recall of the sponsor as the dependent measure. Results are presented graphically in Figure 1. In accordance with predictions about naturally occurring semantic relatedness, there was a significant main effect of congruence, $F(1, 141) = 63.382$, $p < .001$, $\eta_p^2 = .310$, indicating that sponsor recall was greater for high congruence sponsors ($M = .376$) than for low congruence sponsors ($M = .181$). Supporting predictions about orientation toward encoding, there was a significant interaction between congruence and sponsor information type, $F(2, 282) =$

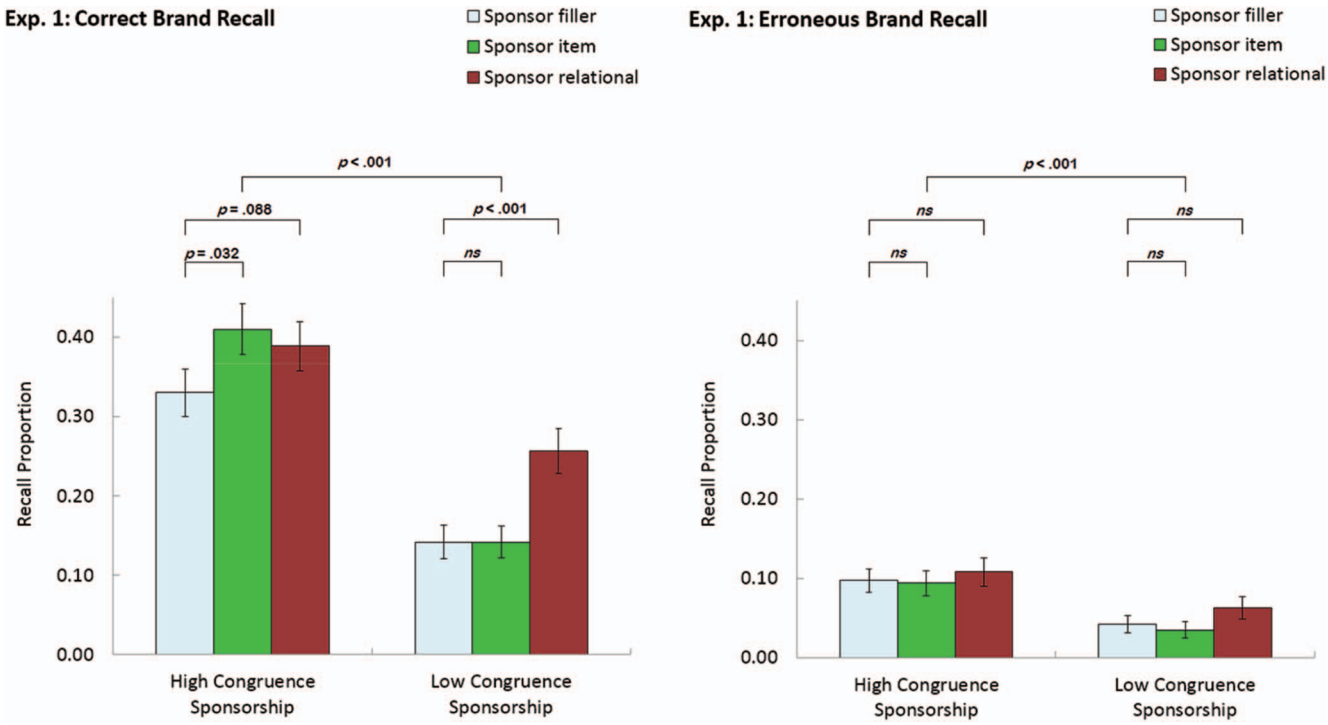

Figure 1. Experiment 1: Correct brand recall and erroneous brand recall proportions, collapsed across competitor information types (error bars represent standard errors). See the online article for the color version of this figure.

4.076, $p = .018$, $\eta_p^2 = .028$. As predicted, planned simple contrasts showed that for low congruence sponsorships, relative to when sponsor filler information was provided ($M = .142$), there was no difference in sponsor recall when sponsor-specific item information was provided ($M = .142$), $F < 1$, but a significant increase when sponsor–event relational information was provided ($M = .257$), $F(1, 141) = 10.701$, $p = .001$, $\eta_p^2 = .071$. In contrast, for high congruence sponsorships, relative to when sponsor filler information was provided ($M = .330$), there was a significant increase when sponsor-specific item information was provided ($M = .410$), $F(1, 141) = 4.681$, $p = .032$, $\eta_p^2 = .032$, but this same increase was not as present for sponsor–event relational information ($M = .389$), $F(1, 141) = 2.943$, $p = .088$, $\eta_p^2 = .020$. Notably, however, a post hoc comparison showed the difference between sponsor-specific item and sponsor–event relational information conditions was not significant, $F < 1$, suggesting the congruent pairings may have still benefited to some extent from relational communications in the experiment. There was no main effect of competitor information type ($F < 1$), indicating that correct recall of sponsors was essentially unaffected by whether sponsors were presented in conjunction with no competitor, competitor item, or competitor relational information (Ms = .278, .281, and .276, respectively). No other effects were significant.

Incorrect retrieval (event-cued brand recall). Incorrect retrieval was examined by considering participants' competitor brand intrusions, which is erroneous recall of sponsor brands' direct competitors. Here, we expected that competitor brands being encountered within the context of the sponsorship (by virtue of a presence in the news stories) would increase their likelihood of being recalled, and particularly those that share a semantic relationship with the event (high congruence). As noted, we also expected that the event-cued brand recall direction of cueing would not be particularly useful in revealing the differential effects of item or relational sponsor communications, because the nature of cued recall tasks with pairs will typically see participants respond by listing only the brand most strongly linked to the event (usually the sponsor). Importantly, this idea was reinforced in our participants' actual responses, in that none listed more than one brand to any of the event cues.

