

Hypothesis

The Effect of Mutual Help Behavior on Employee Creativity—Based on the Recipient's Perspective

Mingdan Han ¹, Ran Li ², Wenjing Wang ², Zehou Sun ¹, Jiaming Zhang ^{2,*} and Haokun Han ²

¹ School of Management, Wuhan University of Technology, 122 Luoshi Road, Hongshan District, Wuhan 430070, China

² School of Entrepreneurship, Wuhan University of Technology, 122 Luoshi Road, Hongshan District, Wuhan 430070, China

* Correspondence: 250562@whut.edu.cn

Abstract: This paper explores the effect of the recipient's acceptance of help on his or her personal creativity in mutual aid behavior from the perspective of the recipient and explores the mediating role of learning between the two and the moderating role of the target atmosphere. Through the two research methods of a scenario experiment and questionnaire survey, sample data were collected for screening and analysis, the research hypothesis was verified, and three main research conclusions were drawn. The study suggests that employees' acceptance of help in work situations is positively correlated with their individual creativity, and that individual learning plays an intermediary role between receiving help and employee creativity. The team-learning, goal-oriented atmosphere and the atmosphere of goal recognition can adjust the relationship between the acceptance of help behavior and individual learning, and the perception of a team-learning, goal-oriented atmosphere plays a positive adjustment role, that is, the higher the team-learning goal orientation level, the greater the impact of employees' acceptance of help behavior on their own personal learning, and the team proves that the perception of a goal-oriented atmosphere plays a negative adjustment role, that is, the lower the team's orientation to the goal-oriented level, the greater the impact of employees' acceptance of help behavior on their own personal learning. This study deepens the study of the relationship between mutual aid behavior and creativity and has a certain guiding significance for managerial practice.

Keywords: receptive helping behavior; employee creativity; individual learning



Citation: Han, M.; Li, R.; Wang, W.; Sun, Z.; Zhang, J.; Han, H. The Effect of Mutual Help Behavior on Employee Creativity—Based on the Recipient's Perspective. *Sustainability* **2022**, *14*, 11182. <https://doi.org/10.3390/su141811182>

Academic Editor: Evangelos Grigoroudis

Received: 27 July 2022

Accepted: 1 September 2022

Published: 7 September 2022

Publisher's Note: MDPI stays neutral with regard to jurisdictional claims in published maps and institutional affiliations.



Copyright: © 2022 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (<https://creativecommons.org/licenses/by/4.0/>).

1. Introduction

At a time when “innovation and entrepreneurship” has become the general trend of the development of the times, employee creativity has become the core focus of competitiveness of entrepreneurial organizations, and rapid technological change and shortened product life cycles are among the challenges faced by organizations. Organizations need to rely on more innovation than ever before to survive, compete, and grow [1,2]. Employee creativity is a source of innovation and a key competitive advantage for an organization. Employee creativity refers to the novel and useful ideas, products, or services produced by one person or a small group of people working together [3], which is the result of the personal characteristics of the employee, the characteristics of the work environment, and the interaction between these characteristics [4]. It is not only reflected in work outcomes, but also enables organizations to adapt to the market environment faster and capture development opportunities in time, thus sustaining development and enhancing competitiveness in a competitive society [5,6]. In previous studies related to creativity, it was found that individual creativity is influenced not only by endogenous factors including personality traits, cognitive styles, and intrinsic motivation [7–9], but also by task-related factors such as job complexity, job stress, task autonomy, and social contextual factors

such as the team, organization, and leadership [10–14]. Among the many influencing factors, most of them are independently generated by individuals or the environment and have an impact on employee creativity, while the aspect of human interaction is limited to the leader–member relationship [15,16], and relatively little research has been conducted on the impact of interactive behaviors among employees on creativity. However, in the workplace, employees' creativity stems not only from their own strengths and environmental influences, but also from the communication between colleagues. The research on the impact of employees' mutual help behavior—which is one of the important manifestations of employee interactions—on creativity also needs attention.

As economic development accelerates, the increasingly significant role of information and knowledge in driving social development has led to an increase in the complexity and uncertainty of employees' work content in companies [17]. In order to perform their tasks better to facilitate organizational operations, employees may often accept help from others [18]. In turn, the generation of mutual help behavior may also have an impact on the person's mood [19], cognition [20], and job performance [21], and the impact is mostly positive. Consequently, employees' reception of help may also have an impact on their creativity. As the role of employee creativity is becoming more and more significant for companies to accelerate innovation and enhance their market competitiveness [22], the relationship between mutual help behavior and employee creativity has also received abundant attention from scholars. Most of the existing studies have been conducted from two perspectives to investigate the impact of mutual help behavior on employee creativity: the giver, i.e., the behavior of providing help, and the recipient, i.e., the behavior of receiving help. Perry-Smith (2006) found that employees' creativity was diminished if they were unable to process the large amount of information they received from external sources after asking for help [23]. However, more studies tend to conclude that help-seeking behavior is positively related to employee creativity [24–27]. Mueller and Kamdar (2011) found that seeking help from peers has a positive impact on creativity, because help seekers can obtain and integrate ideas and perspectives from different members. At the same time, help seekers incur a payback cost after receiving help and want more help based on their teammates, and the more such rewarding help behaviors propagate, the more the positive relationship between help-seeking behavior and employee creativity is diminished [28]. Thus, in the research on the relationship between mutual help behavior and employee creativity explored from the recipient's perspective, scholars have only considered the recipient's active help-seeking behavior, ignoring the possibility that the recipient also passively receives help. Although mutual help behaviors are mostly initiated by the help-seeker [29], this also indicates the existence of the passive acceptance of help. Therefore, this study will take a more integrated and holistic view of the recipients to explore how the overall reception of help, encompassing both active help-seeking and passive help-receiving behaviors, affects their creativity.

From the results of studies related to the effect of recipients' acceptance of help on their creativity, there is a dispute whether receiving help positively affects the outcome of creativity, but the overall conclusions tend to be in favor of the conclusion that acceptance of help enhances employees' creativity. In terms of the mechanisms of influence and theoretical underpinnings, past research has suggested that help seeking is an information-seeking behavior [30] that is visible as an interpersonal relationship. Recipients are more likely to seek help to accept new and different ideas when they believe that past problem-solving methods were incorrect or flawed, thus boosting their creativity [28]. However, previous studies only considered the role of help seeking with respect to creativity as an explanation for the effect of intrinsic motivation on creativity and did not further investigate the underlying mechanism of the effect of help seeking on creativity, and also ignored the central issue in the process of creativity formation, which is how new information or perspectives are received to transform and enhance their creativity. In Mueller and Kamdar's study, it was suggested that employees with high levels of creative personality and supportive autonomy are more creative in the presence of creative colleagues. This is because employ-

ees' creative performance is learned through indirect observation of creative colleagues. It has also been found that recipients enhance their creative performance by acquiring interpersonal citizenship behaviors [28]. In this process, interpersonal citizenship behavior is a way for individuals to form new perspectives and expand their knowledge through creative experience sharing and empathy generation. New information is transformed under the conditions of a high learning and absorption capacity, thereby having a positive effect on both the development of creative consciousness and the improvement of creative performance [31]. This suggests that individual learning plays a role in the creative process, but there are no studies at this stage to verify this idea. Therefore, this study will also further explore the mediating effect of individual learning in this influential relationship, based on the research on the influence of receiving help on individual creativity.

Not only that, but different goal orientations can have an impact on an individual's level of goal setting, learning strategies, and feedback seeking. Students with a learning goal orientation engage in more effective learning strategies than students with a performance goal orientation, and students with a performance goal orientation may take a more superficial approach to learning [32,33]. This suggests that differently motivated groups or individuals in different organizational climates may produce different learning outcomes when receiving help, which requires further differentiated investigation during the study. Therefore, this study will also delve into whether changes in employees' cognitive reflections of receiving help have different effects on their own creativity under different team goal-oriented climates.

Based on this, the main contributions of this paper are as follows: First, most previous studies on the relationship between recipients' help-seeking behavior and employees' creativity have only considered the impact of active help-seeking behavior on creativity, and have obtained different results [23,28]. In this paper, we will again explore the relationship between the influence of employees receiving help and their creativity from a more comprehensive recipient's perspective that includes both active and passive behaviors, enriching the research on the recipient's perspective in mutual help behaviors. Second, although studies have confirmed that help-seeking behaviors play a mediating role between intrinsic motivation and creativity and have some positive effects on individual creativity [28], the mechanisms underlying the relationship between help-seeking behavior and creativity have not been thoroughly investigated. Therefore, this study will explore the intrinsic mechanism of employees' help acceptance behavior on their creativity and construct a complete theoretical model. Finally, this study will further explore the influence of contextual variables in employees' help acceptance behavior and further expand the moderating variables in the model of employees' help acceptance behavior on their creativity, in order to provide some reference for future research and to provide effective suggestions and guidance for the management and enhancement of employees' creativity in work scenarios.

2. Theory and Hypothesis

2.1. Theoretical Basis

There is not a wealth of research related to mutual helping behaviors and creativity. It has been found that a successful brainstorming session usually produce help-giving behaviors and help-seeking behaviors [34], and help seeking and help giving are even more effective predictors of team creativity [35]. It is evident that mutual help behaviors have a significant impact on creativity. For example, Hargadon and Bechky (2006) [29] found that teams that encouraged employees to seek help were more creative in accomplishing tasks. Yang et al. (2010) [36] found that rapidly achieved team trust can facilitate the achievement and enhancement of team creativity through the mediating conduct of helping behaviors.

