

# HOW DO WE PURSUE OUR GOALS WHEN THEY ARE ARTIFICIAL? THE ROLE OF PSYCHOLOGICAL DISTANCE ON GOAL MOTIVATION\*

*Hedeflerimiz Birer Yanılsama İken Onları Nasıl Takip Etmeliyiz?  
Psikolojik Uzaklığın Hedefe Ulaşma Motivasyonuna Olan Rolü*

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## **Abstract**

*Prior research has answered how artificial advancement towards a particular goal, which is one of the different progress framing types, affects goal motivation. Although literature showed that regular progress towards a certain goal increases motivation as well as artificial framing, no research has ever yet focused on the moderating effect of individuals' mental representations (i.e., their construal level) on the relationship between progress framing types and motivation. This study examines the role of construal level theory as a moderator such that individuals with a concrete (vs. abstract) mindset would lead to more motivation and intention towards a goal that are framed via artificial progress.*

**Keywords:** Psychological distance, Construal level theory, Goal motivation, Goal framing, Experimental research

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**Makale Geliř Tarihi:** 06/07/2018 **Makale Kabul Tarihi:** 17/10/2018

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## Öz

*Hedefe yönelik çerçeveleme kıstaslarından biri olan yapay ilerlemişlik çerçevesinin hedefe ulaşma motivasyonuna olan etkisi, önceki çalışmalar tarafından sorgulanmıştır. Literatürde, hedefe ilerlerkenki normal sürecin, en az yapay süreç kadar motivasyonu arttırdığı gözlemlenmiştir. Ancak şimdiye dek bireylerin olayları psikolojik olarak kurgulama yeteneklerinin, hedef çerçeveleme ve motivasyon arasındaki ilişkiye moderatör etkisi bakılmamıştır. Kurgu seviyesi teorisi ismi verilen olgu bu çalışmada moderator olarak kullanılmıştır. Yapay bir ilerleme sağlayan çerçeveleme, bireylerde motivasyon artışı sağlamıştır. Bu motivasyon artışı ise bireyler ancak somut bir yapıda düşündüklerinde (soyut bir yapıya zıt olarak) ortaya çıkmıştır.*

**Anahtar Kelimeler:** Psikolojik Mesafe, Kurgu Seviyesi Teorisi, Hedef Motivasyonu, Hedef Çerçevesi, Deneysel Araştırma Yöntemi

## INTRODUCTION

Goal intentions are associated with desired outcomes or behaviors: They direct and energize efforts to achieve desired end states. The effectiveness of an action controlled by goal intentions is determined by the strength of the intention to achieve the goal, the specificity with which the goal outcome is defined, and the cognitive resources available (Wieber et al, 2014). Soman and Shi (2003) have shown that consumers derive value from making progress toward goals, and this value enhances motivation and performance. According to the goal gradient effect (Hull, 1932), people who are closer to their goal should exert comparatively more effort. What are the effects of different progress framing conditions on motivation, then? This study focuses on the effect of regular progress where an action of increased progress is regulated towards a goal as well as the effect of artificial progress where an action of increased progress is created artificially, as in true sense, there is no progress at all. While doing that, construal level theory is used as a moderator such that a low level mind-set which activates concrete, detailed thinking (versus abstract, gestalt thinking) is presumed to lead higher motivation and more positive intentions towards these goals defined above.

People can attend to the same event in different ways. When attending to an object, they can zoom out and pay attention to its entire figure, or they can zoom in on the same object and pay attention to its details. In other words as the proverb says they can focus on the forest or the trees. In psychological terms, people can use different processing styles (Förster and Dannenberg, 2010). In their 2000 work, Trope and Liberman argued that people considering distant future events focused on the high-level super-ordinate categories, while those considering events that would occur soon in terms of their lower-level subordinate categories. As a person considers an event that will occur in the long-term, such as the purchase of an item, they will consider the desirability of the action. When a person thinks about events that will occur in the short-term, they focus on the feasibility of the action. Distance can take the form of temporal distance (present/future), spatial distance (near/far), or social distance (close/far in terms of reference groups) (Liberman, Trope, and Wakslak, 2007). Typically, “four major dimensions” have been considered: “temporal, spatial, social and certainty related distance” (Fiedler 2007, p. 102), with a majority of studies focusing on the temporal dimension. However, other dimensions have also been proposed, such as informational distance (“the amount of knowledge or relevant data the consumer possesses about the decision options”), experiential distance (related to whether the information possessed is first hand or not), affective distance (for instance, if the information is obtained in “warm” or “cold” sources) and perspective distance (related to the “cognitive and motivational state” experienced in later stages of decision making) (Fiedler 2007, p. 102). In this paper, first, artificial goal progress is introduced followed by the definition of construal level theory. Lastly, methodology and the study is briefly explained, noting that the result section is still in progress.