A 2 × 3 × 3 mixed ANOVA was run with the same independent variables as the previous analysis, with erroneous recall of competitor brands using event-cued brand recall as the dependent measure. In line with predictions, we found a main effect of competitor information type, $F(2, 141) = 26.852$, $p < .001$, $\eta_p^2 = .276$, showing that erroneous recall was more likely when competitors were present within the sponsorship news stories. This was driven by higher levels of erroneous recall for both the competitor item condition ($M = .108$) and competitor relational condition ($M = .104$) compared with the no-competitor condition ($M = .007$). There was no difference in erroneous recall between the competitor item and relational conditions, $F < 1$, suggesting that both types similarly foster competitor misattribution. We also found a significant main effect of competitor brand congruence, $F(1, 141) = 21.232$, $p < .001$, $\eta_p^2 = .131$, indicating that erroneous recall was greater for high congruence competitor brands ($M = .100$) than for low congruence competitor brands ($M = .046$). These results are in accordance with the idea that competitors that share a strong semantic relationship with the event are more likely

to be incorrectly retrieved than are those that lack a semantic relationship.

Notably, and in line with expectations, there was no main effect of sponsor information type, $F(2, 282) = 1.151$, $p = .318$, $\eta_p^2 = .008$, nor any interaction between sponsor information type and congruence, $F < 1$ (see Figure 1). This supports the notion that if sponsor-specific item or sponsor–event relational communications do differentially impact memory errors, the effects are not revealed using event-cued brand recall.

Additional types of incorrect retrieval (event-cued brand recall). In addition to considering direct competitor brand intrusions, it is also possible to examine erroneous recall of brands encountered as part of other sponsorships in the experiment (intralist brand intrusions). These might be considered analogous to brand "clutter" in the sponsorship environment from a marketing perspective. A $2 \times 3 \times 3$ mixed ANOVA was conducted using the same independent variables as the previous analysis but with intralist brand intrusions as the dependent variable. We found a main effect of congruence, $F(1, 141) = 10.176$, $p = .002$, $\eta_p^2 = .067$, with intralist brand intrusions occurring less in the context of high congruence compared with low congruence sponsorships (Ms = .050 and .093, respectively). The effect of sponsor information type was not significant, $F < 1$, indicating that these intralist brand intrusions occurred at a similar rate regardless of whether sponsors communicated filler, item, or relational information (Ms = .082, .063, and .069, respectively). No other effects were significant.

It is also possible to consider erroneous recall of brands not listed at all within the study (extralist brand intrusions). This would be analogous to sponsorship misattribution stemming from general brand prominence rather than brands necessarily being encountered in the sponsorship setting. The same analysis was conducted but with extralist brand intrusions as the dependent variable. This revealed a marginal effect of congruence, $F(1, 141) = 3.179$, $p = .077$, $\eta_p^2 = .022$, with extralist intrusions being marginally more evident in the context of high congruence as opposed to low congruence sponsorships (Ms = .044 and .027, respectively). There was no effect of sponsor information type, $F < 1$, with similarly low levels of this type of erroneous recall across the sponsor filler, item, and relational information types (Ms = .036, .035, and .035, respectively). No other effects were significant. Thus, like erroneous recall based on intralist intrusions, these extralist intrusions occurred at low levels and were not affected by the type of sponsor communication. As with direct competitor brand intrusions, however, their true strength and any impacts resulting from sponsors communicating item or relational information may be obscured by the use of event-cued brand recall and response competition from stronger event–sponsor relationships.

Discussion

The results of Experiment 1 demonstrate that Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) item and relational information ideas can be used to explain correct retrieval of brand–event sponsorship relationships. A congruence effect was found for correct sponsor recall, which corresponds to item and relational ideas about naturally encoded semantic relatedness. High congruence sponsor–event pairings are more naturally encoded as relational information, enabling the event to serve as an effective retrieval cue for the sponsor. Low congruence sponsor–event pairings are more naturally encoded separately as item information, making it difficult for the event to serve as a retrieval cue for the sponsor. In line with expectations stemming from ideas around orientation toward encoding, significant improvements in sponsor recall were seen when relational information (but not item information) was provided for low congruence sponsorships and when item information was provided for high congruence sponsorships. We found evidence that relational communications supported correct recall to some extent for high congruence sponsorships as well, which may suggest some value in orienting further relational encoding for these brand–event relationships (at least in terms of correct retrieval). Regardless of this, however, the findings are consistent with an item and relational conceptualization of memory effects for sponsor–event pairings. Moreover, they demonstrate that an event-cued brand recall task is valuable in revealing the effects of item and relational information when assessing correct retrieval.

In terms of erroneous recall, we predicted and found that this direction of cueing (event-cued brand recall) is not informative with regard to demonstrating the differential effects of sponsor item or relational information. A weaker event-to-competitor relationship is less likely to be retrieved in the presence of a stronger event-to-sponsor relationship, obscuring the extent to which the impact of item and relational communications from the sponsor can be observed on erroneous memory (Cornwell et al., 2012). This is not to suggest that competitors are never recalled, as that will happen when linkages to competitor brands are stronger, such as when there is a salient competitor that shares a natural semantic relationship with the event. We observed evidence of this with high congruence competitors and when competitors were present within the sponsorship setting (competitor item and relational conditions). When they are present, it is possible they will be misattributed as the sponsor, and it is possible this will be enhanced when sponsors communicate relational linkages. It is for these reasons that there is a need for sponsors to gauge the extent to which misattribution occurs and how this is impacted by their own marketing communications. In Experiment 2, we examine these effects using a reversed cueing direction (brand-cued event recall), which allows for the strength of competitor-to-event and sponsor-to-event relationships to be measured separately.