As research has evolved, scholars have gradually begun to focus on the effects of individual-level-helping behaviors on creativity, but no consistent research findings have been attained. In terms of giving help, Mueller and Kamdar (2011) [28] concluded that help-giving behaviors were negatively related to creativity. This is because the act of giving help reduces the amount of time and energy the helpers spend on completing their own

work and is therefore seen as a rewarding cost of seeking help, which further increases the cost of performance. However, Li et al. (2017) [26] argued that the reduced time and energy of the help giver can be supplemented by reciprocal help-seeking behaviors; therefore, help-giving behaviors can also increase employee creativity through exchanging perspectives.

In terms of receiving help, Perry-Smith (2006) [23] argues that employees receive a great deal of information in the process of receiving help and that frequent help seeking may be detrimental to their creativity if they are not capable of digesting and processing this information well. However, some studies have also found that help-seeking behavior can also promote creativity [28]. Offering to help a troubled colleague allows the recipient to see the problem from a new perspective, thus increasing the likelihood of solving the problem in a new, creative way. And employees who receive help from colleagues can become more actively involved in creative activities that benefit the organization [37].

Unlike previous studies that only considered the impact of individual help seeking on creativity, this study will integrate the perspective of the recipients of the help and discuss the individuals actively receiving help and passively receiving help in a unified framework. Bakker and Xanthopoulou's (2009) [38] study found that helping behaviors received from colleagues increased the resource support available to employees. This is because receiving helping behaviors from coworkers leads to the perception that coworkers are a source of available resources. This type of social support is a crucial resource that individuals use to protect, supplement, and reinvest personal resources into their environment [39]. And in the process of creativity formation [40], recipients can gain a great deal of new knowledge and information as they receive help [23], and both the knowledge and information that individuals gather in the process of completing creative tasks can prepare them for conceiving of more ideas and ultimately completing the task. In order to make themselves more receptive to this information to enhance their problem-solving abilities, recipients will reintegrate information through individual learning, and the results of the learning will stimulate new ideas or approaches that will ultimately have an impact on their creativity. In addition, individuals with different achievement goals will differ in their learning behavior performances because they evaluate their abilities differently [41].

Therefore, based on resource conservation theory and achievement goal theory, this study develops an individual-level-mediated regulation model from the recipients' perspective to explore the influence of help acceptance behavior on employees' creativity in the work environment, as well as the mediating role of individual learning in this process and the moderating role of team learning-oriented and proof-oriented, goal-oriented climate perception on the influential process of help acceptance behavior. The study not only enriches the research related to recipients' help acceptance behavior, but also considers the influence of individual learning and a team goal orientation on this relationship, which makes the research context of employees' influence of help acceptance on their creativity more complete and conducive to application in management practice, as shown in Figure 1 of the specific theoretical model.

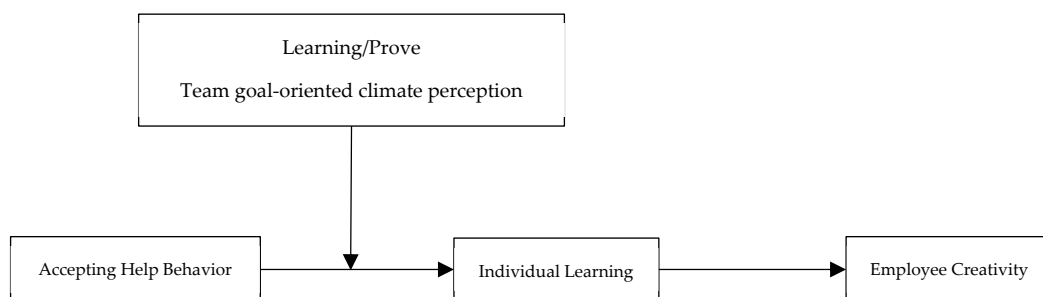


Figure 1. Theoretical model of the mechanism of influence of help-accepting behavior on employees' creativity.

2.2. Research Hypothesis

The “goal person” hypothesis of Kai Zhang (2014) suggests that being driven by psychological goals, autonomously seeking inner goals, and striving to achieve them are the basic characteristics of human behavior [42]. Goals have also become important for understanding individual behavior, and this has led to the formation of a goal theory for understanding human motivation and behavior. Goal theory argues that people produce a certain motivation or behavior behind a goal-driven outcome [43]. In the process of completing creative tasks, employees may have difficulty completing them independently because of the complexity or difficulty level of the task. Whereas achievement motivation serves as an internal drive for individuals to pursue success; thus, individuals may resort to help from others because they more ardently want to achieve their goals [44].

It has been shown that receiving help from others is effective for improving employees’ ability to perform, make faster or better decisions, and solve problems more effectively [45,46]. According to resource conservation theory, helping behaviors from coworkers increase the amount of resource support available to employees [38]. This is because receiving helping behaviors from coworkers leads to the perception that coworkers are a source of available resources. In receiving help, employees also gain the opportunity to absorb new knowledge and learn new skills [47]. The large amount of non-redundant information or diverse perspectives that employees receive provides a basis for understanding the nuances of potential solutions, which may enhance creativity by facilitating cognitive restructuring and unusual connections [23]. According to the Dynamic Process Model of Creativity [48], both the knowledge and information gathered by individuals in the process of completing creative tasks can prepare them for conceiving of more ideas and ultimately completing the task. Therefore, this study argues that employees receiving help can better enhance their personal creativity. This leads us to Hypothesis 1a.

Hypothesis 1a: *Receiving help is positively related to employee creativity.*

In the creativity component model [40,48], individual creativity mainly consists of motivation, domain-related skills, and creativity-related skills, all three of which are important sources of motivation and information for individuals when performing creative tasks. And the creative task-solving process is divided into five stages: problem formulation, preparation, idea formulation, idea validation, and problem solving. In the second stage of preparation, if the individual lacks knowledge in this area and cannot solve the problem, he or she will spend a long time in this stage due to the extensive amount of learning required. The process of individual learning is usually divided into concrete experience formation, reflective observation, the abstraction of concepts, and active practice. The source of experience for individual learning can be either direct experience of acquiring a certain perception through one’s own actions or an indirect experience of obtaining new knowledge and skills by receiving help from others [49]. After gaining experience, people integrate knowledge by recalling, reflecting on, and sharing the acquired experience. The employee’s acceptance of help leads to continuous reflection on the acquired knowledge or skills. The results of the reflection are then absorbed and refined into abstract concepts from which employees derive new meanings for their actions. Finally, as employees receive more help, propriety and certain emotions will make them avoid repeated requests for help for the same type of problem; therefore, they will try to improve their abilities and understanding through previous learning, thus increasing the effectiveness of their requests for help [50].

Therefore, this study argues that employees’ help-receiving behaviors can lead to the acquisition of a great deal of new knowledge and information [23], and in order to make themselves better recipients of this information to improve their problem-solving abilities, the recipients will reintegrate the information through individual learning, and the results of the learning will stimulate new ideas or approaches that will ultimately have an impact on their creativity. This leads us to Hypothesis 1b.

Hypothesis 1b: *Individual learning mediates the relationship between receiving help and employee creativity.*

VandeWalle's (1997) achievement goal theory classifies goal orientations in achievement contexts as learning goal orientations, proof (performance goal) orientations, and avoidance (performance goal) orientations [51]. Regarding the learning goal orientation, competence can be improved through effort, and individuals will seek more to improve their competence and try their best to understand and master new things [52]. It has been shown that a learning orientation facilitates the acquisition of knowledge and skills [53] and also promotes the learning of culturally innovative skills and behaviors [54]. Gong et al. (2009) argue that an employee's learning orientation is more likely to enhance employee creativity because employees need time to explore, learn, and create [55]. This study hypothesized that employees who perceive their team to be in a learning goal-oriented climate may work harder to learn from their experiences, improve their problem-solving skills, and generate creative ideas after receiving help, and that the higher the level of a team's learning goal orientation, the stronger the effect of employees' help-receiving behavior on their individual learning; thus, we have proposed Hypothesis 1c.

Hypothesis 1c: *Employees' perception of their team's learning-goal-oriented climate positively moderates the relationship between their help acceptance behavior and their own individual learning, and the higher the level of a team's learning goal orientation, the stronger the effect of employees' help acceptance behavior on their individual learning.*

Performance-goal-oriented individuals perceive their abilities as fixed and difficult to develop further, so they value their achievements more and consider the results of their work as a reflection of their abilities [41]. In particular, individuals with a proving-performance goal orientation are more interested in proving their abilities and obtaining favorable judgments; individuals with an avoidance-performance goal orientation try to avoid denying their abilities and obtaining negative evaluations of their abilities. Since individuals with an avoidance-performance goal orientation tend to avoid demonstrating their low competence, view achievements and challenges as threats to their perceived competence, and thus set lower-level goals [33], or refuse to seek feedback for fear of receiving negative feedback [56], which is contrary to employees' expression of their creativity, this study only considered the proof orientation.

In addition, students with a learning goal orientation will engage in more effective learning strategies than students with a proof-based orientation, and students with a proof-based goal orientation may adopt a shallower approach to learning [32]. It is evident that individuals with different achievement goals will differ in their performance of learning behaviors because they evaluate their abilities differently [41]. Employees who perceive that their team operates in a proof-based goal-oriented climate may perceive receiving help as a manifestation of their own lack of ability and have weaker individual learning behaviors, and the higher the level of proof-based, team goal orientation, the weaker the effect of employees' help acceptance behavior on their individual learning. As a result, we proposed Hypothesis 1d.

