

The Relationship among Academia Scholars' Achievement Target Direction and Educational Appointment: Investigative the Intermediating Character of Noticed School Environment and Academic Self Effectiveness

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ABSTRACT

Enhancing academic engagement in university students can help enrich students' educational experience. Drawing on the Conservation of Resources Model and the Job Demand-Resources Model, this study aims to explore the links between undergraduates' achievement goal orientation and academic engagement (AE), by examining the mediating functions of perceived school climate (PSC) and academic self-efficacy (ASE). Using whole-group sampling, 571 Chinese undergraduates were selected using a self-reporting method to explore the impacts of mastery-approach goals (MAGs) and performance-avoidance goals (PAGs) on AE, as well as the chain mediating effects of PSC and ASE. The findings show that both MAGs and PAGs have a positive, direct, predictive effect on university students' AE. Additionally, both goal orientations indirectly predict AE through PSC and ASE, separately. The results showed there was also a significant chain mediating effect of PSC and ASE, where for both goal orientations, AE was positively predicted. This study highlights the role of environmental as well as personal factors in facilitating self-regulated learning among university students, and it discusses implications for future research.

KEYWORDS: Human Development, Educational Psychology, Academic Engagement, Goal Orientation,

1.0 INTRODUCTION

Education is a solid foundation for a country's economic and social sustainability. Improving students' AE is the key to improving their quality of study activities and education experience. AE is a rich, stable and sustained positive psychological state of individuals in learning activities and is divided into three dimensions: vitality, dedication and absorption [1-9]. Research has found that not only does AE positively correlate with academic performance and promote university students' academic achievement [7-16], but AE can also reduce college dropout rates. The reduction in the dropout rate of university students is an effective way to achieve equity and improve the standard of education [13-24]. Antecedents affecting AE have been of interest to researchers, such as with motivational factors—particularly how they positively and negatively predict the impact of achievement goal orientation on AE. However, the mechanisms by which achievement goal orientation influences AE in university student populations and how university students self-regulate their learning activities have not received sufficient attention from researchers. To address this gap, this study proposes a mediation model drawing on the Conservation of Resources (COR) Model and the Job Demand-Resources (JD-R) Model [24-30], aiming to explore the mechanisms by which university students' achievement goal orientation influences AE and explain how PSC and ASE can act as resources to promote self-regulated learning among university students [28-36].

2.0 LITERATURE REVIEW

Goal orientation is an important topic in the field of achievement motivation research. The dominant goal influences individual motivation and has a decisive impact on individual achievement behavior. Achievement goal orientation is a central component of student motivation and their ability to self-regulate learning [1-14]. Four dimensions of achievement goals are commonly used in existing research [9-23]. In this study, we draw on a couple of these four dimensions of achievement goals to verify the effect of different types of goals on AE in university students. The literature demonstrates that the association of mastery-avoidance goals and performance-approach goals with AE is controversial [37-44]. The present study was designed to verify the consistency of the actual observed

phenomena with the results of existing studies and to investigate whether the findings of existing studies could be reproduced. Therefore, only two achievement goal dimensions were selected: MAGs and PAGs, in order to examine the influence of these goal orientations on AE in university students. MAGs are when individuals focus more on developing their skills and abilities, facilitating their own learning, understanding the content and completing or mastering a learning task [44-51]. PAGs are where individuals are more concerned with avoiding performing worse than others [18,19]. It was found that MAGs were able to positively predict AE [52-62]. PAGs often negatively predict AE and academic achievement, leading to college dropouts and even depression. It is evident that various kinds of goals can serve different purposes. Individuals who are driven by mastery- oriented goals define and evaluate their abilities as self-oriented or task-oriented, which tend to motivate them intrinsically; individuals who are driven by performance-oriented goals define and evaluate their abilities as more concerned with whether their performance is due to others, which leads to individuals being more susceptible to extrinsic motivation. Extrinsic factors such as relational-based and environmental variables can influence the relations between the two main study variables. For example, PSC has been shown to significantly influence students' AE and academic achievement [1-11]. Social constructivism suggests that students learn by constructing cognitive schemas and internalizing knowledge into their own cognitive structures through social interactions with others [12-19]. In particular, school life is the primary place where students construct their own knowledge through interactions; students' school experiences can influence their engagement and achievement—demonstrating the relevance one's environment has on shaping learning experiences [20-26]. Students' PSC are students' intuitive feelings regarding the school climate expressed as their satisfaction with the living environment (e.g., structures, relationships and culture) [27-34]. Teachers have a major influence on students' AE, particularly cognitive engagement [35-41]. Students who perceive teachers' expectations and motivation are more likely to be motivated and develop an interest in learning [42-49]. However, there are differences in the perception of classroom climates between students which are affected by differences in goals; students in the same class perceived classroom goal structures differently [50-54]. Students who are performance goal-oriented prefer overt assessment by teachers, while students who are avoidance goal-oriented do not like learning tasks with mastery goals and they do not like challenging learning tasks [54-62]. The study found that positive PSC enhances students' self-beliefs and contributes to students' AE, which in turn affects their academic achievement. PSC is plastic and students are able to filter, perceive, interpret and translate the school climate through achievement goal orientation, which promotes the internalization of students' motivation to learn and thus influences their AE [18-27].

