

## 2 Promotion and prevention in consumer decision-making

The state of the art and theoretical propositions

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Our understanding of consumer decision-making has historically been dominated by information-processing theory and, more recently, by behavioral decision research. These two perspectives have undeniably offered important insights about the cognitive processes underlying consumers' decisions. However, there is more to consumer decision-making than computer-like mental processes, judgment heuristics, and preference construction. Clearly missing from these perspectives is the motivational dimension of consumer decision-making. Consumers' decisions – which brand to purchase, where to go on vacation, or how to decorate the house – do not take place in a motivational vacuum. These decisions take place in the context of goals that consumers are pursuing, needs that they seek to fulfill, and drives that color their thoughts.

The purpose of this chapter is to discuss how regulatory focus theory (Higgins 1997, 1998, 2002) – a theory of motivation and self-regulation that has been rapidly gaining prominence in consumer research (e.g., Aaker and Lee 2001; Briley and Wyer 2002; Pham and Avnet 2004; Zhou and Pham 2004) – can be drawn upon to explain a variety of consumer decision-making phenomena. We briefly review the major tenets of the theory, which proposes a fundamental distinction between two modes of self-regulation called promotion and prevention. Drawing on existing empirical evidence and new conceptual analyses, we then develop a series of theoretical propositions about the effects of promotion and prevention on consumer decision-making. These propositions are organized along the traditional stages of the decision-making process postulated by standard consumer behavior theory (i.e., problem recognition, information search, consideration set formation, etc.). Some of these propositions have already received empirical support, but most await formal empirical testing in consumer research. This propositional inventory can thus be viewed as a research agenda for studying the role of regulatory focus in consumer decision-making. We hope that this agenda will help revive consumer and marketing scholars' interest in the motivational analysis of consumer decision-making.

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## An overview of regulatory focus theory

Because regulatory focus theory has been covered extensively elsewhere (e.g., Higgins 1997, 1998), we will discuss here only three aspects of the theory: (1) its major tenets and how it relates to other perspectives on approach and avoidance motivation; (2) examples of empirical findings that support the theory's basic tenets; and (3) the major antecedents of regulatory focus.

### *Regulatory anticipation, reference, and focus in approach-avoidance*

Motivation is generally conceived of as being driven by the approach of pleasure and by the avoidance of pain – a basic idea known as the hedonic principle. The approach of pleasure and the avoidance of pain has been studied from three different perspectives, each associated with its own principle: (1) the principle of regulatory anticipation, (2) the principle of regulatory reference, and (3) the principle of regulatory focus. According to the principle of regulatory anticipation, motivation arises from people's *expectations* or *anticipations* about the *consequences* or *outcomes* of their actions. These anticipated consequences can be either positive ("pleasure") or negative ("pain"). It is in terms of these anticipated consequences that approach and avoidance is conceptualized in regulatory anticipation. People are believed to approach anticipated pleasures and avoid anticipated pains. When Freud (1920/1950) described motivation as "hedonism of the future," he was referring to the principle of regulatory anticipation. Notions such as "reward" and "punishment" (e.g., Lewin 1935) are characteristic of regulatory anticipation. Mowrer (1960), for instance, viewed regulatory anticipation as the fundamental principle underlying motivated learning. He saw the motivation to learn as driven primarily by "hope" and "fear." de Mello and MacInnis's discussion (this volume) of the notion of hope is written from a regulatory anticipation perspective. The standard economic theory of choice, which models choice as a function of expected utility, is also formulated from the perspective of regulatory anticipation.