## **ENDOWED PROGRESS FRAMING**

Progress framing is highly associated with goal attainability and therefore goal motivation. Consumers seek different information de-

pending on the level of progress towards the goal. So Zhang and Huang (2010) manipulated goal progress and they think that it will predict different results in motivation towards the goal itself. Basically, when progress of reaching a goal is low, the attainability gets more difficult thus show lower motivation. But when progress is higher, then the attainability of the goal gets easier, thus it creates higher motivation. So we can assume that when we manipulate progress framing as “no progress” (10 stamps to be purchased to get a free coffee) vs. “regular progress” (10 stamps to be purchased to get a free coffee, but the coffee shop already stamped 2 for the consumer), it is assumed that participants will be more favorable towards the dependent variables that shows progress than no progress.

Nunes and Dreze (2006) focused on a phenomenon called the endowed progress effect, whereby people provided with artificial advancement toward a goal exhibit greater persistence toward reaching the goal. Kivetz, Urminsky and Zheng (2006) worked with illusionary advancement towards a goal and found that people who received an illusionary progress card (12 stamps where 2 of them are stamped by the coffee shop already) are faster to finish up the card and get the free coffee than people who received the regular progress card (10 stamps, all empty-no ready stamps). They did a field study, that’s why their dependent variable is the frequency to finish their card. It can be interpreted here that a fake progress can boost participants’ motivation and can show positive attitudes towards the loyalty card and towards reaching the goal itself. (Because goal proximity increases motivation as all the older research suggests).

How does this artificial progress towards a specific goal still manages to increase motivation can be better understood via individuals’ psychological states that strongly define their behavior. To this end, construal level theory proposes a wide account in understanding how individuals act the way they are.

## CONSTRUAL LEVEL THEORY

Construal level is related to action identification theory, uniting abstract or concrete thoughts with actions. Developed by Vallacher and Wegner, action theory also uses two levels, labeled high-level and low-level identities (1989). Those who think using higher levels look to explore motives and overall meanings of actions. This is related to abstract processing. Those who think using lower levels think in regards to details and specifics, as would be done using concrete processing. Higher level processing is associated with thoughts of why an action is performed; lower level processing is associated with thoughts of how to perform an action. Their scale, the behavior identification form, asks participants to determine the statement they most agree with. For example, the statement “Traveling by car” provides the following answers: “Following a map” or “Seeing countryside” (Vallacher and Wegner, 1989). Following a map represents low-level processing, as it is a direction to follow in order to accomplish the goal. Seeing the countryside is a high-level answer, as it helps answer why a person might travel by car. Action identification theory places people into two categories – the how people and the why people. “Hows” think concretely; “Whys” think abstractly. Low level agents are “more impulsive, less self-motivated, less consistent in their behavior over time, more external in their locus of control” (Vallacher and Wegner, 1989, p. 669). High-level agents are more consistent in their decision making and have a better understanding of who they are. Low level agents are more likely targets for those who want to manipulate them.

Individuals are able to form an action that can be identified by a cognitive hierarchy (Vallacher and Wegner, 1989). High level identities specify why a certain action is conducted and low level identities specify how a certain action is conducted. The specifications of actions are determined by level of experience within an action. More experience associates with general, abstract identifications (e.g., drive a car to travel). In contrast, as the level of experience diminishes,

identifications become local and detailed (e.g., how to drive a car). In spite of the impact of experience, individuals can also construe their world by means of (1) focusing on causes and consequences of events thus operate in a more abstract mindset, or (2) focusing on details of an event thus operate in a more concrete mindset.