Experiment 2

In Experiment 2, brand-cued event recall was tested. Participants were 144 undergraduate psychology students who met the same criteria as those in Experiment 1. The materials and procedure were similar to Experiment 1, but at test, participants were provided with a series of 24 brand cues (12 sponsor cues and 12 competitor cues). These were in an intermixed order that differed across participants, so that on half the occasions, the sponsor cue for an event appeared at a position in the series before the competitor cue, and on the other half, the competitor cue appeared before the sponsor cue (and never adjacent one another). Participants were asked to name the event that the brand was said to be sponsoring if it was a sponsor. They were informed that only some brands were sponsors and that they should not list events to those brands that were not sponsors.

Results and Discussion

Because participants were required to recall fictitious event names, responses were considered valid if they included some part of the event name and were based in the correct event category (i.e., responses like "soccer cup" were accepted as correct for "Hands-Off Soccer Cup"). Overly general responses were not treated as valid (e.g., "sport" or "event").

Correct retrieval (brand-cued event recall with sponsor cue). A 2 × 3 × 3 mixed ANOVA was conducted using the same independent variables as in Experiment 1 but with correct event recall to sponsor cues as the dependent measure. In support of semantic relatedness ideas, results showed a significant main effect of congruence, $F(1, 141) = 63.863$, $p < .001$, $\eta_p^2 = .312$, such that participants correctly recalled more events to high congruence sponsors ($M = .358$) than low congruence sponsors ($M = .199$). There was a significant main effect of sponsor information type, $F(2, 282) = 13.350$, $p < .001$, $\eta_p^2 = .086$, which was driven by similar levels of correct recall across sponsor filler and item information (Ms = .241 and .238, respectively), $F < 1$, with an increase between sponsor filler and relational information ($M = .356$), $F(1, 141) = 18.595$, $p < .001$, $\eta_p^2 = .117$. There was no interaction between congruence and sponsor information type, $F(2, 282) = 1.976$, $p = .141$, $\eta_p^2 = .014$. Thus, in line with the argument that brand-cued event recall limits the extent to which benefits of sponsor-specific item information can be observed (unlike with event-cued brand recall in Experiment 1), in Experiment 2, the value of providing sponsor-specific item information was not evidenced. In contrast, the value of sponsor–event relational information was apparent, as relational information supports recall in both cueing directions. As in Experiment 1, levels of correct recall were similar across the no competitor, competitor item, and competitor relational information types (Ms = .318, .245, and .273, respectively), $F(2, 141) = 2.057$, $p = .132$, $\eta_p^2 = .028$, suggesting that the presence of competitors does not substantially reduce correct recall to sponsor cues.

Correct retrieval and cue order (sponsor cue presented first vs. second). As a follow-up check, we also examined cue order to determine whether correct retrieval to sponsor cues was affected by whether these were encountered first before competitor cues or otherwise after competitor cues. This was important to consider because participants may be less likely to produce a response for a sponsor–event relationship if they have previously recalled that event with a different brand. By introducing cue order into the analysis, we found it had an overall main effect, $F(1, 141) = 6.868$, $p = .010$, $\eta_p^2 = .046$, with correct retrieval to sponsor cues being greater when these were presented before competitor cues rather than after (Ms = .306 and .251, respectively). Cue order did not however interact with other variables, suggesting that the previously described correct recall patterns held, regardless of cue order. Figure 2 illustrates these similar patterns when sponsor cues are presented first before competitor cues (top panel, left) and also when presented after competitor cues (bottom panel, left).

Incorrect retrieval (brand-cued event recall with competitor cue). To examine participants' erroneous recall of events to direct competitor brand cues, we ran a 2 × 3 × 3 mixed ANOVA. We found a significant main effect of competitor information type, $F(2, 141) = 24.775$, $p < .001$, $\eta_p^2 = .260$. Like Experiment 1, there was greater erroneous recall when competitors were present in the news stories in the competitor item and relational conditions ($M = .179$ and .184, respectively) compared with when no competitors were named ($M = .049$). As in the previous experiment, we found no significant difference between the competitor item and relational conditions, $F < 1$, suggesting both types similarly facilitate misattribution. There was a significant main effect of competitor congruence, $F(1, 141) = 28.970$, $p < .001$, $\eta_p^2 = .170$, showing that participants were more likely to erroneously recall events to high congruence competitor cues ($M = .182$) than to low congruence competitor cues ($M = .093$), reinforcing ideas about semantic relatedness. Like Experiment 1, these results are in accordance with the idea that erroneous recall is enhanced when competitors are present within the sponsorship environment and when those competitors are congruent with the event.

Importantly, and in line with predictions about the effects of sponsor communications on incorrect retrieval, there was a significant main effect of sponsor information type on erroneous recall, $F(1.90, 267.63) = 8.288$, $p < .001$, $\eta_p^2 = .056$ (a Greenhouse-Geisser correction was employed when Mauchly's test revealed nonsphericity, $p = .021$). Planned simple contrasts showed that compared with when sponsor filler information was provided ($M = .120$), erroneous recall did not increase with provision of sponsor-specific item information ($M = .108$), $F < 1$, but did significantly increase when sponsor–event relational information was provided ($M = .184$), $F(1, 141) = 8.267$, $p = .005$, $\eta_p^2 = .055$. There was no interaction between congruence and sponsor information type, $F < 1$. Thus, as expected, and notably, erroneous recall increased for both high and low congruence sponsorships when sponsor–event relational information was communicated. This supports our proposition that when sponsors communicate relational information, they inadvertently increase the likelihood of misattribution to competitors, and that a brand-cued event recall task is necessary to reveal this. Although the provision of sponsor-specific item information did not decrease erroneous recall below control levels, neither did it increase erroneous recall the way relational information did. Thus, in conjunction with the results of Experiment 1, in which item information was shown to improve recall for high congruence sponsorships, the absence of an increase in erroneous recall here suggests item information may be the smarter communication strategy for high congruence sponsor–event pairs.