Whereas regulatory anticipation focuses on the person's expectations of pleasant versus painful consequences, the principle of regulatory reference focuses on the *point of reference* that the person uses in self-regulation. Holding outcome expectations constant, self-regulation can operate either in reference to a desired end-state or in reference to an undesired end-state. For example, two students could be equally hopeful when taking an exam, but one may be hopeful that she will be successful in obtaining an "A," whereas the other may be hopeful that she will be successful in avoiding a "C." Similarly, two consumers could be equally apprehensive while choosing a gift, but one may be fearful that she might not be able to get "the perfect gift" (a failure to attain a desired end-state), whereas the other may be fearful that she might end-up selecting "a totally inappropriate gift" (a failure to avoid an undesired end-state). In regulatory reference, approach and avoidance is therefore conceptualized in terms of *movement* toward desired end-states (approach) or away from undesired end-states (avoidance). Like the

principle of regulatory anticipation, the principle of regulatory reference has a long history in psychology. Most animal-learning and biological models of motivation make a fundamental distinction between approaching desired end-states and avoiding undesired end-states (e.g., Hull 1952; Lang 1995). This distinction also appears in cybernetic and control process models of self-regulation in the form of positive and negative reference values (e.g., Carver and Scheier 1981; Miller *et al.* 1960). However, even if many models make a distinction between self-regulation toward desired end-states, and self-regulation away from undesired end-states, the major focus in the psychological literature has been on self-regulation toward desired end-states (see, e.g., Carver and Scheier 1981; Kardes and Cronley 2000; Miller *et al.* 1960).

In regulatory focus theory (Higgins 1997, 1998), approach and avoidance is not conceptualized in terms of anticipated outcomes (i.e., anticipated pleasure or pain) or in terms of reference end-states (desired or undesired). Instead, it is conceptualized in terms of *strategic means for self-regulation*. Self-regulation toward desired end-states – that is, *holding regulatory reference constant* – can be pursued either with means that are approach-oriented or with means that are avoidance-oriented. For example, a person whose desired end-state or goal is to become a college-level tennis player may select strategies that are approach-oriented such as practicing drills two-hours per day and enrolling in a tennis academy, or strategies that are avoidance-oriented such as refraining from smoking and keeping away from junk-food. Self-regulation dominated by strategic means that are approach-oriented is called *promotion-focused*, and self-regulation dominated by strategic means that are avoidance-oriented is called *prevention-focused*. According to regulatory focus theory, promotion-focused self-regulation is more likely in the pursuit of goals that are related to advancement and accomplishment. Prevention-focused self-regulation is more likely in the pursuit of goals that are related to *security and protection*. *Promotion-focused self-regulation is characterized by greater eagerness*. In signal-detection terms, promotion-oriented individuals are primarily concerned with insuring “hits” and minimizing “errors of omission” (i.e., missed opportunities or lack of accomplishment). In contrast, prevention-focused self-regulation is characterized by greater *vigilance*. In signal-detection terms, prevention-oriented individuals are primarily concerned with insuring “correct rejections” and minimizing “errors of commission” (i.e., making “mistakes”; see Crowe and Higgins 1997).

Consider, for instance, two students with the same goal of receiving an “A” in a course (i.e., the same reference end-state). Assume further that they have similar expectations with respect to success versus failure (comparable anticipations of pleasant versus painful outcomes). They may still differ in whether they represent the goal as a matter of accomplishment or as a matter of security. The former would trigger promotion; the latter would trigger prevention. The difference between promotion and prevention would not reside in the students’ desired end-state or in their expectations, but in their strategic preferences for *how* to attain the desired end-state. The promotion-focused student would be inclined to use eager approach strategies for attaining the desired goal (e.g., reading non-required

materials to gain extra credit), whereas the prevention-focused student would be inclined to use vigilant avoidance strategies for attaining the desired goal (e.g., being careful to finish all requirements on time).

It should be noted that promotion and prevention differ not only in how desired end-states are approached, but also in how undesired end-states are avoided (see Higgins *et al.* 1994). When avoiding undesired end-states, individuals with a promotion focus would use eager means to move away from the undesired end-state, which involves *approaching mismatches* to the undesired end-state. In contrast, individuals with a prevention focus would use vigilant means to avoid the undesired end-state, which involves *avoiding matches* to the undesired end-state. Consider a person whose goal is to avoid conflict with a roommate (an undesired end-state). If the person is promotion-oriented, he or she might attempt to avoid conflict by organizing a meeting with the roommate to work out a schedule for cleaning the shared apartment (approaching a mismatch to conflict as the undesired end-state). If the person is prevention-oriented, he or she may instead leave the apartment whenever the roommate starts to argue (avoiding a match to conflict as the undesired end-state).