Hypothesis 1d: *Employees' perceptions of a proof-based, team goal-oriented climate negatively moderate the relationship between help acceptance behavior and individual learning, and the lower the level of proof-based, team goal orientation, the stronger the effect of employees' help acceptance behavior on their individual learning.*

3. Study I—Experimental Study

In order to verify the effect of employees' helping behaviors on individual learning, this study used a situational experiment to observe the effect of the presence and absence of helping behaviors on individual learning in two different contexts by manipulating the two

independent variables of helping behaviors (including receiving help and giving help), and to discuss them in detail based on the experimental data and statistical analysis' results.

3.1. Data Source and Sample Selection

The level of analysis of the experimental study was at the individual level, and the study focused on the impact of individual-level help acceptance behaviors on individual learning within the organization and how the impact of employees' help acceptance behaviors on individual learning varies across goal-oriented climates. Therefore, the primary subjects of the experimental study were full-time workers from the information technology industry who were in R&D positions. The main reasons for the sample selection include the following two aspects: First, in the context of China's innovation-driven development, the constant updating and iteration of information technology can only accelerate the country's forward development. As the most important intellectual asset in an enterprise, the level of creativity of the R&D staff determines the developmental momentum and core competitiveness of that enterprise [57]. Secondly, in fast-paced work environments, R&D positions in the IT industry will face more creative tasks or problems, and the division of tasks and joint problem solving among colleagues will create more opportunities for them to communicate and help each other [58]. Therefore, the research sample of an experimental study is more consistent with the relevant scenario of the research question and is suitable for testing the hypotheses.

3.2. Experimental Design

The scenario experiment of this study was a 2×3 experimental model, divided into six main groups with/without receiving help scenarios \times learning/proven/neutral goal climate teams, and with subjects from full-time positions in R&D positions in the information technology industry, each with 50 subjects, for a total of 300 subjects.

The scenario experiment has been divided into two main steps.

Step 1: Firstly, the 300 subjects were randomly brought into an experimental situation through a guide, and then the behavior of the character "Xiao Wang" in the situation was speculated according to the content of the experimental situation, and finally the possible thoughts and behaviors of "Xiao Wang" were evaluated.

The contextual guidance for helpful behavior is as follows: In order to improve the company's market competitiveness, the project team of W wants to design a new electronic product. Xiao Wang is the leader of the project team and needs to conceive of new innovative ideas but has been unable to do so. The members of the group saw that Xiao Wang's planning has not progressed, so they worked together to help Xiao Wang solve the difficulties. Xiao Wang successfully solved the problem of planning the new product with the help of his colleagues in the group.

The contextual guidance for unaided behavior is as follows: In order to improve the company's market competitiveness, the project team of W wants to design a new electronic product. Xiao Wang is the project team leader and needs to conceive of new innovative ideas but has been unable to do so. After a few days of solitary efforts, the problem of planning the new product was successfully solved.

Step 2: The team climate intervention was administered to the subjects in the following different contexts.

For the experimental group with a learning-goal-oriented climate, the researcher will emphasize to the subjects before conducting the experiment that the purpose of this experiment is mainly to find ways and means to enhance employees' personal abilities and creativity, and hopes that the subjects can often think and reflect during the experiment and can start sharing their personal experiences of enhancing their abilities after the experiment.

For experimental groups in a proof-based goal-oriented climate, the researcher will emphasize to the subjects before conducting the experiment that the purpose of this experiment is mainly to find ways and means to maximize the demonstration of employees' personal abilities and creativity, and that the subjects are expected to be able to think and

reflect often during the experiment and to share aspects that reflect their personal abilities after the experiment.

For the neutral goal-directed experimental group, no goal-directed intervention was administered.

Finally, the subjects' team goal orientation (learned-goal orientation/proven goal orientation/no intervention), mutual aid behavior, individual learning capacity, and control variables such as gender, age, education, and years of experience in the workforce were measured in different helping situations.

3.3. Measurement Method

Throughout the experimental process, the subjects' perception of the team's goal-oriented climate, the subjects' mutual support behavior towards the character "Xiao Wang" in the situation, individual learning capacity, and creativity were evaluated. Likert 5-point scales were used, where "1" means "strongly disagree", "2" means "disagree", "3" means "not too sure", "4" means "agree", and "5" means "strongly agree". The specific measurement methods are as follows.

The measurement of the perceived team goal-oriented climate was based on an adaptation of the three-factor goal-oriented scale of Vandewalle (1997) [51] for learning goal orientation and proof orientation. The scale contains 11 items, of which six are learning-oriented, including "Our team members often read work-related materials to improve their abilities", and "Our team is willing to choose challenging work in order to learn a lot from it". The proof orientation contains five questions, including "Our team members would rather prove themselves on tasks they can do well than try new tasks," "Our team tries to figure out how to prove to others that we are ability at work", etc.

The interpersonal helping-behavior scale used in Den et al.'s (2007) [59] study was used to measure mutual help behaviors. The scale contains six items, including three items each for the subject's help-giving behavior and the colleague's help-giving behavior. In this study, the content of the scale was revised to replace the test subject with "Xiao Wang", the content of mutual help was focused on the creative task, and the help-giving behavior of the colleagues was regarded as the recipient's help-receiving behavior. The final scale was developed to measure "Xiao Wang's" mutual help behavior in the contextual experiment. The scale includes questions such as "Xiao Wang helps other employees when they need to do a lot of creative work" and "helps Xiao Wang when he/she needs to do a lot of creative work".

The measure of individual learning was extracted from the six questions in Lankau and Scandura's (2002) [60] study, and the content of the scale was revised to consider the actual study, replacing the subject of the test with "Xiao Wang". The final scale on individual learning of "Xiao Wang" in the contextual experiment included "Xiao Wang is willing to share his experience and tips on work with team members", "In the process of completing tasks, Xiao Wang will In the process of completing the task, Wang will actively ask for advice from those who are good at it", etc.

In addition, variables such as gender, age, education, and years of experience were controlled for in this study. It has been confirmed that individuals with differences in these variables have different creativity performances [61]. Therefore, in order to exclude the influence of these variables on the experimental results, the control variables were measured in this study.

3.4. Data Analysis and Results

3.4.1. Independent Sample *t*-Test for Situational Differences

In order to verify whether there is an effect of employees' acceptance of helping behaviors on their individual learning capacities, 100 experimental samples were taken from the total sample of the scenario experiment in this study, of which 50 samples were taken from each of the two scenarios with and without mutual help behaviors. The mean values of the individual learning capacity for the two scenarios with and without mutual

help behaviors were 4.56 and 3.94, respectively, as shown in Figure 2. The results of the independent sample t-test for the situational differences are shown in Table 1. From the measured results, it is evident that at the 95% confidence level, there is a significant difference between the contextual differences in individual learning, and that the level of individual learning is higher in the context of help reception behavior, indicating that employees receiving help is beneficial to their individual learning behaviors.

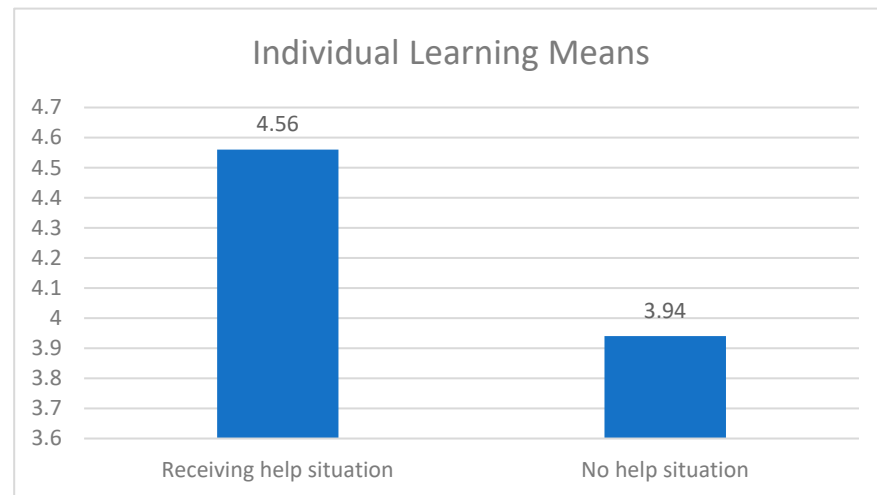


Figure 2. Mean values of individual learning in different contexts.

Table 1. Independent sample t-test for situational differences.

Variables	Situation	Average Value	Chi-Square Test		Test for Differences in Means		Whether There Is a Significant Difference
			F-Value Significance	Homogeneity of Variance	T-Value	Significance	
Individuals Study	No mutual aid behavior	3.94	0.000	No	7.717	0.000	Yes
	There is mutual aid behavior	4.56					

Note: The significance level of both chi-square test and mean difference test in this table is 0.05.

3.4.2. Effects of Situational Differences and Differences in Team Goal Orientation on Individual Learning

In order to observe the effect of team goal orientation on individual learning based on contextual differences, 150 samples were selected from the remaining 200 samples in the situational experiment according to the need for an analysis, and 2×3 experimental groups were formed, each containing 25 samples, according to the differences in context and team goal orientation. The contextual differences were between the two scenarios with and without mutual support behaviors, and the team goal orientation differences were between high learning goal orientation, neutral goal orientation, and high proof orientation. The individual learning capacity means under the situational differences and team goal orientation differences are shown in Figure 3. It is evident from the figure that the individual learning capacity mean in the learning-oriented goal climate is higher compared with the employees in the neutral goal climate, while the individual learning level in the proof-oriented goal climate is relatively lower, and the high learning-oriented goal climate positively affects the individual learning capacity of the employees in the assisted situation, i.e., the individual learning level of the employees in the high learning-oriented goal climate is higher when they receive help. In contrast, a high proof-based goal climate had a negative effect on individual learning capacity in the assisted situation, i.e., employees in a high proof-based goal climate had a lower level of individual learning when receiving help.