Trope and Liberman (2000) developed construal level theory, which has built from Action Identification Theory of Vallacher and Wegner (1989) stating that individuals form higher level or lower level mental construal according to the perceived psychological distance towards an action. Mental representations of psychologically distant events are perceived as higher level and abstract whereas representations of psychologically proximate events are perceived as lower level and concrete (Trope and Liberman, 2000). In this sense, there is a specific distinction between high and low levels of construal where the latter generates detailed, localized, sub-ordinate and contextual information about an event contrary to generalized, global, super-ordinate information. Thus; a construal-distance mechanism reveals that as psychological distance in time (now versus sometime in future), space (here versus elsewhere), social relations (first person perspective versus third person perspective) and/or probability of occurrence (less likely versus more likely) affect construal level such that increased (versus decreased) distance results in higher levels (versus lower levels) of construal (Trope and Liberman, 2000). Research on construal level and/or psychological distance is vast covering many topics such as marketing, social psychology, retailing, ethics and morality, etc. For example, recent research has focused on construal level's role on moral issues. Some examples of recent studies of construal level on ethics and morality include construal level affect on vices and virtues (Eyal et. al., 2008), dishonesty (Gino and Galinsky, 2012) and moral emotions (Agerström et. al., 2012).

## **PROBLEM STATEMENT AND HYPOTHESES**

Literature did not answer yet the question when participants are distinctively differentiated by their chronic construal, which const-

rual level shows more motivation across different progress framing conditions. Thus, the main research objective is to understand the moderating role of construal level of artificial advancement (endowed/fake/illusionary progress) on motivation (and other possible dependent variables). Apparently majority of previous research focused on goal-gradient effect of temporal construal and a new research stream began to seek the role of construal level on different progress advancements (such as to-date vs. to-go framing types; Wiebanga et al., 2014). No research yet distinguished construal level's possible moderating effect on artificial advancement on motivation, loyalty card attitudes, etc. In addition, no research yet focused on studies that both include CL and loyalty programs together.

Bagchi and Li (2010) conducted a study that literally did not include construal level, but one of their independent variable is "the reward distance" where they manipulated the distance toward a goal (800 points to go vs 200 points to go). They found that when goal is near, they feel more loyal to the loyalty program than when the goal is distant. This paper uses this information on distance manipulation as similar to the distance mind-set in construal level theory, while deriving the hypotheses. Thus, it is assumed that as a person approaches a certain goal, the progress makes them show more positive attitude toward the loyalty program. Although researchers have focused nearly exclusively on the implications of perceiving objectively near (e.g., tomorrow) versus distant (e.g., next year) goals, initial evidence indicates that individuals can be induced to view future goals as subjectively close versus distant, and that doing so affects goal pursuit (Peetz, Wilson, and Strahan, 2009; Pennington and Roese, 2003). Furthermore, Peetz et al. (2009) demonstrated that students who perceived their future academic goals as subjectively proximal thought more about steps they could take to accomplish them, which in turn predicted greater academic motivation and behavior. Although Peetz et al. interpreted their findings in terms of research on process versus outcome focus (Pham and Taylor, 1999), their results are consistent with construal level theory. In these studies, researchers examined

relatively short-term, personal goals (Bashir et al, 2014). Song et al (2014) suggest that if a goal is far away, consumers put more effort on central features of the goal that associates with the goal's desirability, whereas when the goal is near, consumers put more effort on peripheral values that associates with the goal's feasibility. Bashir et al (2014) explains a different perspective on abstract vs concrete distinction on motivation: these researchers indicate that it is possible to boost motivation by simply making these goals feel closer to the present: If objectively distant future goals seem temporally closer, individuals may construe them more concretely and therefore be motivated to pursue them today.

The literature gives multiple hints of this proposed relationship, however; no research has yet focused on the progress framing on CL on loyalty cards in such manner. Previous research focused on progress from memory, empirically on desirable (vs. feasible) difference of goals (Song et al, 2014), increasing temporal proximity for remote future goals increase motivation (in other words: although the goal is distant, persuading consumers to make is more proximal increase motivation) (Bashir et al, 2014). Therefore, as though prior research used loyalty cards here to manipulate goal proximity and construal level theory, there is no research so far stated the moderating role of construal level that the endowed progress associates with. Previous research on Bashir et al. (2014) demonstrates that simply increasing the subjective temporal proximity of remote outcomes, without altering their objective distance, can enhance motivation and behavior to address them. This paper aims to extend the research by including artificial advancement that however leaves the objective distance unchanged. Whether the motivation will be enhanced because of proximity (temporal or chronic, whichever will give us results) is going to be questioned. Specifically, this paper would focus on the perceived artificial proximity's role on motivation. In addition, consistent with research on objective temporal distance (e.g., Gollwitzer & Sheeran, 2006; McCrea et al., 2008), our findings provide causal evidence for the role of concrete construal in influencing goal pursuit when goals seem subjectively closer in time.