### **Support for regulatory focus theory**

The major tenets of regulatory focus theory are supported by a considerable amount of empirical evidence (for reviews, see Higgins 1997, 1998). As examples, we describe two particular studies. The first study is a study by Förster *et al.* (1998), which provides a clear demonstration of the difference between promotion and prevention in approaching the same desired end-state. The study focused on the classic "goal looms larger" effect, which refers to the fact that the intensity of motivation typically increases as people move closer to completing their goals (see Lewin 1935). Several months prior to the actual study, participants' chronic regulatory focus was assessed through the accessibility of their ideals (a measure of promotion orientation) and the accessibility of their "oughts" (a measure of prevention orientation). In the actual study, all participants were given the same desirable goal to be approached – to identify as many solutions as possible to a series of anagrams. As participants were solving the anagrams, their strategic eagerness versus vigilance was assessed by recording their arm-pressure during arm-flexion (a behavioral signal of eager approach) and during arm-extension (a behavioral signal of vigilant avoidance). Among promotion focus participants, arm-flexion pressure increased as they moved closer to the last anagram, signaling increased eagerness as participants approached goal completion. Among prevention focus participants, it was arm-extension pressure that increased, signaling increased vigilance as participants approached goal completion. Thus, both promotion and prevention participants became more motivated as they approached the desired end-state, but they differed in the strategic orientation of their motivation (eagerness versus vigilance).

In another study, Crowe and Higgins (1997) used a recognition memory paradigm to show that promotion is characterized by greater eagerness and prevention

is characterized by greater vigilance. Participants were first shown a list of target items. After a delay, they were given test items that included both "old" (target) items from the original list and "new" (distractor) items not from the original list. Participants were to respond "yes" if they believed that the test item was an old target item and "no" if they believed that the test item was a new distractor item. There were four possible outcomes:

- (a) "Hit" (saying "yes" to a target item);
- (b) "Miss" (saying "no" to a target item);
- (c) "False Alarm" (saying "yes" to a distractor item); and
- (d) "Correct Rejection" (saying "no" to a distractor item).

Because eagerness entails an inclination toward hits and against misses, it was predicted that promotion would produce a propensity to say "yes," resulting in a risky bias. In contrast, because vigilance entails an inclination toward correct rejections and against false alarms, it was predicted that prevention would produce a propensity to say "no," resulting in a conservative bias. These predictions were supported (see also Friedman and Förster 2001).

Although space limitations prevent us from reviewing additional studies, numerous other studies indicate that regulatory focus differences in strategic emphasis influence other basic decision processes (for a review, see Higgins and Spiegel, in press), including categorization (e.g., Molden and Higgins 2004), expectancy-valuation (e.g., Shah and Higgins 1997), affective responses to decision-making (e.g., Higgins *et al.* 1997; Idson *et al.* 2004), and willingness to consider new options and multiple options (e.g., Liberman *et al.* 1999, 2001).

### **Sources of regulatory focus**

Promotion and prevention focus are *motivational states*; they are states of an individual during goal pursuit. A major source of these states lies in the individual's socialization. According to *self-discrepancy theory* (Higgins 1987), certain modes of caretaker-child interactions foster children's acquisition of either goals representing their own or significant others' hopes, wishes, and aspirations for them – goals called *ideals* – or goals representing their own or significant others' beliefs about their duties, obligations, and responsibilities – goals called *oughts*. Promotion arises from caretaker-child interactions in which pleasure is experienced as a "presence of positive" and pain is experienced as an "absence of positive." An example of "presence of positive" pleasure would be when the caretaker hugs and kisses or praises the child for his or her accomplishments. An example of "absence of positive" pain would be when the caretaker acts disappointed when the child fails to fulfill the caretaker's hopes. By emphasizing advancement, aspirations, and accomplishments, this kind of socialization creates a promotion focus that will subsequently be reflected in a chronic accessibility of the person's ideals (Higgins and Silberman 1998). In contrast, prevention arises from caretaker-child interactions where pleasure is experienced as an "absence of negative" and pain is