Incorrect retrieval and cue order (competitor cue presented first vs. second). A follow-up check was conducted to determine whether incorrect retrieval to competitor cues was affected by cue order (i.e., competitor cues presented first before sponsor cues, or after). This was particularly important to consider for recall to competitor cues because, in accordance with the response competition ideas discussed earlier, a stronger sponsor-to-event relationship retrieved first might then limit subsequent recall of a weaker competitor-to-event relationship or allow it to be more easily dismissed. If this is the case, it would suggest that a true indication of incorrect retrieval strength would require a test of recall to competitor cues prior to sponsor cues.

Introducing cue order into the previous analysis revealed an overall main effect of cue order, $F(1, 141) = 29.347$, $p < .001$, $\eta_p^2 = .172$, with incorrect retrieval being greater when competitor cues were encountered first prior to sponsor cues as opposed to after (Ms = .183 and .091, respectively). Notably, cue order also interacted with sponsor information type, $F(1, 141) = 4.204$, $p =$

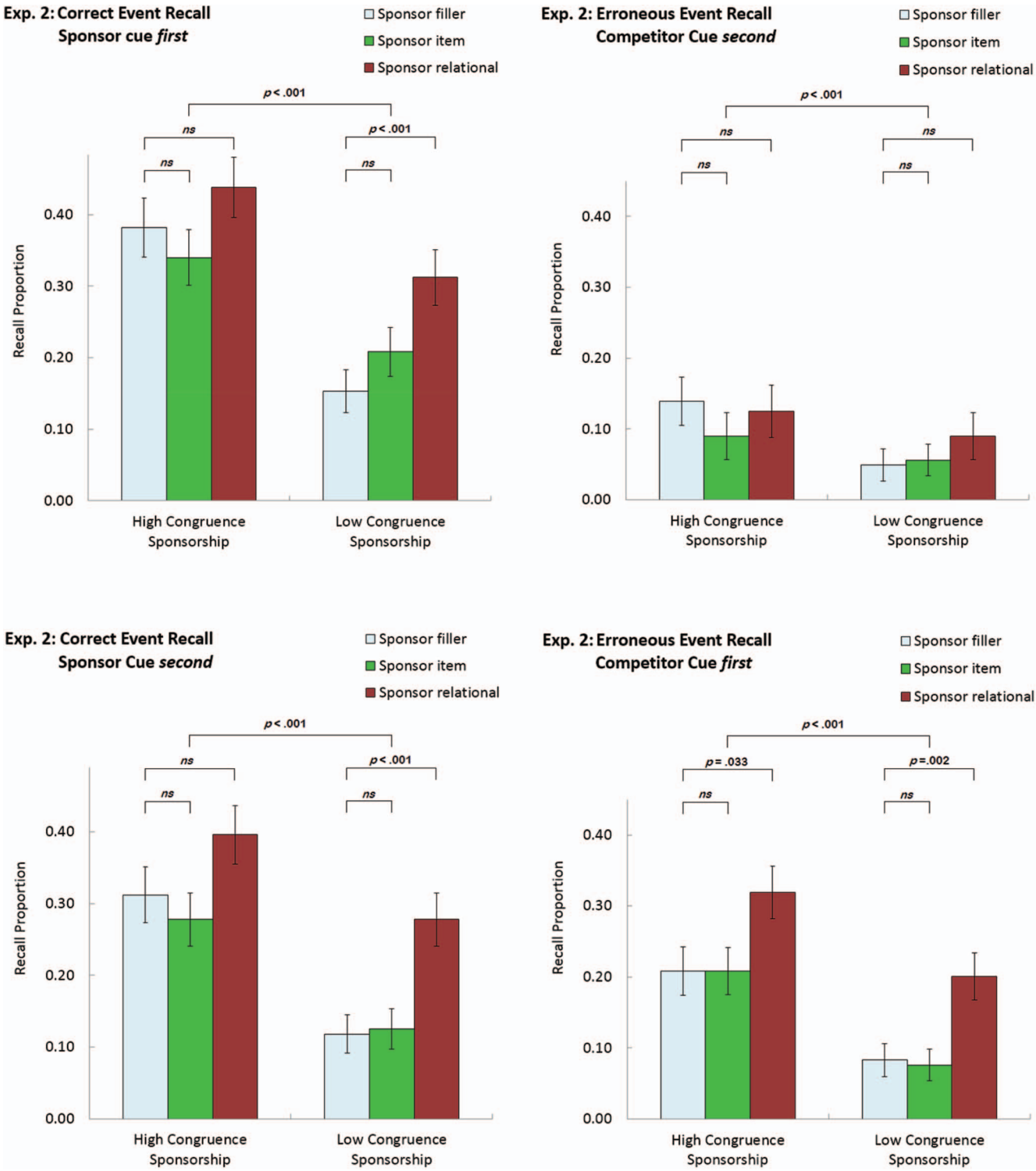

Figure 2. Experiment 2: Correct event recall and erroneous event recall proportions, collapsed across competitor information types (error bars represent standard errors). Top panel indicates responses when sponsor cues were encountered first; bottom panel indicates responses when competitor cues were encountered first. See the online article for the color version of this figure.

.016, $\eta_p^2 = .029$. The pattern of erroneous recall described previously across sponsor filler, item, and relational communications held when competitor cues were encountered first before sponsor cues, $F(1, 141) = 8.650$, $p < .001$, $\eta_p^2 = .058$ (*M*s = .146, .142, and .260, respectively), but not when encountered after sponsor cues, $F(1, 141) = 1.331$, $p = .266$, $\eta_p^2 = .009$ (*M*s = .094, .073, and .108, respectively). That is, evidence of sponsor-specific item communications limiting erroneous recall, and sponsor–event relational communications increasing erroneous recall, for both high and low congruence sponsorships, was only revealed when participants were tested for recall to competitor cues first. This finding suggests that sponsors should not only use brand-cued event recall to test for competitor misattribution but also test competitor cues first. Figure 2 depicts patterns when competitor cues were presented first before sponsor cues (bottom panel, right) versus after (top panel, right).