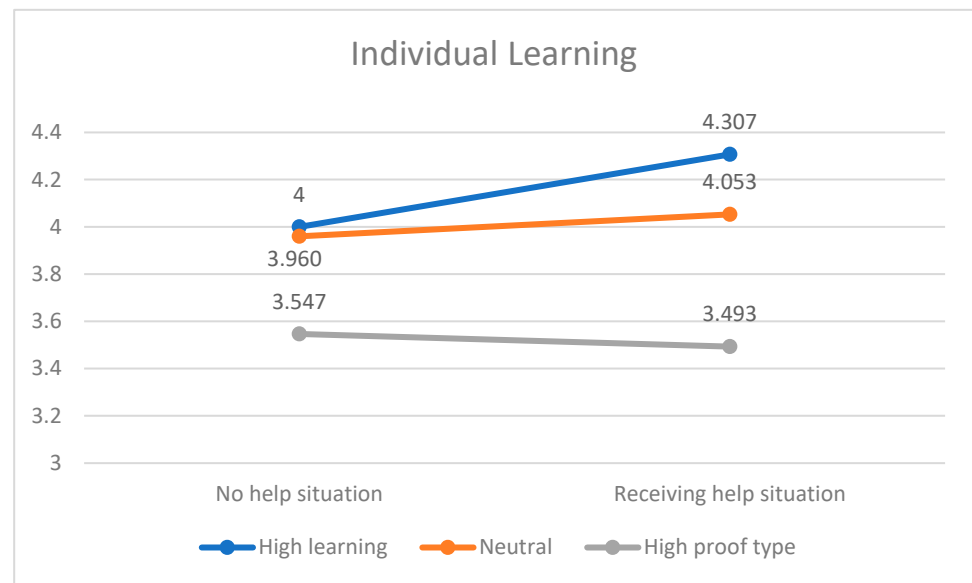


Figure 3. Individual learning capacity means under contextual differences and differences in team goal orientation.

4. Study II—Questionnaire Survey

4.1. Sample and Procedure

The data research for this study was completed in four months. In the questionnaire survey, the researchers contacted 15 companies in six provinces of Hubei, Hunan, Guizhou, Jiangsu, and Zhejiang, and with their consent, the researchers distributed 500 employee–supervisor matching questionnaires to 78 teams in these companies, and a total of 478 pairs of questionnaires were collected, of which 345 pairs were valid, with a valid return rate of 72.2%. During the data collection process, the researchers supervised the completion of the questionnaires, and once completed, they were retrieved and the data from the leaders and employees of the same team were packaged together for matching. To avoid homogeneous methods, this study used a separate evaluation method for the supervisors and employees, with leaders rating the creativity of team members and employees evaluating the mutual support behaviors and the perception of a goal-oriented team climate. The average age of the employees in the sample was 31 years old and the average length of employment was 3.93 years.

4.2. Variable Measurement

Throughout the questionnaire, the subjects were asked to evaluate help acceptance behavior, individual learning capacity, perceived team goal-oriented climate, and creativity. The scales were measured on a 5-point Likert scale, where “1” means “strongly disagree”, “2” means “disagree”, “3” means “not too sure”, “4” means “agree”, and “5” means “strongly agree”. The specific measurement methods are as follows.

Team goal-oriented climate perception: VandeWalle’s (1997) [51] questionnaire was used to measure employees’ perceptions of a learning- and proof-based team goal-oriented climate. This study was based on Vandewalle’s (1997) [51]. Three-Factor Goal-Oriented Scale, which was adapted and abridged to measure learning goal orientation and proof orientation. According to the requirements of the study, the scale finally contained eight items, including four items on learning goal orientation, such as “Team employees often improve their abilities by reading work-related materials”, and “Teams are willing to choose challenging work in order to learn a lot from it” ($\alpha = 0.946$), and the proof orientation had four items, including “Our team employees would rather prove their abilities on tasks they can do well than try new tasks” and “The team tries to find ways to prove their abilities to other teams.” etc. ($\alpha = 0.839$).

The reception of helping behaviors was measured using the Interpersonal Helping Behavior Scale used in Den et al.'s (2007) [59] study, which contains three question items. In this study, we focused on the creative task and considered the help-giving behavior of colleagues as the help-receiving behavior of the recipients. The scales that eventually formed the behavior of accepting help included "My colleagues often help me when I need to do a lot of creative work" and "My colleagues often help me when I need to have creative ideas." ($\alpha = 0.943$).

The individual learning capacity measure was extracted from six questions in Lankau and Scandura's (2002) [60] study, and the content of the scale was revised appropriately for the study. The resulting scale included "I am willing to share my experience and tips on my work with team members" and "I actively seek advice from people who are good at what they do in the process of completing tasks" ($\alpha = 0.966$).

The creativity of employees was measured using the creativity scale of Farmer et al. (2003) [62], which consists of four questions, and the content of the scale was appropriately revised in the context of the study and scored by the employee's supervisor. The final content of the creativity measurement scale includes items such as "The employee will try new ideas or methods first" and "The employee will seek new ideas and methods to solve problems" ($\alpha = 0.956$).

4.3. Data Analysis and Results

4.3.1. Common Method Deviation Test

Since most of the variables in the study were self-reported by the tested employees, there was a possibility that the problem of homoscedasticity might have occurred. Therefore, before conducting other data analyses, this study used the Harman one-way test method to analyze the occurrence and severity of the homoscedasticity problem, as suggested by Podsakoff et al. (2000) [63], which is a rotated principal component factor analysis of the test question items for all the variables. The criterion for this method is that if the variance explained by the first factor among multiple factors is less than or equal to 40%, then the data are within acceptable limits of being subject to homoscedastic error [64]. The results of the common method bias test in this study were realistic, with the percentage of variance explained by the first common factor being 38.102% and the total explanation of all factors being 84.127%. This shows that the data of this study do not affect the results of the study due to the common method bias issue.

4.3.2. Descriptive Statistics

In this study, descriptive statistics and correlation analysis were determined and conducted, respectively, for each variable, and the results are shown in Table 2. Help reception behavior was significantly and positively correlated with individual learning capacity ($r = 0.364$, $p < 0.01$), help reception behavior was significantly and positively correlated with employee creativity ($r = 0.145$, $p < 0.01$), and individual learning capacity was significantly and positively correlated with employee creativity ($r = 0.184$, $p < 0.01$); the descriptive statistical results laid a good foundation for the subsequent hypothesis testing.

4.3.3. Hypothesis Testing

First, this study examined the mediating effects of individual learning capacity through hierarchical regression analysis. Table 4 reports the regression results of the mediating effects. Among them, the data results of M4 indicate that after controlling for the control variables of the supervisor and employee's gender, age, working age, and education, there was a significant positive effect of employees' help reception behavior on their creativity ($\beta = 0.108$, $p < 0.01$); thus, hypothesis 1a was tested. The data results of M2 show that there was a significant positive effect of employees' help reception behavior on individual learning capacity ($\beta = 0.243$, $p < 0.001$). The data from M5 showed that after inputting the mediating variable of individual learning capacity, individual learning capacity had a significant positive effect on employee creativity ($\beta = 0.172$, $p < 0.01$), but the effect

of employees’ help acceptance behavior on employees’ creativity became insignificant ($\beta = 0.066, p > 0.05$), which indicates that individual learning capacity fully mediated the relationship between employees’ help reception behavior and creativity; therefore, hypothesis 1b was tested.

Table 2. Matrix of means, standard deviations, and correlation coefficients of study variables (N = 345).

	1	2	3	4	5	6	7	8	9	10	11	12	13
1. Supervisor gender													
2. Supervisor age	0.182 **												
3. Supervisor working age	0.209 **	0.372 **											
4. Supervisor’s education	0.110 *	−0.086	0.183 **										
5. Employee gender	0.105	0.136 *	0.147 **	0.05									
6. Employee age	0.152 **	0.394 **	0.269 **	0.079	0.089								
7. Employee working age	0.099	0.316 **	0.228 **	0.031	0.095	0.642 **							
8. Employee education	0.072	0.026	0.007	0.137 *	−0.089	−0.028	−0.005						
9. Help reception behavior	−0.092	−0.01	0.003	−0.051	−0.066	−0.033	−0.086	0.027					
10. Teams’ learning goal-oriented climate perception	−0.026	0.047	0.024	0.075	−0.027	0.159 **	0.1	0.05	0.408 **				
11. Teams’ proof-based goal-oriented climate perception	−0.008	−0.001	−0.031	0.006	−0.035	0.045	0.057	0.041	−0.044	0.205 **			
12. Individual learning	0.013	0.079	0.007	−0.019	0.034	0.205 **	0.135 *	−0.013	0.364 **	0.615 **	0.075		
13. Employee creativity	0.043	−0.025	0.204 **	0.163 **	0.061	−0.001	0.027	0.021	0.145 **	0.196 **	−0.008	0.184 **	
Average value	1.14	33.96	72.80	3.77	1.14	30.61	47.18	3.31	4.023	4.160	3.223	4.231	4.138
Standard deviation	0.344	5.288	52.539	0.563	0.350	7.211	44.770	0.637	0.907	0.685	0.869	0.674	0.629

Note: Significance (bilateral): ** $p < 0.01$, * $p < 0.05$.