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experienced as a “presence of negative.” An example of “absence of negative” pleasure would be when the caretaker reassures the child by removing something the child find threatening. An example of “presence of negative” pain would be when the caretaker scolds or punishes the child when the child misbehaves or acts irresponsibly. By emphasizing protection, safety, and responsibility, this kind of socialization creates a prevention focus that will subsequently be reflected in a chronic accessibility of the person’s oughts (*ibid.*).

Note that people’s chronic promotion and prevention orientations are theoretically independent. Hence, individuals can be high in promotion focus only, high in prevention focus only, high in both, or low in both. It has also been found that individuals from individualist cultures (e.g., North Americans, Western Europeans) tend to be chronically more promotion-focused, whereas individuals from collectivist cultures (e.g., Middle Easterners, East Asians) tend to be chronically more prevention-focused (see Lee *et al.* 2000; Pham and Avnet 2004, Study 4).

States of promotion and prevention focus can also be determined by situational factors. For example, task instructions framed in terms of “gains” versus “non-gains” tend to activate a promotion focus, whereas task instructions framed in terms of “losses” versus “non-losses” tend to activate a prevention focus (e.g., Shah and Higgins 1997; see also Lee and Aaker 2004; Zhou and Pham 2004). In addition, activation or priming of individuals’ ideals or oughts can temporarily increase their accessibility, thereby creating momentary states of promotion or prevention focus, respectively (e.g., Higgins *et al.* 1994; Liberman *et al.* 2001; Pham and Avnet 2004). We now turn to how differences in regulatory focus may affect consumer decision-making.

### Promotion, prevention, and consumer decision-making

Standard consumer theory depicts consumer decision-making as a series of stages progressing through

- (1) problem recognition,
- (2) information search,
- (3) formation of a consideration set,
- (4) evaluation of alternatives,
- (5) choice/purchase, and
- (6) post-choice/post-purchase processes (e.g., Hoyer and MacInnis 2003).

This stylized stage-model, illustrated in Figure 2.1, provides a convenient way of organizing our theoretical propositions.

#### *Problem recognition (or need arousal)*

Consumer decision-making is assumed to be triggered by the recognition of a problem or the arousal of a need. Problem recognition is typically conceptualized