3.0 METHODOLOGY

The study was conducted in October 2021 at a Rivers State University, Port Harcourt, Nigeria, using an on-site questionnaire to collect data. The review was directed with the assent of the actual understudies and the poll was managed in a homeroom setting. The specialist and a master's student in psychology, who was familiar with the questionnaire, acted as the main testers and asked the students to answer the questionnaire anonymously and independently. Afterward, the questionnaires were verified and 17 questionnaires that were not answered carefully (irregularity of answers and multiple choices of two or more answers) and 12 questionnaires that were missing more than 10% of the questions were deleted, resulting in 571 valid questionnaires with an effective rate of 95.17%. Finally, IBM SPSS 26.0 was used for data entry and analysis, and the relationship between the four variables was verified and confirmed by the Bootstrap mediation test through the SPSS macro program PROCESS, prepared by Hayes in 2012 [1-22]. The review was directed with the assent of the actual understudies and the poll was managed in a homeroom setting. The specialist and a master's student in psychology, who was familiar with the questionnaire, acted as the main testers and asked the students to answer the questionnaire anonymously and independently. Afterward, the questionnaires were verified and 17 questionnaires that were not answered carefully (irregularity of answers and multiple choices of two or more answers) and 12 questionnaires that were missing more than 10% of the questions were deleted, resulting in 571 valid questionnaires with an effective rate of 95.17%. Finally, IBM SPSS 26.0 was used for data entry and analysis, and the relationship between the four variables was verified and confirmed by the Bootstrap mediation test through the SPSS macro program PROCESS, prepared by Hayes in 2012 [23-46]. The scale consists of 29 questions covering the four layered achievement targets. As required by the research, only two dimensions, MAGs (e.g., "My greatest desire is to learn as much as I can in the classroom") and PAGs (e.g., "During my studies, my biggest worry is that people think I'm stupid"), were analyzed in this study. The scale is a 5-point score from one to five, for strong disliking and strong liking. A relatively high rating shows a greater tendency to adopt this type

of achievement goal [47-58]. The dependability and legitimacy of the scale have been confirmed in existing studies. The Cronbach's α in this study was 0.92. The scale consists of 29 questions covering the three aspects: support from teachers ("Teachers accept I can get along admirably"), support from peers ("Peers are caring people") and opportunities for autonomy ("Teachers ask understudies what they need to find out about"). The scale is a 4-point score from one to four, for never and always. A relatively high rating demonstrates a better experience of the campus environment. There are seven inquiries on the scale that require reverse scoring (e.g., "Some students bully other students"). The dependability and legitimacy of the scale have been confirmed in existing studies [54-62]. The Cronbach's α in this study was 0.84. The Academic Efficacy Scale is made up of five questions (e.g., "Although the task is difficult, I believe I can learn"). The scale is a 5-point score from one to five, for strongly disagree and strongly agree. A relatively high rating demonstrates more elevated levels of ASE. The dependability and legitimacy of the scale have been confirmed in existing studies [1-12]. The Cronbach's α in this study was 0.83. The Study Engagement Scale is made up of a 17-item scale covering three aspects: vitality (e.g., "When I wake up in the morning, I like to go to class"), dedication (e.g., "I am proud in my learning") and absorption (e.g., "I get addicted to learning"). The scale is 7-point score from one to seven, for never and always. A relatively high rating indicates more elevated levels of academic engagement. The dependability and legitimacy of the scale have been confirmed in existing studies [13-27]. The Cronbach's α in this study was 0.95. The subjects of this study are human beings so we have followed the Declaration of Helsinki and its modifications. Casestudy, has been informed of and agreed to this study. Prior to the launch of the study, subjects were informed of the purpose of the study, the time required to complete the scale and the confidentiality of the data. To ensure that the nature of this study was clear to the undergraduates, they signed informed consent to participate in the study [28-33].

