The Psychological Frustration Resistance of Students with Sports Advantages in English Learning

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Abstract

To investigate the psychological resilience of students in the context of English learning, this research advocates for an examination of the psychological resilience among students who possess athletic advantages. The participants recruited for this study consist of third, fourth, and fifth-grade students enrolled at the primary school designated as the first experimental institution within a specific city. These participants exhibit normative levels of intelligence and lack any sensory impairments that could potentially hinder English language acquisition, thereby excluding factors of physical origin influencing English learning outcomes. Their psychological attributes are examined in detail. Based on their performance in the three mid-term and final examinations during the 2020-2021 academic year, students who consistently ranked below the 30th percentile of the entire grade across all three assessments are classified as belonging to the "learning disabilities group" in English language acquisition. Similarly, students who consistently ranked within the top 30% across the same assessments are identified as proficient English learners and form the "academic excellence group," serving as the comparison group. The assessment of emotional aptitude primarily revolves around two dimensions: English learning anxiety and resilience. This evaluation utilizes the "Elementary School Field Academic Emotion Questionnaire" and the "Resilience Scale." The latter comprises 26 items, with an internal consistency score of 0.866 and a standardized mean ($\bar{x}$) of 0.872, indicating robust reliability for application within this cohort. Students with English learning disabilities exhibit markedly lower cognitive and emotional abilities compared to academically proficient peers. Variances in cognitive and emotional abilities exist across different grade levels, as well as among students of different genders. The cognitive and emotional deficiencies observed in students with English learning disabilities are significantly associated with their learning challenges, indicating a reciprocal influence between cognitive and emotional abilities. Enhancing students' resilience can facilitate their adept navigation of challenges encountered in English learning, fostering heightened enthusiasm, a positive mindset, and enhanced efficacy in the English teaching process. Furthermore, students with athletic advantages may demonstrate elevated psychological resilience, enabling them to confront challenges and setbacks more effectively in the context of English learning. This, in turn, augments motivation, perseverance, and ultimately contributes to enhanced language proficiency.

Keywords: English Learning, Psychological Pressure Resistance, Ability.

Introduction

Resilience, defined as the capacity to confront and surmount difficulties and setbacks (Herrman et al., 2011), is integral to personal development, as growth often accompanies challenges that necessitate robust resilience for successful navigation (Lin et al., 2019). Individuals lacking resilience are susceptible to developing feelings of inferiority and diminishing morale when confronted with adversity. Hence, in primary school English education, it is imperative to bolster students' resilience to setbacks, as resilience plays a pivotal role in both enhancing English instruction and fostering students' overall development (Ravshanovna, 2020).

English, being a foreign language subject, presents distinct challenges compared to Chinese, including differences in vocabulary, grammar, thought patterns, and cultural nuances. Primary school students, typically possessing limited learning capacities, foundational knowledge, and cultural understanding in English, frequently encounter obstacles such as vocabulary retention, grammar comprehension, and apprehension towards English communication (Rupčić, 2021). Strengthening students' resilience equips them with the tools to navigate these challenges, persist in their English learning endeavours, and enhance the efficacy of English instruction.

Primary school students, undergoing a crucial phase of personal development, commonly face various difficulties and setbacks. Their limited resilience to setbacks renders them vulnerable to adverse effects, potentially leading to psychological issues (Hinduja & Patchin, 2017). Cultivating students' resilience in English learning fosters a positive and constructive approach towards setbacks, facilitating healthy growth and development. (See Figure 1).

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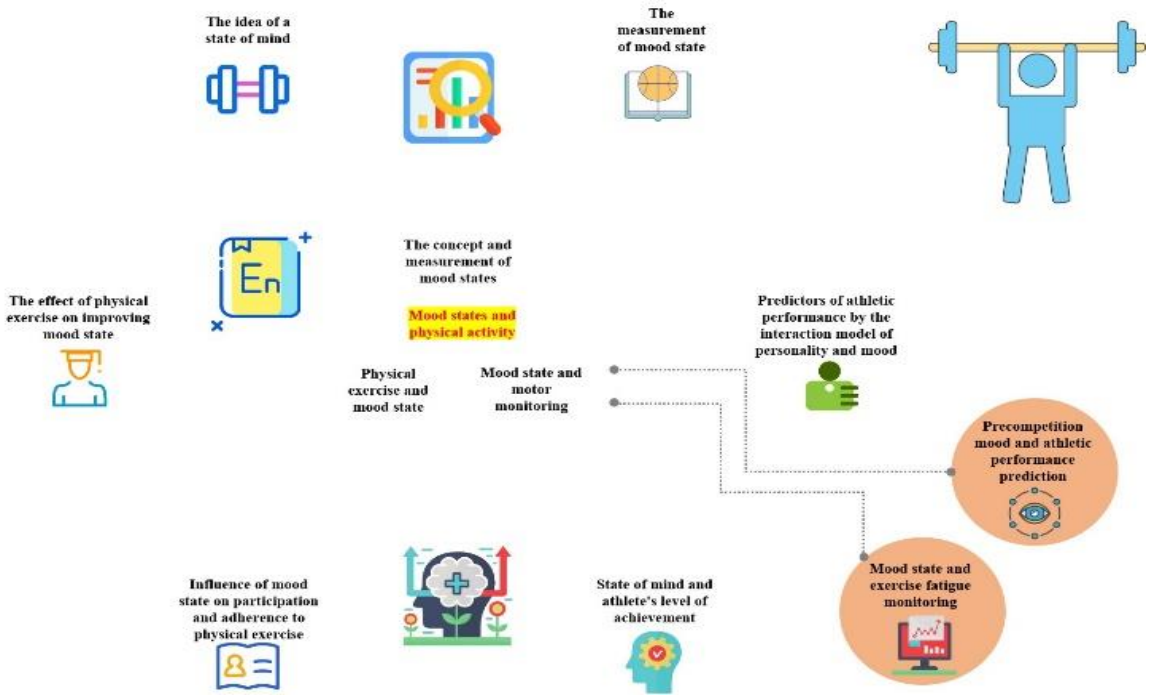