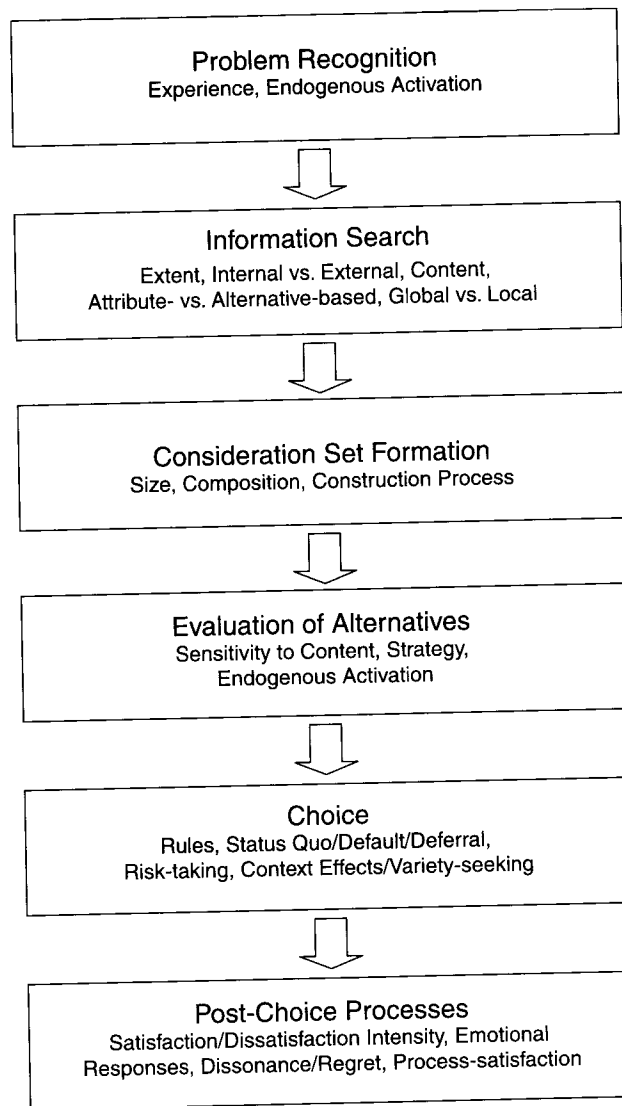


Figure 2.1 A stylized model of consumer decision-making.

as the detection by the consumer of a discrepancy between an actual state (e.g., the fridge is empty) and a desired state (e.g., the children should eat dinner by 7 p.m.). This discrepancy may arise in two distinct manners (Brunner and Pomazal 1988). First, a desired state may move away from a current state that is stationary. For instance, a consumer who, until now, has been satisfied with owning a single car (the current state) may now experience a new need or want for a second car (a change in desired state). Changes in desired states may occur

as a result of new pressures (e.g., advertising other consumer products) or changes in the discrepancy between actual and desired states (e.g., a healthy consumer's awareness of health and the need to exercise) with respect to problem recognition. Figure 2.2 (in each box marked with an asterisk)

*Experience of problem recognition*

We propose that different perceptual experiences in different experience promotion states are adding "hits." Transition to the desired state. In contrast, individuals reject mistakes. Transition to the actual state. For example, we bought a second car, which

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Proposition 1.3

Note: Propositions in this figure

Figure 2.2 Regular

as a result of new personal circumstances (e.g., a new job out of town), marketing pressures (e.g., advertising, price promotions), or social comparisons (e.g., witnessing other consumers enjoy having a second car). A second type of discrepancy between actual and desired states arises when a current state moves away from a desired state that is stationary. For instance, a temporary illness in a normally healthy consumer creates a discrepancy between the new current state of sickness and the unchanged desire to be healthy. Our theoretical propositions with respect to problem recognition in consumer decision-making are summarized in Figure 2.2 (in each table the predictions that remain to be tested empirically are marked with an asterisk).

#### *Experience of problem recognition*

We propose that pre-existing states of promotion versus prevention will induce different perceptions of discrepancy between actual and desired states and result in different experiences of problem recognition (Proposition 1.1). Individuals in a promotion state are concerned with advancement and pursue advancement by adding "hits." Thus, under promotion, consumers will pay relatively more attention to the desired state (perceived as advancement) compared to the actual state. In contrast, individuals in a prevention state seek to prevent problems and want to reject mistakes. Thus, under prevention, consumers will pay relatively more attention to the actual state (perceived as a problem) compared to the desired state. For example, we predict that a promotion-oriented consumer who needs a second car because of a new out-of-town job will tend to focus on the desirability of the second car, whereas a prevention-oriented consumer in the same situation will

<b>Proposition 1.1*</b>	Under promotion, consumers will pay relatively more attention to the desired state than to the actual state, and experience problem recognition as a need to be met. Under prevention, consumers will pay relatively more attention to the actual state than to the desired state, and experience problem recognition as a problem to be resolved.
<b>Proposition 1.2</b>	Discrepancies between actual states and desired ideals will trigger a promotion focus in decision-making, whereas discrepancies between actual states and desired oughts will trigger a prevention focus.
<b>Proposition 1.3*</b>	Holding the desired end-state constant, problem recognition that arises from a change in the desired state will trigger promotion, whereas problem recognition that arises from a change in the current state will trigger prevention.