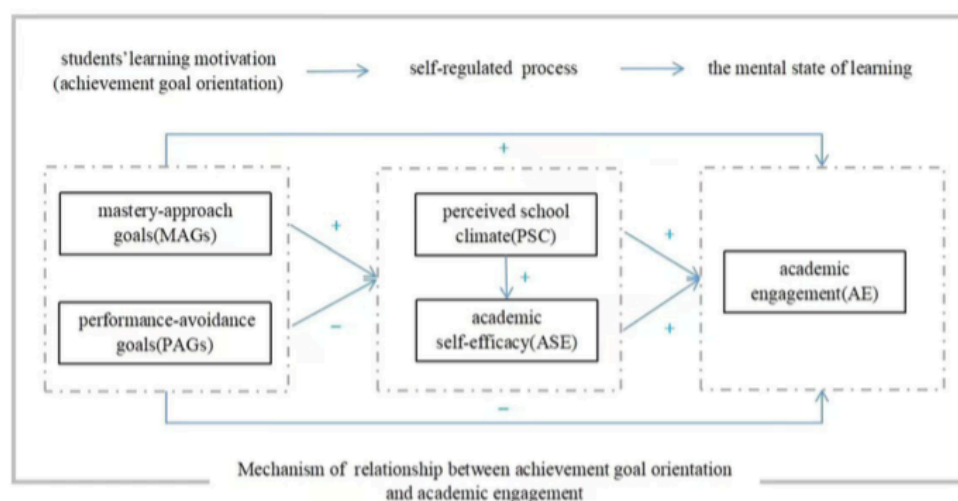


Figure 1. Conceptual model.

4.0 RESULT

Learning in a university environment can be a challenge, as students will often need to self-adjust to keep themselves learning at their best. This process of self-adjusting in learning is influenced by motivation. Motivation to learn is largely influenced by achievement goals, and it is evident that goal orientation is an important influencing factor in student immersion in learning. The results of this study demonstrate this, as MAGs and PAGs positively associated and predicted AE. In the results of the pathway model analysis based on the Bootstrap method, it was found that the immediate impact of MAGs on AE was most prominent. The circuitous impact of PAGs on AE was also significant, though the results show that MAGs were more beneficial to students' AE compared to PAGs. On the one hand, the positive predictive effect of MAGs on AE is consistent with previous studies [1-17]. MAGs enable students to focus on understanding and mastering the content of the course and developing their own competencies rather than exam results, and as a result, students have a more positive learning experience and are more likely to be driven by intrinsic motivation, positively predicting AE [18-26]. This positive learning experience is due to the fact that MAGs help students process more deeply the