4.3.4. Validation Factor Analysis

In order to test the discriminant validity between the four constructs of receptive helping behavior, creativity, teams’ proof-based goal-oriented and teams’ learning goal-oriented climate perception, Mplus 7.4 was used to conduct a CFA test and compare the five-factor model (help reception behavior, teams’ learning goal-oriented climate perception, teams’ proof-based goal-oriented climate perception, individual learning capacity, and employee creativity); the four-factor model (teams’ learning goal-oriented climate perception + teams’ proof-based goal-oriented climate perception, help reception behavior, individual learning capacity, and employee creativity); three-factor model (teams’ learning goal-oriented climate perception + teams’ proof-based goal-oriented climate perception + help reception behavior, individual learning capacity, and employee creativity); two-factor model (teams’ learning goal-oriented climate perception + proof team goal-oriented climate perception + help reception behavior, individual learning capacity, and employee creativity); two-factor model (teams’ learning goal-oriented climate perception + teams’ proof-based goal-oriented climate perception + help reception behavior + individual learning capacity, and employee creativity); and the one-factor model (teams’ learning goal-oriented climate perception + teams’ proof-based goal-oriented climate perception + help reception behavior + individual learning capacity + employee creativity). The results are shown in Table 3. A comparison of the individual model fits revealed that the five-factor model had the highest fit with $\chi^2/df = 1.866$, SRMR = 0.049, CFI = 0.979, TLI = 0.975, and RMSEA = 0.050. The fit indices indicated that there was significant discriminant validity among the constructs.

Table 3. Matrix of means, standard deviations, and correlation coefficients of study variables (N = 345).

Models	χ^2	df	χ^2/df	TLI	SRMR	CFI	RMSEA
Hypothetical five-factor model	334.019	179	1.866	0.975	0.049	0.979	0.050
Alternative four-factor model (Teams' learning goal-oriented climate perception + Teams' proof-based goal-oriented climate perception)	868.564	183	4.746	0.892	0.095	0.906	0.104
Alternative three-factor model (Teams' learning goal-oriented climate perception + Teams' proof-based goal-oriented climate perception + Help reception behavior)	2253.651	186	12.116	0.680	0.190	0.717	0.180
Alternative two-factor model (Teams' proof-based goal-oriented climate perception + Teams' learning goal-oriented climate perception + Help reception behavior + Individual learning)	2743.797	188	14.595	0.609	0.146	0.650	0.199
Alternative one-factor models	4205.018	189	22.249	0.389	0.190	0.450	0.248

Table 4. Mediating effect regression results.

Variables	Individual Learning		Employee Creativity		
	M1	M2	M3	M4	M5
Supervisor gender	0.027	0.060	0.015	0.029	0.019
Supervisor age	−0.007	−0.005	−0.022	−0.021 **	−0.020 *
Supervisor working age	0.000	−0.001	0.003 ***	0.003 ***	0.003 ***
Supervisor's education	−0.024	−0.001	0.079	0.089	0.089
Employee gender	0.077	0.090	0.053	0.059	0.044
Employee age	0.016 *	0.016 **	−0.010 **	−0.009	−0.012
Employee working age	0.001	0.001	0.001	−0.034	0.001
Employee education	0.009	0.000	−0.031	0.002	−0.034
Help reception behavior		0.243 ***		0.108 **	0.066
Individual learning					0.172 **
F	1.584	6.116 ***	4.789 ***	5.371 ***	6.136 ***
ΔR^2		0.105		0.035	0.039
R ²	0.036	0.141	0.320	0.355	0.394

Note: N = 345, *** $p < 0.001$, ** $p < 0.01$, and * $p < 0.05$.

To further confirm the mediating effect of individual learning capacity in the relationship between receiving help and employee creativity, this study was tested using Mplus 7.4. In this case, the sampling was set to 5000 times and the results are shown in Table 5. Among them, help reception behavior significantly and positively influenced individual employee learning ($a = 0.159$, $p < 0.01$), while individual learning capacity significantly and positively influenced employee creativity ($b = 0.228$, $p < 0.001$). The mediating effect value of employees' reception of help affecting employee creativity through individual learning capacity was 0.036 with a CI95% = [0.018,0.060], which does not contain 0. In summary, the mediating effect of individual learning capacity between receiving help and employee creativity was verified.

Table 5. Results of the test for mediating effects of individual learning capacity (N = 345).

Models	First Half of the Path Coefficient a	Second Half of the Path Coefficient b	Intermediary Effect	95% Confidence Interval
Receiving help → individual learning → creativity	0.159 **	0.228 ***	0.036 **	(0.018, 0.060)

Note: n = 345, *** $p < 0.001$, ** $p < 0.01$.

Next, this study examined the moderating effect of employees' perceptions of team learning and a proof-based goal-oriented climate through hierarchical regression analysis. To prevent the collinearity of the variables, the data of all the variables were standardized in this study. Table 6 reports the regression results of the moderating effects of team learning and a proof-based goal-oriented climate. M2 indicates a significant positive effect of employees' acceptance of help behavior on individual learning capacity ($\beta = 0.332, p < 0.001$), while M3 indicates a significant negative effect of the interaction term between teams' proof-based goal-oriented climate perception and employees' acceptance of help behavior on individual employee learning ($\beta = -0.165, p < 0.01$), indicating that the relationship between teams' proof-based goal-oriented climate perception negatively moderates the relationship between employee help reception behaviors and individual learning capacity. In the model, with teams' learning goal-oriented climate perception as the moderating variable, M4 indicates that employee acceptance of help behavior has a significant positive effect on individual learning capacity ($\beta = 0.110, p < 0.05$), and M5 indicates that the interaction term between teams' learning goal-oriented climate perception and employees' acceptance of help behavior has a significant positive effect on an individual employee's learning capacity ($\beta = 0.093, p < 0.05$), indicating that the relationship between teams' learning goal-oriented climate perception and employees' help receiving behavior positively moderates the relationship between employees' help receiving behavior and individual learning capacity.

Table 6. Regression results of the moderating effect.

Variables	Individual Learning				
	M1	M2	M3	M4	M5
Supervisor gender	0.040	0.095	0.105	0.127	0.115
Supervisor age	−0.010	−0.007	−0.008	−0.002	−0.002
Supervisor working age	−0.001	−0.001	−0.001	−0.001	−0.001
Supervisor education	−0.035	-7.630×10^{-5}	−0.018	−0.079	−0.079
Employee gender	0.114	0.145	0.166	0.160	0.173
Employee age	0.024 *	−0.025 **	0.030	0.014	0.013
Employee working age	0.001	0.002	0.001	0.001	0.001
Employee education	0.013	−0.005	0.000	−0.016	−0.012
Help reception behavior		0.332 ***	0.353 ***	0.110 *	0.112 *
Teams' proof-based goal-oriented climate perception		0.083	0.117 *		
Teams' learning goal-oriented climate perception				0.571 ***	0.567 ***
Help reception behavior × Teams' proof-based goal-oriented climate perception			−0.156 **		
Help reception behavior × Teams' learning goal-oriented climate perception					0.093 *
F	1.584	5.797 ***	6.234 ***	23.341 ***	21.998 ***
ΔR^2		0.112	0.023		0.010
R ²	0.036	0.148	0.171	0.411	0.421

Note: N = 345, *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$.

In order to further confirm whether the moderating effect of the team learning and proof-based goal-oriented climate perceptions on the relationship between employee help-receiving behavior and individual learning capacity was as expected, this study was conducted using Model 7 (Model 7 is the mediated model being moderated) in PROCESS v3.4 developed by Hayes (2013) [65], and the values of team goal-oriented climate perception plus or minus one standard deviation were brought into the regression model

and plotted in Figures 4 and 5. As seen in Figure 4, the positive relationship between employees' reception of help and individual learning capacity was relatively weaker in the context of teams' high proof-based goal-oriented climate perception compared to teams' low proof-based goal-oriented climate perception. As can be seen in Figure 5, the positive relationship between employees' reception of help and individual learning capacity is stronger in contexts including a team's high learning goal-oriented climate perception. Thus, it is evident that the results of the moderating effects of both moderating variables of team learning and proof-based goal-oriented climate perception are consistent with the study's expectations.

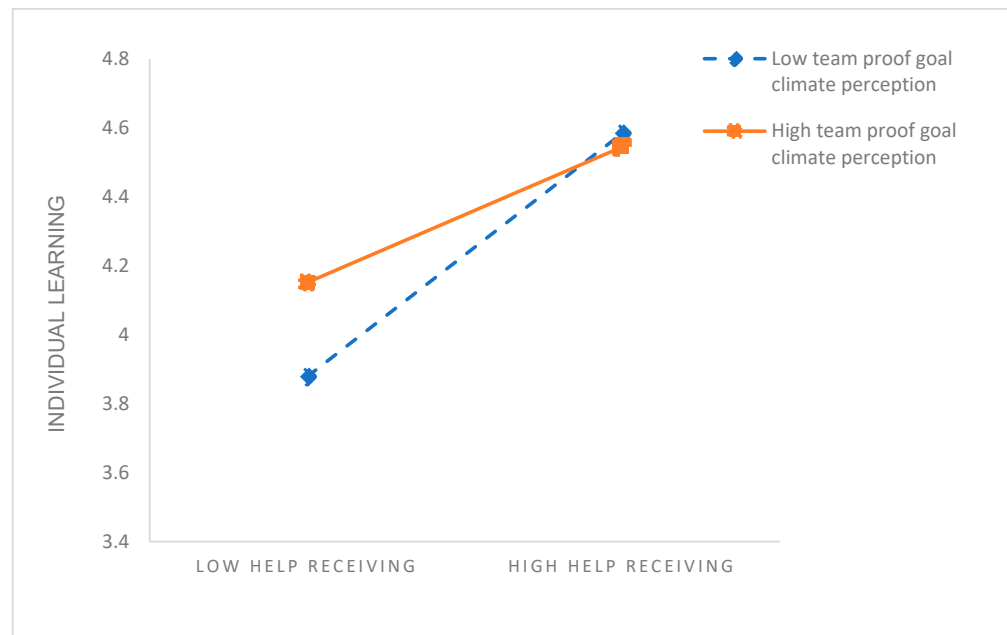


Figure 4. Moderating effect of teams' proof-based goal-oriented climate perception.