This paper aims to extend previous work that suggests a linear negative relation between goal distance and motivation in goal pursuit (Carver and Scheier, 1998; Locke and Latham, 1990) by adding that artificial advancement also creates negative relation between subjective distance and motivation, under certain mind-set condition/s. Importantly, although previous research has focused on subjective distance, and found that subjective distance (especially time) influences how information is processed and remembered (Semin and Smith, 1999), how future outcomes are construed, and how decisions about future actions are made (Trope and Liberman, 2000), this paper would contribute to the literature by adding that people subjectively see the goals as more proximate regardless of their objective consequences which is affected by consumers' mental representation of progress via construal level theory, rather than actual progress (Koo and Fishbach, 2012). Thus, the hypotheses of the proposal are as follows;

H1: The relationship between goal progress and goal motivation is moderated by participants' perceived distance (in other terms, their chronic construal level).

H1a: Illusionary progress creates more motivation towards the loyalty program than no progress when participants have a proximate distance (a detailed and a focused) mind-set.

H1b: Illusionary progress creates less motivation towards the loyalty program than no progress when participants have a further distance (an abstract and general) mind-set.

## **METHODOLOGY AND PROCEDURE**

Wienbanga and Fennis (2014) used the to-date framing to state the progress that focuses on the credits (points, stamps) collected so far by the customer to reach a specific goal. The studies on the endowed progress (fake/illusionary) used to-date framing. In addition, Nunes and Dreze (2006) states that artificial advancement means to move someone toward a goal while simultaneously moving the goal

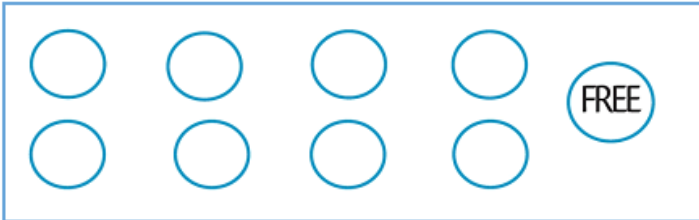
away such that the task requirements and reward remain unchanged. For example, consider reframing a frequency program that requires eight purchases in order to earn a specific reward as a program requiring 10, but with two purchases awarded upon enrollment. Both programs require eight purchases and provide the same reward, yet for two reasons, we expect those who receive the endowed progress to exert more effort.

In endowed (fake/illusionary) progress framing, the framing is manipulated as: The proximity towards a goal will stay the same objectively. However; a fake proximity is to be created so that participants will have the illusion that the goal is more proximate. Adding Kivetz, Urminsky and Zheng (2006)'s work to this information, it would be assumed that any kind of progress (endowed or regular) boosts motivation (compared to no progress) because eventually it signals to the participant that the goal is more proximate when the participant has a concrete chronic construal. The proximity of the goal then matches the proximity of the chronic mindset of an individual; eventually creates more motivation than the distant perspective. Following Wiebanga et al.'s (2013) argument, it is proposed that actively relating progress information to distal states removed from the presence will be a function of consumers' construal level.

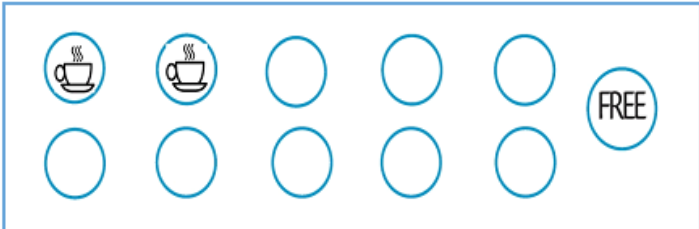
Random sampling technique is used over main respondent pools, whom are individuals who live in Izmir, Turkey (between ages 20-60). Survey is distributed online in January and February 2018. An online survey is created via Qualtrics program and distributed to a random sample of consumers through an anonymous link. After a short introduction, respondents saw manipulation of progress framing, by two conditions. A script scenario is given to respondents to indicate that this is a loyalty program of a coffee shop: *"Your favorite coffee shop is now offering a frequent buyer program. The program gives you the 9th coffee free after 8 purchases. Below, you see the loyalty card that is assigned for you. After carefully examining the loyalty card, please indicate to what extent you would agree with the following statements"*. To ensure this manipulation, loyalty cards are created which would have