We further examined the robustness of this phenomenon by analyzing erroneous event recall in each of the three competitor information conditions separately when competitor cues were encountered first. Results are presented graphically in Figure 3. For the no-competitor condition, there was no overall main effect of sponsor information type, $F(2, 94) = 1.892$, $p = .157$, $\eta_p^2 = .039$, with erroneous recall being similar across sponsor filler, item, and relational information conditions (*M*s = .094, .031, and .115, respectively). The low levels of recall here likely stem from competitors being absent from the news stories, and hence show the prerequisite role competitor presence plays in supporting misattribution. When the competitor item information condition was considered separately, there was a significant main effect of sponsor information type, $F(2, 94) = 5.953$, $p = .004$, $\eta_p^2 = .112$. In line with item and relational information predictions, erroneous recall was similar across sponsor filler and item information conditions, $F < 1$, and increased significantly between sponsor filler and relational information conditions, $F(1, 47) = 9.134$, $p = .004$, $\eta_p^2 = .163$ (*M*s = .156, .177, and .333, respectively). Similarly, when only the competitor relational information condition was examined, there was a marginal effect of sponsor information type, $F(2, 94) = 2.771$, $p = .068$, $\eta_p^2 = .056$. Again, this came from there being no difference in erroneous recall when either sponsor filler or item information were communicated, $F < 1$, and a significant increase between when sponsor filler and relational information were communicated, $F(1, 47) = 4.370$, $p = .042$, $\eta_p^2 = .085$ (*M*s = .188, .219, and .333, respectively). Thus, supporting our predictions, our analysis shows that when competitors are present in the sponsorship context, communicating sponsor–event relational information consistently increases erroneous recall, and this occurs regardless of sponsorship congruence. Communicating sponsor-specific item information consistently guards against erroneous recall. Brand-cued event recall is necessary to reveal this pattern, particularly when recall to competitor cues is tested first.

General Discussion

Our two experiments together demonstrate the value of using an item and relational information framework to understand memory for brand–event sponsorship pairs. Consumer memory for sponsorship information is dependent not only on the natural congruence of the brand–event relationship (akin to *semantic relatedness*) but also on how additional marketing communications differentially leverage these relationships (akin to *orientation toward encoding*). Complementing the natural congruence of the brand–event sponsorship with communications that emphasize the alternative type of information serves to reinforce the pair relationship while also ensuring distinctiveness of the brand (R. R. Hunt, 2013). Counter to blanket recommendations in the sponsorship literature about communicating relational linkages, our studies show that doing so can inadvertently increase misattribution of sponsorships to same-industry market competitors—a problem of concern for those involved in sponsorship (Global Web Index,

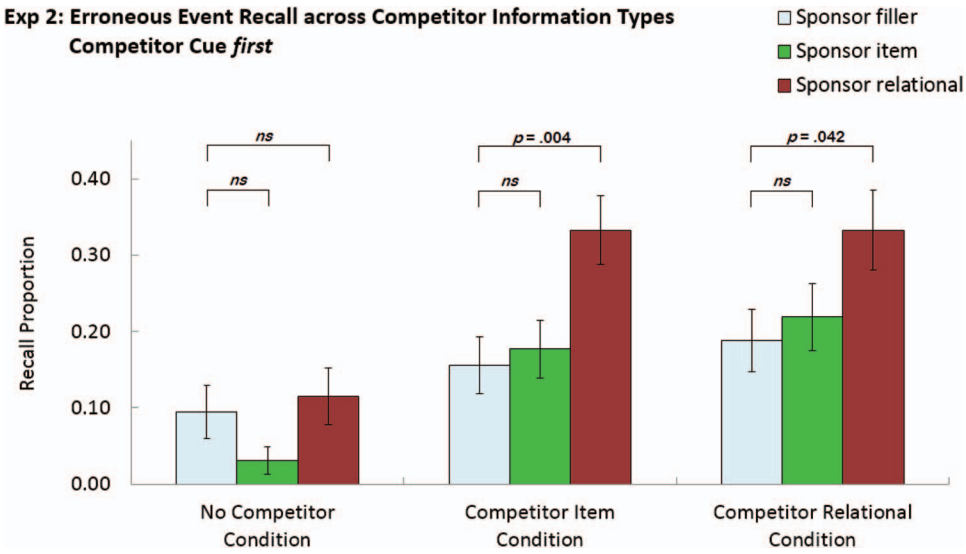

Figure 3. Experiment 2: Erroneous event recall proportions across each of the competitor information types when competitor cues were encountered first (error bars represent standard errors). See the online article for the color version of this figure.

Table 5
Summary of Findings and Implications for Sponsors

Type of sponsorship	Type of information communicated	
	Brand-specific item information	Brand-event relational information
High congruence	• Facilitates correct retrieval (revealed with brand recall) • Limits erroneous retrieval (revealed with event recall)	• Marginally facilitates correct retrieval (revealed with brand recall, event recall) • Increases erroneous retrieval (revealed with event recall)
Low congruence	• Does not facilitate correct retrieval above control (revealed with brand recall) • Limits erroneous retrieval (revealed with event recall)	• Facilitates correct retrieval (revealed with brand recall, event recall) • Increases erroneous retrieval (revealed with event recall)

2014). Communicating sponsor-specific item information in contrast does not lead to increased erroneous misattribution and may instead guard against it.

For ease of reference, consequences of communicating item and relational information across both high and low congruence pairings are summarized in Table 5. As noted, relational information can support correct retrieval, especially for low congruence sponsorships, but comes with the risk of increasing erroneous retrieval as well. Item information, in contrast, can be helpful in supporting correct retrieval for high congruence sponsorships (but not low congruence sponsorships), and does not increase erroneous retrieval. In deciding the most appropriate type of communication to employ, sponsors must therefore consider the aim of improving awareness of their own sponsor–event relationship (correct retrieval) while balancing concerns about competitors being misattributed with the relationship (incorrect retrieval). For high congruence sponsors, the most appropriate option would seem to be to communicate item information because this increases correct retrieval while limiting erroneous misattribution. For low congruence sponsors, the choice is more difficult. Communicating relational information may support correct retrieval, but it fosters misattribution, whereas communicating item information limits misattribution, but is not helpful for correct retrieval. For low congruence sponsors what may ultimately prove necessary could be to communicate some form of *brand specific relational information* to establish a relational linkage while maintaining distinctiveness. In the current research, we considered only the provision of either item or relational information, not a combination, so this extension remains open to future research.