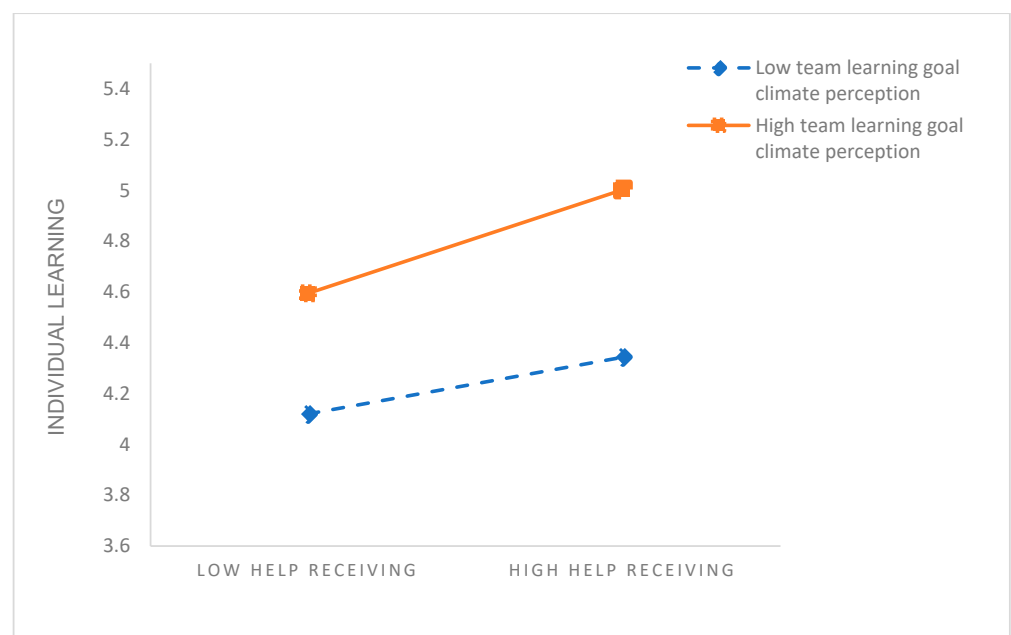


Figure 5. Moderating effect of teams' learning goal-oriented climate perception.

In addition, this study further analyzed the strongest mediating effect of individual learning capacity between employees' help receiving behavior and creativity in different team goal-oriented climate perception contexts. The results of the mediating effect tests with moderation are shown in Tables 7 and 8. From Table 7, it is evident that the moderating index with the teams' proof-based goal-oriented climate perception as the moderating variable is -0.029 , and the confidence interval does not contain 0, indicating that the model has a significant moderating and mediating effect. The lower the level of the teams' proof-based goal-oriented climate perception, the more significant the mediating effect of the model with moderation.

As can be seen in Table 8, the moderating index with teams' learning goal-oriented climate perception as the moderating variable is 0.017 with a confidence interval that does not contain 0, indicating that the model has a significant mediating effect of moderation. However, the mediating effect was not significant in the context of teams' low learning goal-oriented climate perceptions, indicating that the mediating effect of individual learning capacity between employees' help acceptance behavior and creativity was only significant in the group with a high team learning goal-oriented climate perceptions. These results suggest that the mediating effect of individual learning capacity between employees' acceptance of helping behaviors and creativity is stronger in the context of teams' high learning or low proof-based goal-oriented climate perceptions of employees. Thus, hypotheses 1c and 1d were tested.

Table 7. Test results for mediating effects with moderation1 (with teams' proof-based goal-oriented climate perception as a moderating variable).

	Indirect Effects	Standard Deviation	95% Confidence Interval	
			Lower Limit	Upper Limit
Low teams' proof-based goal-oriented climate perception	0.094 ***	0.031	0.039	0.163
Mid teams' proof-based goal-oriented climate perception	0.065 ***	0.020	0.029	0.109
High teams' proof-based goal-oriented climate perception	0.036 **	0.016	0.010	0.071
Adjustment Index	-0.029	0.014	-0.061	-0.007

Note: N = 345, *** $p < 0.001$, ** $p < 0.01$.

Table 8. Test results for mediating effects with moderation2 (with teams' learning goal-oriented climate perception as a moderating variable).

	Indirect Effects	Standard Deviation	95% Confidence Interval	
			Lower Limit	Upper Limit
Low teams' learning goal-oriented climate perception	0.004	0.015	-0.027	0.035
Mid teams' learning goal-oriented climate perception	0.021 *	0.011	0.002	0.046
High teams' learning goal-oriented climate perception	0.038 ***	0.015	0.014	0.070
Adjustment Index	0.017	0.010	0.0002	0.039

Note: N = 345, *** $p < 0.001$, * $p < 0.05$.

5. Discussion

5.1. Research Findings

Creativity is important for the development of entrepreneurial organizations. From previous studies, scholars have developed some research on the relationship between mutual aid behavior and creativity [6,18], but there are still controversial research conclusions, single research perspectives, and other issues that need to be solved urgently, and there are very few studies from the perspective of the recipients. This study differs from previous studies that only considered the impact of individuals' active request for help on their creativity, as this study comprehensively considers the perspective of the employees receiving help and discusses the individual's active help and passive help behaviors under a unified framework. Based on the theory of resource conservation and the theory of achievement goals, the mediating moderation model at the individual level has been established, and the influence of the acceptance of help behavior on the creativity of employees in the working environment has been discussed, as well as the mediating role of individual learning capacity in this process and the regulatory effect of learning and a proof-based, team goal-oriented atmosphere perception on the influence process of help reception behavior. The following research conclusions were drawn.

First, employees' acceptance of help is positively correlated with their creativity. The data from M4 show that employees' acceptance of help has a significant positive impact on their creativity ($\beta = 0.108, p < 0.01$), and employees' reception of help from their colleagues is a resource support; additionally, in the process of receiving help, the recipient's chances of accepting new knowledge and learning new skills are increased [38]. These new messages and diverse perspectives from others are fundamental for future problem solving for grantees, facilitating their cognitive-restructuring process and preparing them for more new ideas in the future, thereby enhancing their creativity.

Second, individual learning capacity acts as an intermediary between receiving help and employee creativity. After inputting the individual learning capacity mediation variable, the data of M5 showed that individual learning capacity had a significant positive effect on employee creativity ($\beta = 0.172, p < 0.01$), but the effect of employee acceptance of help on employee creativity became less significant ($\beta = 0.066, p > 0.05$), reflecting that individual learning capacity completely mediated the relationship between employees' acceptance of help behavior and creativity. When employees are unable to solve their current problems and choose to accept help from others, they gain a great deal of new information and knowledge. In order to make better use of this information and knowledge to improve their problem-solving skills, the recipients will integrate new resources again through their individual learning capacities, and the results of the learning will stimulate new ideas or problem-solving methods, ultimately enhancing their creativity.

Finally, employees' learning and proof-based goal-oriented atmosphere perception within a team can adjust the relationship between the acceptance of help behavior and individual learning capacity, and teams' learning goal-oriented atmosphere perception can positively adjust the relationship between help acceptance behavior and individual learning capacity, while teams' proof-based goal-oriented atmosphere perception's negative regulation accepts the relationship between helpful behavior and individual learning capacity. This is because different achievement goal atmospheres affect individuals' evaluation of their abilities, so there will be differences in learning behaviors [41]. In a learning-oriented objective atmosphere, individuals tend to make progress through hard work and want to master knowledge and pursue goals, so they will strengthen their individual learning capacity. In the proof-type target atmosphere, individuals will determine the difficulty of the selected task and the process of pursuing the goal according to their own ability level, so their learning style and process will not be as extensive compared with the individuals in the learning target atmosphere. These research findings expand upon and contribute to the existing theoretical and practical aspects.

5.2. Theoretical Implications

In terms of theoretical research, firstly, most of the previous studies from the perspective of the recipient have only considered the effect of individuals actively seeking help on their creativity. For example, Burke et al. (1976) argued that mutual help behavior is mostly initiated by the help-seeker [29], and studies have found that the way employees process the large amount of information they receive from the outside after asking for help has a significant impact on their creativity [23] and that seeking help from peers has a positive impact on their creativity [28]. However, these studies ignore the passive acceptance of help by recipients and the findings are somewhat controversial. The recipient's perspective in this study does not strictly distinguish between active help-seeking and passive help-receiving situations, and concludes from a unified and more comprehensive recipient's perspective that "receiving help positively affects employees' individual creativity", which enriches the recipient's perspective on mutual aid behavior.

Secondly, previous research has confirmed that help-seeking behavior mediates the relationship between intrinsic motivation and creativity and has a positive effect on individual creativity [28]. However, this research has only considered the act of receiving help as an explanation for the influence of intrinsic motivation on creativity, and has still not been analyzed through an in-depth study of the underlying mechanisms between help-seeking behavior and creativity, and has ignored the core issue in the process of creativity formation, i.e., how new information or ideas are transformed and enhance their creativity after they are received. Consequently, this study has constructed a more complete theoretical model and finds that individual learning capacity plays a mediating role between receiving help and employees' creativity, i.e., employees receive help to further enhance their creativity through their individual learning capacities.