Note: Propositions that are yet to be tested empirically are denoted with an asterisk, both in this figure and in Figures 2.3–2.7.

Figure 2.2 Regulatory focus and problem recognition.



tend to focus on the problem of *not* having a second car. In this example, both consumers would be motivated to move from their current state to the desired end-state; however, they would likely attend to different aspects of the situation. In general, promotion-oriented consumers will tend to experience the situation as a "need to be met," whereas prevention-oriented consumers will tend to experience the same situation as a "problem to be fixed."

#### *Activation of promotion versus prevention*

Not only can states of promotion and prevention influence the experience of problem recognition, they can also be differentially activated by different types of problem recognition. Different types of discrepancies between actual and desired states may result in different activations of promotion and prevention and, therefore, in different patterns of decision-making. As mentioned previously, there is a fundamental distinction between two types of desirable end-states (Higgins 1987): (a) ideals, which refer to consumers' aspirations, hopes, and wishes (e.g., wanting a beautiful house, dreaming of an exotic vacation); and (b) oughts, which refer to consumers' obligations, duties, and responsibilities (e.g., having to provide for a child's education, having to repay one's debts). According to regulatory focus theory (Higgins 1997, 1998), discrepancies between consumers' actual states and desired ideals will trigger states of promotion, whereas discrepancies between consumers' actual states and their desired oughts will trigger states of prevention (Proposition 1.2). Although this prediction has not been directly tested in a consumer decision-making context, it has received ample support in other contexts (e.g., Higgins *et al.* 1994; Pham and Avnet 2004). Higgins *et al.* (1994) have found, for instance, that respondents whose ideals were primed or chronically accessible tended to favor approach strategies in self-regulation (e.g., being emotionally supportive of friends), whereas respondents whose oughts were primed or chronically accessible tended to favor avoidance strategies instead (e.g., keeping secrets about friends).

We additionally hypothesize that, holding the type of desired state constant (e.g., the need for a new car), discrepancies that arise from a change in the desired state (e.g., a new job requires an additional car) will tend to activate states of promotion, whereas discrepancies that arise from a change in the actual state (e.g., the current car broke down) will tend to activate states of prevention (Proposition 1.3). In both cases, there should be a motivation to move from the current state toward the desired state (e.g., a desire for a new car). However, if the motivation arises from a change in the desired state (e.g., a new car for a new job), the movement should be experienced as advancement, activating a promotion focus. In contrast, if the desire arises from a change in the actual state (e.g., a new car to replace a broken-down car), the movement should be experienced as correcting a problem, activating a prevention focus. The implications of this distinction are currently being investigated. Propositions 2 and 3 highlight an important recent development of regulatory focus theory: In addition to exerting *exogenous* influences on consumer decision-making, regulatory focus can also be *endogenously*

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**Proposition 2.6\***

**Proposition 2.7\***

**Figure 2.3** Regula

determined by various aspects of this decision-making process (see Zhou and Pham 2004).

**Information search**

Once a problem has been recognized, a search for information is assumed to follow. Consumers' information search can be characterized along several dimensions (e.g., Bettman 1979; Hoyer and MacInnis 2003):

- (a) the extensiveness of the search;
- (b) the direction of the search, internal or external;
- (c) the type of information searched; and
- (d) the structure of the search, which can be alternative-based or attribute-based, and global or local.

Our propositions with respect to these four dimensions of information search are summarized in Figure 2.3.