We also showed that the ability to observe item and relational information effects with brand–event sponsorship pairs is very much dependent on cueing direction. Use of the wrong cueing direction can lead to underestimates of the value of providing brand-specific item communications and underestimates of the extent to which competitors have become associated with the event. Because sponsors do not typically use both cueing directions to separately evaluate correct and incorrect retrieval (Tripodi et al., 2003), the extent to which competitors have become associated with an event may often be overlooked. Initial exposure to sponsorship communications can establish relationships in memory, but unless these are appropriately measured, the impact of those communications will not be revealed (Cornwell & Humphreys, 2013). For sponsors hoping to assess the value of their brand-specific or brand–event relational communications (correct retrieval), the most diagnostic approach would be to cue with the event and seek brand recall. In evaluating the extent to which communications might be fostering misattribution to competitors (incorrect retrieval), brand-cued event recall will be most informative, particularly when consumers are cued first with the competitor.

In both experiments, erroneous recall was low when competitors were absent from the sponsorship context and increased when they were present. Thus, intuitively, it appears that competitor misattribution increases with competitor salience. The overall level of erroneous recall was similar, however, regardless of whether competitors were present in the form of competitor-specific item information or competitor–event relational information. Notably, in both experiments, the level of correct recall for sponsor–event relationships remained relatively similar across all three competitor information conditions, including when competitors were both absent and present. This result would suggest that competitor presence does not necessarily impair correct recall to a great extent, even though it can increase erroneous recall. This is similar to a finding by Humphreys et al. (2010) in which the presence of competitors was found not to be destructive of memory for true sponsors. It adds to a body of work in the memory literature that finds the addition of competitor stimuli to be nondestructive to memory for focal stimuli (although research also indicates exceptions to this can occur; Humphreys, Tehan, O'Shea, & Bolland, 2000; Tehan & Humphreys, 1996). On the surface, this would seem to be good news for sponsors, in that awareness outcomes might not be diminished by competitor presence; however, it does mean that sponsorship investments might benefit market rivals.

Implications for Sponsorship Research and Practice

In application to sponsorship and sponsorship research, what the current work suggests is that the type of communications that sponsors employ matters, as does the way awareness effects are measured. Competitor misattribution has been reported in the both the academic (Johar & Pham, 1999) and practitioner (Global Web Index, 2014) sponsorship literatures for some time but has mostly been attributed to naturally occurring characteristics of the sponsorship like level of congruence (Johar & Pham, 1999) or to ambushing activities undertaken by competitor brands (Mazodier et al., 2012; Weeks et al., 2017). The current research shows that this misattribution can also inadvertently be facilitated by sponsors themselves, when they communicate relational linkages. We provide evidence that sponsors should strategically tailor their communications to complement the natural congruence of the brand–event sponsorship. Brands engaged in low congruence sponsorships will find value in communicating relational linkages (although similar compet-

itor brands may also benefit), whereas those in high congruence sponsorships will see most value in communicating distinctive brand-specific information.

For sponsors whose primary concern is how well these communications enhance correct memory for the sponsor–brand relationship, event-cued brand recall will offer a useful indication. For those that hope to limit benefits afforded to competitors, however, incorrect retrieval must be assessed separately and this should be tested by seeking recall to competitor brands prior to sponsor brands (or perhaps even just recall to competitor brands alone). For sponsorship researchers, this work highlights how competitor misattribution should be appropriately gauged, and hence may support additional research investigating the effects of competitor brands in the sponsorship setting, including the effects of ambushers.

Implications for Item and Relational Information

Our work also extends basic understanding in memory regarding item and relational information. We have highlighted that when Einstein and Hunt's (1980; R. R. Hunt & Einstein, 1981) ideas are considered at the pair level, processing at both the intrapair and extrapair levels contributes to memory performance—an issue not often discussed in that literature. For example, when people encounter several instances of paired stimuli, in which each pair has its own relational context (e.g., is a unique sponsorship), distinctive item information becomes important, not just for identifying an item within the pair but also rejecting similar items from other pairs and from sources external to the pairs (see also Marschark & Hunt, 1989).

Our analysis of the memory task further adds emphasis to the relativistic nature of item and relational information, and how the use of this information can depend on the memory task at hand. Within a single high congruence brand–event pair for example, it could be argued that *is a brand* represents distinctive item information that would help to distinguish the brand within the sponsorship pair context. When presented within a series of brand–event pairs however, this same *is a brand* item information would instead work as relational information, applicable to all brands across the brand–event pairs (and also brands external to the series). Because of this, it would now be unhelpful in facilitating accurate identification within the pair, as there are multiple items to which *is a brand* could apply. This speaks to the issue discussed previously in relation to the work of R. R. Hunt (2003, 2013) regarding the need for item information that allows distinctiveness within the relevant context of similarity. What is needed in the situation of multiple brand–event pairs is brand-specific information that allows distinctiveness within the pair and also across pairs (but at the same time, information that links the two members of the pair together if they do not share a natural relationship).