Finally, this study portrayed a more complete picture of the recipient's behavior and provided context for the factors influencing creativity. The moderating variables of the model of the influence of employees' receptive helping behaviors on their creativity were expanded by further exploring the influence of a goal-oriented climate on individual cognitive responses. The study validates the moderating effect of a team goal-oriented climate on the relationship between recipient behavior and individual learning capacity.

5.3. Practical Significance

The research results of this study not only compensate for some of the shortcomings of previous studies theoretically, but also have some guiding significance for managerial practice. First, companies should pay more attention to the impact of employees' creativity on team innovation and sustainable corporate development and emphasize the important role of accepting help while trying to enhance employees' creativity. Enterprise managers should actively encourage their employees to accept help from others appropriately, so as to gain views and ideas from different perspectives, harvest knowledge and skills in various aspects, and thus stimulate their own new ideas or perspectives, and then creatively solve problems or produce creative products, which is particularly important for R&D departments.

Secondly, there can be appropriate interventions in individual learning capacity behavior within an organization. Learning is the process of enhancing individual competencies, and regarding creative activities, it is also the process of transforming the new knowledge and information received into skills related to one's field and creative skills. Therefore, organizations can intervene appropriately in employees' learning behaviors by creating learning-centered work groups, regular learning events, etc., so as to continuously improve organizational performance and innovation by enhancing employees' capabilities and creativity.

Finally, creating a learning climate that promotes learning goal orientation is crucial. The research findings indicate that different goal-oriented climates influence employees' behaviors and intentions, and that learning goal-oriented climates promote an individual's learning capacity and thereby creativity more than proof-based goal-oriented climates. This

is because a learning goal orientation is more conducive to the acquisition of knowledge and skills [47] and promotes the learning of culturally innovative skills and behaviors [48]. In a learning goal climate, employees develop more effective learning strategies [26] and make more efforts to learn from their experiences, improve their problem-solving skills, and generate creative ideas after receiving help. Therefore, companies can use learning goal-oriented leaders to manage employees or create teams with different types of tasks based on the goal orientation of the employees so that employees can enhance their creativity through a more active participation in learning, complete their creative tasks with a high quality, and thereby contribute to the development of the company.

5.4. Research Limitations and Future Prospects

Although this study discusses the effect of employees receiving help on their creativity, the mediating effect of individual learning capacity in this influential relationship, and the moderating effect of a team goal climate accordingly, there are some limitations of the study.

First, the selection of the tested sample types was not rich enough. Due to the limitations of the research effort and time, in the selection of samples to be tested, only China's information technology industry development jobs with full-time staff were selected, while for other countries and in other industries, research and development personnel or other positions of staff may have differences with respect to the influence factors of creativity, and the influence of the same factors that affect the results may be different [66]. Second, the research methodology needs to be improved. Although two different research methods—situational experiments and questionnaires—were used in this study to jointly measure the influence relationships between different variables, there are certain limitations. At this stage of the study, there are some different, new research methods and instruments to observe and measure variables, such as mutual help behavior and creativity, but they cannot be applied to this research due to the limited time, energy, and resources of the team. Finally, the research content needs to be further deepened. Although this study focused on full-time workers in R&D positions in the IT industry, it did not develop group comparisons in terms of age, gender, and years of experience, thus sparing the in-depth analysis of these variables.

Therefore, regarding the future research direction, we have three prospects: (1) the future researchers can expand the research sample to make the research more comprehensive and the conclusion more objective and valid; (2) future researchers can use a variety of new but rich research methods other than questionnaires and experiments, such as interviews and survey diaries, to further improve the accuracy of the research conclusions; (3) future researchers can further develop the research of this study's variables, which may lead to more refined and clear conclusions, and also have some significance for real-life work and practical guidance. Further research may lead to more refined and clearer conclusions and have some significance for real-life work and practical guidance.

Author Contributions: Conceptualization, M.H.; resources, M.H. and J.Z.; formal analysis, M.H.; writing—original draft, M.H., R.L. and W.W.; project administration, J.Z.; funding acquisition, J.Z.; methodology, M.H.; investigation, R.L. and W.W.; writing—review & editing, H.H. and W.W.; supervision, Z.S. All authors have read and agreed to the published version of the manuscript.

Funding: This research was funded by Research on the effectiveness of innovation and entrepreneurship based on big data to drive employment, grant number 2020CCJG01Z008 and the APC was funded by Research on the effectiveness of innovation and entrepreneurship based on big data to drive employment.

Institutional Review Board Statement: The study was conducted according to the guidelines of the Declaration of Helsinki, and approved by School of Entrepreneurship, Wuhan University of Technology.

Informed Consent Statement: Informed consent was obtained from all subjects involved in the study.

Data Availability Statement: The data presented in this study are not publicly available due to restrictions e.g., privacy and ethical.

Conflicts of Interest: The authors declare no conflict of interest.

References

- Jung, D.I.; Chow, C.; Wu, A. The role of transformational leadership in enhancing organizational innovation: Hypotheses and some preliminary findings. *Leadersh. Q.* **2003**, *14*, 525–544. [[CrossRef](#)]
- Tierney, P.; Farmer, S.M.; Graen, G.B. An examination of leadership and employee creativity: The relevance of traits and relationships. *Pers. Psychol.* **1999**, *52*, 591–620. [[CrossRef](#)]
- Amabile, T.M. A model of creativity and innovation in organizations. *Res. Organ. Behav.* **1988**, *10*, 123–167.
- Shalley, C.E.; Zhou, J.; Oldham, G.R. The effects of personal and contextual characteristics on creativity: Where should we go from here? *J. Manag.* **2004**, *6*, 933–958. [[CrossRef](#)]
- Amabile, T.M.; Conti, R.; Coon, H.; Lazenby, J.; Herron, M. Assessing the work environment for creativity. *Acad. Manag. J.* **1996**, *39*, 1154–1184.
- Gumusluoglu, L.; Ilsev, A. Transformational leadership, creativity, and organizational innovation. *J. Bus. Res.* **2007**, *62*, 461–473. [[CrossRef](#)]
- Oldham, G.R.; Cummings, A. Employee creativity: Personal and contextual factors at work. *Acad. Manag. J.* **1996**, *39*, 607–634.
- Zhou, J.; Oldham, G.R. Enhancing creative performance: Effects of expected developmental assessment strategies and creative personality. *J. Creat. Behav.* **2001**, *35*, 151–167. [[CrossRef](#)]
- Zhou, J.; Shin, S.J.; Brass, D.J.; Choi, J.; Zhang, Z.-X. Social Networks, Personal Values, and Creativity: Evidence for Curvilinear and Interaction Effects. *J. Appl. Psychol.* **2009**, *94*, 1544–1552. [[CrossRef](#)]
- Shalley, C.E.; Gilson, L.L. What leaders need to know: A review of social and contextual factors that can foster or hinder creativity. *Leadersh. Q.* **2004**, *15*, 33–53. [[CrossRef](#)]
- Shalley, C.E.; Gilson, L.L.; Blum, T.C. Interactive Effects of Growth Need Strength, Work Context, and Job Complexity on Self-Reported Creative Performance. *Acad. Manag. J.* **2009**, *52*, 489–505. [[CrossRef](#)]
- Anderson, N.; Potočnik, K.; Zhou, J. Innovation and creativity in organizations: A state-of-the-science review, prospective commentary, and guiding framework. *J. Manag.* **2014**, *40*, 1297–1333. [[CrossRef](#)]
- Bai, Y.; Lin, L.; Li, P.P. How to enable employee creativity in a team context: A cross-level mediating process of transformational leadership. *J. Bus. Res.* **2016**, *69*, 3240–3250. [[CrossRef](#)]
- Kalaa, C.; Raghavendra, S. Workplace ostracism and employee creativity: Role of defensive silence and psychological empowerment. *Ind. Commer. Train.* **2019**, *51*, 360–370.
- Basu, R.; Green, S.G. Leader-member exchange and transformational leadership: An empirical examination of innovative behaviors in leader-member dyads. *J. Appl. Soc. Psychol.* **1997**, *27*, 477–499. [[CrossRef](#)]
- Scott, S.G.; Bruce, R.A. Determinants of innovative behavior: A path model of individual innovation in the workplace. *Acad. Manag. J.* **1994**, *37*, 580–607.
- Li, C.; Zhou, E.; Ji, Y. Supervisor power distance and employee help-seeking behavior: The mediating role of supervisor trust. *China Hum. Resour. Dev.* **2015**, *13*, 21–26.
- Bamberger, P. Employee help-seeking: Antecedents, consequences and new insights for future research. *Pers. Hum. Resour. Manag.* **2009**, *28*, 49–98.
- Gross, A.E.; Latane, J.G. Receiving help, reciprocation, and interpersonal attraction. *J. Appl. Soc. Psychol.* **1974**, *4*, 210–223. [[CrossRef](#)]
- Newark, D.A.; Bohns, V.K.; Flynn, F.J. A helping hand is hard at work: Help-seekers' underestimation of helpers' effort. *Organ. Behav. Hum. Decis. Process.* **2017**, *139*, 18–29. [[CrossRef](#)]
- Kamdar, D.; Van, D.L. The joint effects of personality and workplace social exchange relationships in predicting task performance and citizenship performance. *J. Appl. Psychol.* **2007**, *92*, 1286–1298. [[CrossRef](#)] [[PubMed](#)]
- Deng, C.-H.; Xie, C.-F.; Zhang, L. Can creative inspiration originate from spiritual factors?—A study of the spiritual dynamics of employee creativity. *J. Manag.* **2020**, *33*, 73–82.
- Perry-Smith, J.E. Social yet creative: The role of social relationships in facilitating individual creativity. *Acad. Manag. J.* **2006**, *49*, 85–101. [[CrossRef](#)]
- Wang, H.; Rispens, S.; Demerouti, E. Boosting creativity in functional diverse work groups: The importance of help-seeking behavior and openness to experience. *Eur. J. Work. Organ. Psychol.* **2022**, 1–13. [[CrossRef](#)]
- Lee, S.; Byun, G.; Kim, S. Effects of Coworkers' Helping Behavior on Employees' Knowledge Sharing and Creativity: The Moderating Role of Interactional Justice. *Int. J. Environ. Res. Public Health* **2021**, *18*, 13302. [[CrossRef](#)]
- Li, S.; Liao, S. Help Others and Yourself Eventually: Exploring the Relationship between Help-Giving and Employee Creativity under the Model of Perspective Taking. *Front. Psychol.* **2017**, *8*, 1030. [[CrossRef](#)]
- Yáñez Morales, V.P.; Pan, A.; Ali, U. How helping behaviours at work stimulate innovation in the organization: Evidence from a moderated-mediation model. *Innovation* **2020**, *22*, 71–90. [[CrossRef](#)]