<b>Proposition 2.1*</b>	Promotion- and prevention-oriented individuals should devote comparable amounts of effort to information search and will search for comparable amounts of information.
<b>Proposition 2.2</b>	The number of alternatives or options searched will be greater under promotion than under prevention.
<b>Proposition 2.3*</b>	Under promotion, information search will be relatively more internal, whereas under prevention, information search will be relatively more external.
<b>Proposition 2.4</b>	Under promotion, information search will tend to focus on positive signals about the available options, whereas under prevention, information search will tend to focus on negative signals.
<b>Proposition 2.5</b>	Promotion will foster a preferential search for attribute information related to advancement and accomplishments, whereas prevention will foster a preferential search for attribute information related to security and protection.
<b>Proposition 2.6*</b>	Under promotion, information search will concentrate on seeking information about additional alternatives while holding the number of attributes constant; under prevention, information search will concentrate on seeking information about additional attributes while holding the number of alternatives constant.
<b>Proposition 2.7*</b>	Under promotion, information will be searched in a more global and "top-down" manner; under prevention information will be searched in a more local and "bottom-level," serial manner.

Figure 2.3 Regulatory focus and information search.

*Extensiveness of search*

The effects of regulatory focus on the extensiveness of search should depend on how this extensiveness is operationalized. If the extensiveness of search is defined in terms of sheer amount of information searched or amount of effort devoted to searching, there should be no systematic difference between promotion and prevention. Amount of information searched and search effort depend primarily on the consumer's level of involvement (motivation intensity) with the decision and their level of knowledge about the product category involved (e.g., Beatty and Smith 1987; Brucks 1985). To the extent that regulatory focus is theoretically independent of motivation intensity and expertise, promotion- and prevention-oriented individuals should devote comparable amounts of effort to search and search for comparable amounts of information (Proposition 2.1). Although this proposition remains to be tested, indirect support for this prediction comes from the finding that, in persuasion settings, activation of promotion and prevention produces similar depths of processing (Avnet and Pham 2004; Pham and Avnet 2004).

However, if extensiveness of search is defined in terms of how many alternatives or options are considered, search should be more extensive under promotion than under prevention (Proposition 2.1). Individuals with a promotion focus should not want to overlook options or "miss hits." In contrast, individuals with a prevention focus should want to consider only as many options as are necessary for the task at hand, since adding unnecessary options increases the chance of making mistakes. Previous studies have shown that more alternatives are indeed generated and considered when people have a promotion focus than when they have a prevention focus (e.g., Crowe and Higgins 1997; Friedman and Förster 2001; Liberman *et al.* 2001).

*Internal versus external search*

Search for information can be internal and based on the consumer's knowledge and memory, or external and directed to the environment. Pham and Avnet (2004) recently hypothesized that promotion-focused consumers will engage in relatively more internal search than prevention-focused consumers, whereas prevention-focused consumers will engage in relatively more external search than promotion-focused consumers (Proposition 2.3). This hypothesis was based on the finding that promotion triggers a more eager form of exploration, whereas prevention triggers a more vigilant form of exploration (e.g., Crowe and Higgins 1997). Eagerness should theoretically encourage the reliance on heuristic modes of judgment (see Förster *et al.* 2003), which include the reliance on internal knowledge structures (Pham and Avnet 2004). In contrast, vigilance should encourage scrutiny of the environment and thus the reliance on external information (e.g., Bless *et al.* 1996; Förster *et al.* 2000).

*Content of information searched*

Because promotion is characterized by a strategy of approaching matches to the desired end-state, it should foster a preferential search for positive (rather than negative) signals about the available options. In contrast, because prevention is characterized by a strategy of avoiding mismatches to the desired end-state, it should foster a search for negative (rather than positive) signals about the options (Proposition 2.4). Consistent with this prediction, Pham and Avnet (2004) recently found that, in persuasion, promotion-focused consumers were more influenced by positive affective cues (an attractive ad execution) than by negative affective cues (an unattractive ad execution). In contrast, prevention-focused consumers were more influenced by negative substantive information (weak product claims) than by positive substantive information (strong product claims).