Although not described as such by R. R. Hunt (2003, 2013), this situation highlights that in some instances, item information could actually be conceptualized as a secondary type of relational information. Although it may be unique within a specific context, in most cases, item information can itself form part of some broader relational category (R. R. Hunt, Ausley, & Schultz, 1986). Thus, instead of suggesting that accurate memory performance occurs when distinctive item information is retrieved, it may be that accurate memory occurs when this secondary form of relational information sufficiently restricts the domain of possible alternatives within the initial relational set, so as to isolate the specific target item (consider a Venn diagram analogy, in which one circle isolates a given area within a second circle). This issue of item information also serving as a secondary form of relational information has been alluded to in previous work, in which it has been noted that with elaborate stimuli, some tasks intended to orient item processing may engender some relational processing (see R. R. Hunt et al., 1986, with pleasantness ratings, and McDaniel & Waddill, 1990, with a missing-letters task). It has not, however, been explicitly addressed in the manner discussed here and warrants further investigation.

By examining item and relational information with pair stimuli, we also showed the importance of taking cueing direction into account. If item information makes one member of a pair more available in memory, this should be measured by testing for recall of that item, not its linked associate (Horowitz et al., 1966; R. G. Hunt, 1959; Kanak & Neuner, 1970). This issue has not been as relevant, or evident, in past item and relational work using recognition and category cued recall, because stimuli have typically not been pairs and because orienting tasks have typically encouraged processing of target items, with a nonstudied category cue supplied at test (Einstein & Hunt, 1980; R. R. Hunt, 2003, 2013). In our work with pairs, the wrong cueing direction would give underestimates of the impact of item information on correct recall.

Furthermore, cueing direction ideas combined with understanding of response competition highlights that the ability to observe erroneous recall with pair stimuli is restricted to settings in which response competition is minimized (e.g., in which brand-cued event recall is used to separately assess strength of competitor-to-event and sponsor-to-event linkages, and in which competitor cues are presented prior to sponsor cues). The extent to which relational information has increased the likelihood of participants incorrectly retrieving nontarget information may be obscured if only the single strongest trace in memory is offered as a response, as we found in Experiment 1 using event-cued brand recall. This issue has been less apparent when groups of items have been studied and requested at test, as with much past item and relational information work (e.g., Einstein & Hunt, 1980; R. R. Hunt & Einstein, 1981). This is because in these tasks participants list multiple responses rather than just the strongest linked item, meaning that even more weakly linked responses may still be offered. By using pairs, our work makes this cueing direction and response competition issue more apparent.

Limitations and Future Directions

Examining item and relational information ideas within the context of brand–event sponsorships was useful in the current research because of the high and low congruence nature of these relationships, and because an item and relational information framework offers a useful way to understand the commonly reported problem of sponsorship misattribution. We drew on the task analysis recommendations of Humphreys and Chalmers (2016) to decompose the cued recall task in this setting, which allowed for greater insight into these basic memory ideas. Future research that directly compares item and relational effects across other measures of memory, in which differing task demands are explicitly examined, will be necessary to demonstrate other possible nuances beyond just those linked to cues. It may also be useful to examine

how enduring these effects are and how they change with repeated exposures, which will help to inform both basic and applied research. Additionally, our research employed news story stimuli that participants heard via a headset to help instantiate incidental sponsorship exposure. Future research that tests these effects using other types of naturalistic stimuli (e.g., visual depictions) will be useful in demonstrating generality, especially in marketing settings like sponsorship, in which exposure can often be visual.

In terms of practical application for marketers, we have investigated item and relational effects whereby the sponsor communicates brand-specific item information as a way of making itself distinctive as sponsor. We recommended testing with event-cued brand recall in these cases, as the brand should be the recall target (Horowitz et al., 1966; R. G. Hunt, 1959). As noted previously, however, item and relational information should be considered relative to the task at hand. In marketing environments today, individual brands often sponsor multiple events, and hence may communicate with an aim to make the sponsored event more distinctive rather than the brand more distinctive. Here, communicating event-specific item information makes more sense, and brand-cued event recall would be the better way to examine correct retrieval. This underscores that a one-size-fits-all approach to thinking about assessing item and relational communications, and indeed to assessing awareness effects in sponsorship, should be avoided. Future research examining other instantiations of both item and relational information may be useful in revealing further possible differences.

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(*Appendices follow*)

Appendix A

High Congruence Example of News Stories Showing Sentence Variations Across Conditions: Fresh-Track Offroad Rally—Bridgestone