28. Mueller, J.S.; Kamdar, D. Why seeking help from teammates is a blessing and a curse: A theory of help seeking and individual creativity in team. *J. Appl. Psychol.* **2011**, *96*, 263–276. [[CrossRef](#)] [[PubMed](#)]
29. Burke, R.J.; Weir, T.; Duncan, G. Informal helping relationships in work organizations. *Acad. Manag. J.* **1976**, *19*, 370–377.
30. Lee, F. When the going gets tough, do the tough ask for help? Help seeking and power motivation in organizations. *Organ. Behav. Hum. Decis. Process.* **1997**, *72*, 336–363. [[CrossRef](#)]
31. Li, M. A Research on the Effect of Individual Help-Seeking Behavior on Scientific Research Innovation Performance. *Int. J. Bus. Manag.* **2018**, *6*, 86–95.
32. Meece, J.L.; Blumenfeld, P.; Hoyle, R. Students' goal orientations and cognitive engagement in classroom activities. *J. Educ. Psychol.* **1988**, *80*, 514–523. [[CrossRef](#)]
33. Payne, S.C.; Youngcourt, S.S.; Beaubien, J.M. A meta-analytic examination of the goal orientation nomological net. *J. Appl. Psychol.* **2007**, *92*, 128–150. [[CrossRef](#)] [[PubMed](#)]
34. Hargadon, A.; Sutton, R.I. Brainstorming groups in context: Effectiveness in a product design firm. *Adm. Sci. Q.* **1996**, *41*, 685–718.
35. Hargadon, A.B.; Bechky, B.A. When Collections of Creatives Become Creative Collectives: A Field Study of Problem Solving at Work. *Organ. Sci.* **2006**, *17*, 484–500. [[CrossRef](#)]
36. Yang, Z.; Xie, Z.; Bao, G. A study on the mechanism of the role of team rapid trust and interactive behavior on team creativity. *J. Fuzhou Univ. (Philos. Soc. Sci. Ed.)* **2010**, *24*, 31–34.
37. Lee, S.; Kwon, S.; Kim, Y.-S.; Lee, D. The effect of adolescent athletes' achievement goal orientation and perception of error on their sport-confidence. *Int. J. Sports Sci. Coach.* **2020**, *16*, 646–657. [[CrossRef](#)]
38. Bakker, A.B.; Xanthopoulou, D. The crossover of daily work engagement: Test of the actor-partner interdependence model. *J. Appl. Psychol.* **2009**, *94*, 1562–1571. [[CrossRef](#)]
39. Halbesleben, J.R.B.; Wheeler, A.R. I owe you one: Coworker reciprocity as a moderator of the day-level exhaustion-performance relationship. *J. Organ. Behav.* **2011**, *32*, 608–626. [[CrossRef](#)]
40. Amabile, T.M.; Pratt, M.G. The dynamic componential model of creativity and innovation in organizations: Making progress, making meaning. *Res. Organ. Behav.* **2016**, *36*, 157–183. [[CrossRef](#)]
41. Yuan, D.-H. A study on the effect of achievement goal orientation on the efficacy of entrepreneurial actions. *Psychol. Sci.* **2005**, *6*, 109–114.
42. Zhang, K. *Goal Dynamics: Self-Organizing Principles of Motivation and Personality*; Social Science Literature Press: Beijing, China, 2014.
43. Li, P.; Sun, Y.; Lei, M. What makes power granted: The formation mechanism of leadership empowerment behavior in the perspective of goal theory. *Adv. Psychol. Sci.* **2019**, *27*, 1167–1182. [[CrossRef](#)]
44. Nadler, A. Relationship, Esteem, and Achievement Perspectives on Autonomous and Dependent Help Seeking. In *Strategic Help Seeking: Implications for Learning and Teaching*; Stuart, A., Karabenick, Eds.; Lawrence Erlbaum Associates: New York, NY, USA, 1998; pp. 61–93.
45. Ellis, S.; Tyre, M.J. Helping relations between technology users and developers: A vignette study. *IEEE Trans. Eng. Manag.* **2001**, *48*, 56–69. [[CrossRef](#)]
46. Eisenhardt, K.M. Making fast decisions in high-velocity environments. *Acad. Manag. J.* **1989**, *32*, 543–576.
47. Van Ginkel, W.P.; van Knippenberg, D. Group information elaboration and group decision making: The role of shared task representations. *Organ. Behav. Hum. Decis. Process.* **2008**, *105*, 82–97. [[CrossRef](#)]
48. Amabile, T.M. The social psychology of creativity: A componential conceptualization. *J. Personal. Soc. Psychol.* **1983**, *45*, 357–376. [[CrossRef](#)]
49. Kolb, D.A.; Boyatzis, R.E.; Mainemelis, C. Experiential learning theory: Previous research and new directions. *Perspect. Think. Learn. Cogn. Styles* **2001**, *1*, 227–247.
50. Feng, Y.; Xu, J.; Yin, Q. The more help-seeking, the better adjustment? New employees' help-seeking frequency, help-seeking behavior type and organizational socialization. *China Hum. Resour. Dev.* **2017**, *9*, 70–80.
51. Vandewalle, D. Development and Validation of a Work Domain Goal Orientation Instrument. *Educ. Psychol. Meas.* **1997**, *57*, 995–1015. [[CrossRef](#)]
52. Dweck, C.S. Motivational processes affecting learning. *Am. Psychol.* **1986**, *41*, 1040–1048. [[CrossRef](#)]
53. Kozlowski, S.W.J.; Gully, S.M.; Brown, K.G.; Salas, E.; Smith, E.M.; Nason, E.R. Effects of training goals and goal orientation traits. *Organ. Behav. Hum. Decis. Process.* **2001**, *85*, 1–31. [[CrossRef](#)] [[PubMed](#)]
54. Gong, Y.; Fan, J. Longitudinal examination of the role of goal orientation in cross-cultural adjustment. *J. Appl. Psychol.* **2006**, *91*, 176–184. [[CrossRef](#)] [[PubMed](#)]
55. Gong, Y.; Huang, J.C.; Farh, J.L. Employee learning orientation, transformational leadership, and employee creativity. *Acad. Manag. J.* **2009**, *52*, 765–778. [[CrossRef](#)]
56. VandeWalle, D. Goal Orientation: Why Wanting to Look Successful Doesn't Always Lead to Success. *Organ. Dyn.* **2001**, *30*, 162–171. [[CrossRef](#)]
57. Ma, J.; Liu, T. Rewarded with a heavy hand? The inhibition of creativity by the work value demand and incentive misalignment of R&D personnel. *Manag. Rev.* **2015**, *27*, 94–104.
58. Baer, M. The strength-of-weak-ties perspective on creativity: A comprehensive examination and extension. *J. Appl. Psychol.* **2010**, *95*, 592–601. [[CrossRef](#)]

59. Den Hartog, D.N.; De Hoogh, A.H.; Keegan, A.E. The interactive effects of belongingness and charisma on helping and compliance. *J. Appl. Psychol.* **2007**, *92*, 1131–1139. [[CrossRef](#)]
60. Lankau, M.J.; Scandura, T.A. An Investigation of Personal Learning in Mentoring Relationships: Content, Antecedents, and Consequences. *Acad. Manag. J.* **2002**, *45*, 779–790.
61. Shin, S.; Zhou, J. Transformational leadership, conservation, and creativity: Evidence from Korea. *Acad. Manag. J.* **2003**, *46*, 703–714. [[CrossRef](#)]
62. Farmer, S.; Tierney, P.; Kung-Mcintype, K. Employee creativity in Taiwan: An application of role identity theory. *Acad. Manag. J.* **2003**, *46*, 618–630.
63. Podsakoff, P.M.; Mackenzie, S.B.; Bachrach, D.G.; Paine, J.B. Organizational citizenship behaviors: A critical review of the theoretical and empirical literature and suggestions for future research. *J. Manag.* **2000**, *26*, 513–563. [[CrossRef](#)]
64. Ashford, S.J.; Tsui, A.S. Self-regulation for managerial effectiveness: The role of active feedback seeking. *Acad. Manag. J.* **1991**, *34*, 251–280.
65. Hayes, A. Introduction to mediation, moderation, and conditional process analysis. *J. Educ. Meas.* **2013**, *51*, 335–337.
66. Hofstede, G.; McGrae, R.R. Personality and Culture Revisited: Linking Traits and Dimensions of Culture. *Cross Cult. Res.* **2004**, *38*, 52–88. [[CrossRef](#)]