Promotion should also foster a preferential search for attribute information related to advancements and accomplishments, whereas prevention should foster a preferential search for attribute information related to security and protection (Proposition 2.5). The results of a study by Safer (1998; see Higgins 2002) are consistent with this prediction. Participants instructed to imagine that they wanted to purchase a computer were provided a list of 24 questions they could ask about the computer: 8 about innovative features (e.g., how creative or advanced it was), 8 about reliability features (e.g., its ability to prevent system crashes or other problems), and 8 about neutral features (e.g., total weight of the unit). Participants were asked to select those 10 questions whose answers would be most helpful in making their purchase decision. As predicted, participants with a stronger promotion focus were more likely to seek information concerning innovation than reliability, whereas the reverse was true for participants with a stronger prevention focus.

*Alternative- versus attribute-based search*

A major tenet of decision research is that information search may be structured either in terms of alternatives (e.g., different brands) or in terms of attributes of the alternatives (see Payne *et al.* 1993; Bettman *et al.* 1998). We propose that, under promotion, information search will concentrate on seeking information about additional alternatives while holding the number of attributes constant; under prevention, information search will concentrate on seeking information about additional attributes while holding the number of alternatives constant (Proposition 2.6). This prediction is based on the thesis that promotion is mostly geared toward identifying and capturing opportunities, whereas prevention is mostly geared toward avoiding mistakes (see Crowe and Higgins 1997). One's ability to identify opportunities obviously increases when more alternatives are considered. However, one's ability to avoid mistakes is more likely to increase when more information about each alternative is considered.

*Global versus local search*

Information can be searched in a global, "big picture" manner or in a more local, detail-oriented manner. A global search tends to proceed in a "top-down" fashion, whereas a local search tends to proceed in a "bottom-level," serial fashion. We propose that under promotion information search will be more global and proceed in a top-down manner, whereas under prevention information search will be more local and proceed in a bottom-level, serial manner (Proposition 2.7). For example, we predict that promotion-focused patrons in a restaurant would tend to examine the food menu by first scanning the menu's main categories (appetizers versus entrees), then searching for possible subcategories within each main category (e.g., meat versus fish within entrees), and then look for specific dishes within the selected subcategory (e.g., sole meuniere within fish). Prevention-focused patrons would instead tend to proceed by scanning the menu serially at the specific dish level (e.g., first dish under appetizers, second dish under appetizer, etc.). Although this proposition remains to be tested, indirect support for this prediction was recently obtained in a study by Förster and Higgins (2004). Participants were presented with composite stimuli consisting of large letters made up of small letters. They were asked to respond as quickly as possible to a target letter (e.g., H) that appeared either at the global level (e.g., a large H made of small Ts) or at the local level (e.g., a large T made of small Hs). Individuals with a promotion focus were found to respond more quickly at the global level than at the local level, whereas the reverse was true for individuals with a prevention focus.

**Consideration set formation**

Based on an initial gathering of information, consumers are assumed to narrow down the available set of options to a subset called the consideration set, that is, the set of alternatives that "the consumer considers seriously when making a purchase and/or consumption decision" (Hauser and Wernerfelt 1990: 393). Alternatives enter the consideration set based on two factors: (a) their goal-satisfying properties, and (b) their salience or accessibility at the time of the decision (Shocker *et al.* 1991). Consideration sets can be characterized by their size, by their composition, and by the process by which they are generated. Our propositions about the effects of regulatory focus on consideration set formation are summarized in Figure 2.4.

*Set size*

Consideration sets have been found to contain typically between three and seven alternatives across a broad range of product categories (see Hauser and Wernerfelt 1990). Consistent with Propositions 2.2 and 2.6, we hypothesize that the consideration sets of promotion-oriented consumers will generally be larger than those of prevention-oriented consumers (Proposition 3.1). Again, this is because promotion activates goals of maximizing hits and minimizing misses

**Proposition 3.1\*****Proposition 3.2****Proposition 3.3\*****Proposition 3.4\*****Figure 2.4 Regulatory f**

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*Set composition*

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