Sentence	No competitor condition	Competitor item condition	Competitor relational condition
Sentence 1	Having already made a substantial investment, Bridgestone, one of the world's largest producers of tires, was today announced as successful against market competitor brands in its sponsorship bid for the renowned Fresh-Track Offroad Rally.	Having already made a substantial investment, Bridgestone, one of the world's largest producers of tires, was today announced as successful against market competitor Goodyear in its sponsorship bid for the renowned Fresh-Track Offroad Rally.	Having already made a substantial investment, Bridgestone, one of the world's largest producers of tires, was today announced as successful against market competitor Goodyear in its sponsorship bid for the renowned Fresh-Track Offroad Rally.
Sentence 2 + 3	A spokesperson said that Bridgestone was very happy to win the rights to the event. Traditionally taking place over two days, organizers of this season's Rally plan to have cars compete over a three day period, in some best terrain on offer.	A spokesperson said that Bridgestone was very happy to win the rights to the event. Traditionally taking place over two days, organizers of this season's Rally plan to have cars compete over a three day period, in some best terrain on offer.	A spokesperson said that Bridgestone was very happy to win the rights to the event. Traditionally taking place over two days, organizers of this season's Rally plan to have cars compete over a three day period, in some best terrain on offer.
Sentences 4 + 5 (competitor manipulation sentences)	An official said that the Fresh-Track Offroad Rally is an event that always generates a lot of interest and excitement in the community. He said that the willingness to get involved, shown by so many people, demonstrates just how popular the event has become over the past few seasons, and why it has become so popular among brands.	A Goodyear representative said that the Fresh-Track Offroad Rally is an event that always generates a lot of interest and excitement in the community. He noted Goodyear's successful accomplishments included being credited with inventing artificial rubber turf for playgrounds, and supporting many community events.	A Goodyear representative said that the Fresh-Track Offroad Rally always generates a lot of interest and excitement in the community. He said Goodyear is still considering having skywriters write its brand name in the sky over the event on each day the cars race, just to remind people that it remains the best tire brand for outdoor driving endurance.
Sentence 6 (sponsor manipulation sentences—one of either sponsor filler, item, or relational information)	[sponsor filler information] In a sponsorship press announcement, Bridgestone said that this year's Rally will definitely be worth watching, no matter where it ends up being held, but that the location is yet to be finalized.	[sponsor filler information] In a sponsorship press announcement, Bridgestone said that this year's Rally will definitely be worth watching, no matter where it ends up being held, but that the location is yet to be finalized.	[sponsor filler information] In a sponsorship press announcement, Bridgestone said that this year's Rally will definitely be worth watching, no matter where it ends up being held, but that the location is yet to be finalized.
	OR [sponsor item information] In a sponsorship press announcement, Bridgestone which recently received national acclaim for efforts to reduce pollution levels in the rubber industry, said the Rally location is yet to be finalized.	OR [sponsor item information] In a sponsorship press announcement, Bridgestone which recently received national acclaim for efforts to reduce pollution levels in the rubber industry, said the Rally location is yet to be finalized.	OR [sponsor item information] In a sponsorship press announcement, Bridgestone which recently received national acclaim for efforts to reduce pollution levels in the rubber industry, said the Rally location is yet to be finalized.
	OR [sponsor relational information] In a sponsorship press announcement, Bridgestone said that its support for the Rally fits well with its marketing efforts, since the event will demonstrate the reliability, and durability of its tires.	OR [sponsor relational information] In a sponsorship press announcement, Bridgestone said that its support for the Rally fits well with its marketing efforts, since the event will demonstrate the reliability, and durability of its tires.	OR [sponsor relational information] In a sponsorship press announcement, Bridgestone said that its support for the Rally fits well with its marketing efforts, since the event will demonstrate the reliability, and durability of its tires.

(*Appendices continue*)

Appendix B

Low Congruence Example of News Stories Showing Sentence Variations Across Conditions: Fresh-Track Offroad Rally—Gillette

Sentence	No competitor condition	Competitor item condition	Competitor relational condition
Sentence 1	Having already made a substantial investment, Gillette, one of the world's most widely used shaving brands, was today announced as successful against market competitor brands in its sponsorship bid for the renowned Fresh-Track Offroad Rally.	Having already made a substantial investment, Gillette, one of the world's most widely used shaving brands, was today announced as successful against market competitor Schick in its sponsorship bid for the renowned Fresh-Track Offroad Rally.	Having already made a substantial investment, Gillette, one of the world's most widely used shaving brands, was today announced as successful against market competitor Schick in its sponsorship bid for the renowned Fresh-Track Offroad Rally.
Sentence 2 + 3	A spokesperson said that Gillette was very happy to win the rights to the event. Traditionally taking place over two days, organizers of this season's Rally plan to have cars compete over a three day period, in some best terrain on offer.	A spokesperson said that Gillette was very happy to win the rights to the event. Traditionally taking place over two days, organizers of this season's Rally plan to have cars compete over a three day period, in some best terrain on offer.	A spokesperson said that Gillette was very happy to win the rights to the event. Traditionally taking place over two days, organizers of this season's Rally plan to have cars compete over a three day period, in some best terrain on offer.
Sentences 4 + 5 (competitor manipulation sentences)	An official said that the Fresh-Track Offroad Rally is an event that always works to generate a lot of interest and excitement in the community. He said that the willingness to get involved, shown by so many, demonstrates just how popular the event has become over the past few seasons, and why it has become so popular among brands.	A Schick representative said that the Fresh-Track Offroad Rally is attractive because it generates a lot of interest and excitement in the community. He noted the name Schick comes from the Lieutenant Colonel who invented the first-ever dry-shave razor, and is today one of the most trusted shaving brand names, supporting many community events.	A Schick representative said that the Fresh-Track Offroad Rally is attractive because it generates a lot of interest and excitement in the community. He said Schick is still considering having skywriters write its brand name in the sky over the event on each day the cars race, just to remind people it remains the best brand for a race-style close-shave.
Sentence 6 (sponsor manipulation sentences--- one of either sponsor filler, item, or relational information)	[sponsor filler information] In a sponsorship press announcement, Gillette said that this year's Rally will definitely be worth watching, no matter where it ends up being held, but that the location is yet to be finalized. OR [sponsor item information] In a sponsorship press announcement, Gillette, a recognized leader in the shaving industry for reducing pollution in razor manufacturing facilities, said the Rally location is yet to be finalized. OR [sponsor relational information] In a sponsorship press announcement, Gillette said its support for the Rally fits well with its marketing efforts, since the predominantly male audience is who many of its shaving products are aimed toward.	[sponsor filler information] In a sponsorship press announcement, Gillette said that this year's Rally will definitely be worth watching, no matter where it ends up being held, but that the location is yet to be finalized. OR [sponsor item information] In a sponsorship press announcement, Gillette, a recognized leader in the shaving industry for reducing pollution in razor manufacturing facilities, said the Rally location is yet to be finalized. OR [sponsor relational information] In a sponsorship press announcement, Gillette said its support for the Rally fits well with its marketing efforts, since the predominantly male audience is who many of its shaving products are aimed toward.	[sponsor filler information] In a sponsorship press announcement, Gillette said that this year's Rally will definitely be worth watching, no matter where it ends up being held, but that the location is yet to be finalized. OR [sponsor item information] In a sponsorship press announcement, Gillette, a recognized leader in the shaving industry for reducing pollution in razor manufacturing facilities, said the Rally location is yet to be finalized. OR [sponsor relational information] In a sponsorship press announcement, Gillette said its support for the Rally fits well with its marketing efforts, since the predominantly male audience is who many of its shaving products are aimed toward.

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