two conditions: *Control* (1 free coffee after purchasing 8 more coffees) and *endowed progress* (1 free coffee after purchasing 10 more coffees; but the first 2 coffee boxes are already stamped by the café). Figure 1 shows a visual representation of these two conditions. Respondents are randomly chosen for either of these conditions. After manipulation, respondents answered (1) Motivation in Goal Pursuit (how much do you value collecting stamps for attaining the reward (1 = not at all, 7 = very much)), (2) how likely they would be to use the loyalty card, (3) how attractive they thought the card would be, (4) how likely they would be to earn the reward – 9 point scale)). These variables are then averaged and constituted the dependent variable of the study. Next, respondents saw a task that measures their psychological distance. 12 items (i.e., car, metro, elevator, etc.) are given and they are asked to what extent each item belongs to the given category (category name: transportation; Isen and Daubman, 1984; Rosch, 1975). The weakest items (i.e., foot, elevator) are averaged and became the moderating variable. The higher (lower) the score, the more abstract and general (local and detailed) respondents think. Finally, respondents answered demographic questions.

**CONDITION #1:**



**CONDITION #2:**



**Figure 1** Visual representation of conditions used in experimental study design

## FINDINGS AND DISCUSSION

85 participants attended the survey ( $M_{\text{age}} = 33$ ;  $\%_{\text{Women}} = 72.9$ ). Participants are at most have university degree (58.6%), followed by higher education (34.5%), and high school degree (6.9%). SPSS 20.0 software is used to analyze the results. Specifically, moderated regression technique is used. Moderated regression analysis via PROCESS (Hayes, 2012) macro for SPSS is conducted with goal motivation is the dependent variable; the type of goal progress is the independent variable, and perceived distance as the moderator. Results showed the overall model is significant ( $F=3.14$ ;  $p<0.05$ ). Main effects of progress ( $t=2.51$ ;  $p<0.05$ ) and distance ( $t=2.83$ ;  $p<0.05$ ) are significant, as well as the interaction effect ( $t=-2.36$ ;  $p<0.05$ ). Specifically, conditional effect results of PROCESS revealed that under proximate distance, that is, when people think in detail, the loyalty card with a fake progress seems to motivate them more to achieve the free coffee ( $t=2.31$ ;  $p<0.05$ ). Thus, H1a is accepted. However; under far distance, meaning when they think in general terms, people think that a fake progress is not that motivating at all. Rather, they think that a card with no progress is more motivating. But, this relationship is not significant ( $t=-1.11$ ;  $p=0.26$ ). Thus, H1b is rejected.

## CONCLUSION, SUGGESTIONS AND LIMITATIONS

In endowed (fake/illusionary) progress framing, the framing is manipulated as such: The proximity towards a goal stays the same objectively. However a fake proximity is created so that participants have the illusion that the goal is more proximate. Adding Kivetz, Urminsky and Zheng (2006)'s work to this information, it would be assumed that any kind of progress (endowed or regular) boosts motivation (compared to no progress) because eventually it signals to the participant that the goal is more proximate when the participant has a concrete chronic construal. The proximity of the goal then matches the proximity of the chronic mindset of an individual; eventually creates more motivation than the distant perspective. Following

Wiebanga et al.'s (2013) argument, it is indeed found that actively relating progress information to distal states removed from the presence will be a function of consumers' construal level. This study basically found that it is satisfactory enough for consumers to see an effort made by the seller (coffee shop, ...) to achieve greater motivation towards the loyalty card even if that effort does not really benefit towards the customer, rather beneficial to the seller. This paper contributes to the literature by adding that people subjectively see the goals as more proximate regardless of their objective consequences which is affected by consumers' mental representation of progress via perceived psychological distance, rather than actual progress (Koo and Fishbach, 2012). Nunes and Dreze (2006) states that artificial advancement means to move someone toward a goal while simultaneously moving the goal away such that the task requirements and reward remain unchanged. One of the limitations of the study is that perceived distance is only measured via one task. Further research should use different measurements to ensure that the relationship is robust. Another limitation of the study is that coffee is a cheap and an attainable goal. Would a goal that requires more financial effort create different results? Further study can focus on this question. Final limitation of the study is that if a promotion (i.e., 20% off) instead of free gift would demotivate consumers, or not. Further research can focus on whether a promotion that requires more physical effort would result in less motivation regardless of how goal is framed.

This study has significant contribution to marketers and business owners. Research on subjective goals focused on long-term goals (Bashir et al, 2014) or goals that can be affected by prior self-knowledge (i.e., academic success; Peetz et al, 2009). Self-knowledge means prior knowledge over the goal that can affect subjective distance on motivation (i.e., if the student is lazy, no matter how the goal is framed, he will think in a certain way to avoid the goal that links with failure in his mind). However, this paper proposes a practical goal (to get a free coffee) that is high in attainability and low in cost.

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