learning content and evaluate and interpret the results of their own learning activities. However, the positive predictive impact of PAGs on AE is inconsistent with the results of existing studies [27-36]. PAGs are positively correlated with students' behavioral engagement, with PAGs demonstrating that students tend to choose tasks that are easy to succeed at in order to avoid appearing dumber than others, though still engaging themselves in the learning process [37-41]. In the current context of Chinese universities, where academic performance rankings still determine many aspects of students' honor and employment, PAGs become an inevitable prerequisite for students' behavioral engagement. The difference between MAGs and PAGs is encompassed by one's understanding when learning, which is what makes the direct effect of MAGs on AE greater than the indirect effect; MAGs make students see the learning content, school climate factors and personal factors as valuable resources, and students see the challenging learning task as an activity to improve their abilities and knowledge structure [42-49]. This prevents students from experiencing burnout, and the positive learning experience makes students more engaged in their learning. In contrast, the circuitous impact of PAGs on AE is more prominent than the immediate impact because students see learning tasks as difficult and often need to use external factors to help them regain motivation and confidence in learning, accumulate learning resources and promote AE. As a distal factor, PSC can regulate the mechanism by which MAGs and PAGs affect AE. MAGs and PAGs can indirectly affect AE through PSC, which is consistent with previous findings [50-57]. Students influenced by mastery goals rated the learning environment more positively, indicating that they had a more positive learning experience. Students get along well with their teachers and peers, which helps them become motivated to learn. Students oriented towards performance goals prefer overt assessment by teachers, while those oriented towards avoidance goals do not like challenging learning tasks [54-62]. MAGs help students retain and construct resources (such as interest and motivation to learn) and a willingness to invest more psychological costs. However, the study also found that PAGs positively predict PSC, which is different from existing research [1-14]. A possible explanation is that PAGs make students lose internal personal resources, such as interest and motivation to learn, which requires external resources (e.g., a positive school climate) to intervene in the loss of these resources, such as reducing the difficulty of learning tasks to avoid students losing confidence in learning. Only then is it more likely that learning tasks will be identified and valued. As a proximal factor, ASE similarly regulates the mechanisms by which MAGs and PAGs affect AE. The findings also show that MAGs and PAGs indirectly affect AE through ASE, which is consistent with previous findings [15-28]. Students influenced by mastery goals are more able to complete tasks, promote engagement in learning and are more likely to achieve if they are confident in their learning [18-27]. MAGs help students to see challenging learning tasks as activities to refine their knowledge structure, enhance their abilities and believe that they can cope with any learning task. This means that ASE is enhanced, allowing students to demonstrate greater psychological resilience and dynamism, providing the prerequisites for engaging in learning tasks [28-36]. However, PAGs positively predicted ASE, and thus, indirectly, positively predicted AE through ASE, which is different from existing studies [37-44]. One possible explanation is that PAGs make students avoid being inferior to others and easily feel pressured to learn, resulting in burnout, which in turn affects their commitment to learning. As a result, they have a greater need to seek help from teachers and peers to rebuild their confidence, which is a useful resource for ASE to get better. The interaction of distal and proximal factors also affects the mechanisms by which MAGs and PAGs influence AE. It was also found that MAGs and PAGs can predict students' AE through a chain-mediated interaction between PSC and ASE. According to studies, students' self-efficacy is influenced by four factors: past capable encounters, replacement encounters, verbal influence and biological and emotional states. The PSC can provide the basis for ASE enhancement. Specifically, results found that MAGs positively predicted AE through a chain mediation by PSC and ASE, which is consistent with existing research findings. For example, MAGs have been found to help students interpret teachers' intentions to stimulate behavior, develop students' critical thinking and motivate them to challenge themselves, whereby students will work harder at their studies and in turn the success of their learning experience will boost their confidence [45-53]. The present study also found that PAGs have a positive predictive effect on PSC, which is inconsistent with the existing literature. A possible explanation is that university students understand teacher support, peer support and self-directed support as different types of resources through the filter of MAGs and PAGs, but all contribute to the accumulation of resources for students. Resource accumulation under the influence of MAGs helps students to construct new resources for their personal competence development. That resource accumulation, under the influence of PAGs, reduces the pressure of learning tasks on students and improves their AE [54-62].

5.0 CONCLUSIONS

The findings of this study help teachers to focus on the differential needs of students with different goal orientations and to design a variety of learning tasks to ensure that each student gets the most out of their development. In addition, this study also reminds teachers and school administrators that they should be able to pay attention to students with good ASE but who have PAGs and take interventions so that they can guide students to change their PAGs—helping them build their MAGs. This study has the following three shortcomings. Firstly, the sample was selected from undergraduate students at a university in southwest Nigeria and it is unclear whether the findings can be generalized to universities in other parts of Nigeria, as well as to universities in other countries. Secondly, this study only examined the relationship between MAGs and PAGs with students' AE. Researchers can try to verify the impact of mastery-avoidance goals and performance-approach goals on AE to make this study more comprehensive to the four goal dimensions. Finally, this study lacks information from teachers, parents and others to accurately infer causal relationships between the variables. In future research, a mixed qualitative and quantitative research method can be used to provide a basis for the interpretation of causality through classroom observations and in-depth interviews which will help to reduce possible measurement bias. Further examination could involve testing whether the connection between achievement goal orientation, PSC, ASE and AE changes across time. In this study, we found that MAGs and PAGs could directly positively predict AE; indirectly positively predict AE via PSC; indirectly positively predict AE via ASE; could predict AE via the chain-mediated interaction of PSC and ASE. Overall, this study demonstrates how these goal orientations can be useful for students—this type of research should be expanded among other student populations and become more nuanced to understand more clearly how these goal orientations operate on AE. The results have implications for guiding students to improve AE levels through self-regulated learning based on achievement goal orientation, as well as implications for teachers and academic institutions on creating ways to better enhance these orientations among students to advance their AE.

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