Figure 1: Psychological Resilience.

Reasons for Poor Resilience of Primary School Students

(1) High learning pressure

Primary school students exhibit limited psychological resilience, characterized by comparatively simplistic cognitive processes and susceptibility to external adversities. Moreover, there exists a widespread expectation among educators and parents for students to excel across moral, intellectual, physical, aesthetic, and practical dimensions. The inundation of various academic resources such as question banks, assessments, tutoring sessions, and extracurricular activities often overlooks the cultivation of students' holistic capabilities and interests. Consequently, children endure heightened academic pressures, resulting in elevated levels of mental stress and emotional dysregulation. In the face of occasional setbacks, students' inherently delicate emotional states and constrained resilience hinder their capacity to effectively navigate and overcome challenges (Al-Krenawi et al., 2021).

(2) Some parents dote on their children

In contemporary society, most primary school students are often raised as only children, receiving undivided attention and affection from their parents. Revered as "little emperors" or "little princesses" within their families, many have been shielded from harsh discipline, owing to the indulgence of their grandparents. This sheltered upbringing renders them akin to fragile flowers thriving in a protective environment, shielded from life's adversities. Consequently, in households where parental pampering is excessive, children may develop heightened emotional sensitivity. Even minor grievances can evoke feelings of injustice, and when confronted with setbacks, their resilience and capacity to endure hardships may be notably lacking.

(3) Inadequate anti frustration education in English learning

Amidst the relentless and competitive landscape of societal advancement, the demand for skilled individuals continues to escalate, necessitating self-reliance and resilience for survival amidst rigorous selection processes. While upper primary school students undergo mental maturation, the educational approach often prioritizes academic performance over deliberate cultivation of resilience, neglecting the development of students' emotional and cognitive capacities. In senior English instruction, educators may hesitate to introduce challenges to students, fearing potential demotivation or emotional strain, thus lacking a structured approach to fostering resilience. Consequently, many senior pupils frequently express dissatisfaction, succumb to resignation, and in severe cases, encounter challenges leading to mental health issues.

(4) Inconsistent and uncoordinated with family setback education

During this developmental phase, primary school students are commonly perceived as cherished individuals within their families, often likened to "little emperors" or "little princesses" and held in high esteem. Parents typically harbour the belief that modern advancements have fostered an environment conducive to children's welfare, striving to shield them from setbacks and meticulously crafting a path of ease. There

exists a prevailing parental sentiment that proficiency in recognizing the 26 English letters and the ability to recite textbook English vocabulary suffices for senior primary students, with an emphasis on Chinese language proficiency supplemented by English. However, this approach often overlooks the complexities inherent in English language acquisition, including the cultivation of psychological resilience necessary for effective learning.

(5) Some misunderstandings in psychological frustration education in English learning

Misconceptions surrounding current English resilience education at the primary school stage not only impede the cultivation of psychological resilience but also hinder the future development of students. Firstly, it's essential to distinguish between anti-frustration education and punitive measures. While punishment is corrective in nature, driven by the notion of dissuading students from repeating errors, anti-frustration education is pre-emptive and aims at enhancing overall student competence. Secondly, anti-frustration education should not be conflated with inducing distress. Some English educators mistakenly equate the enhancement of psychological resilience with exposing students to discomfort to learn from failure. Such an approach can lead to students' unclear self-perception and reduced confidence in their English language learning endeavours (Ling & Zahry, 2021).

Strategies for Cultivating Pupils' Resilience in English Learning

(1) Combining frustration resistance education with English teaching.

The integration of frustration resistance education and English teaching holds significant relevance, particularly when students encounter challenges comprehending English content, leading to feelings of frustration (Graham, 1997). Notably, there are parallels between the content of English instruction and frustration resistance education (Yang et al., 2021). English textbooks often feature narratives of overcoming obstacles and setbacks. Educators can enhance instruction by emphasizing these themes or incorporating English stories centred on resilience into classroom activities or post-class assignments. For instance, when teaching "My weekend plan," a teacher may introduce an English short article depicting a student named Xiao Ming who encounters difficulty understanding certain concepts during his weekend learning activities. Despite initial frustration and thoughts of giving up, Xiao Ming seeks assistance from his teacher and, with guidance, successfully completes his tasks, illustrating perseverance and problem-solving. Through such materials, students not only acquire English proficiency but also cultivate skills in addressing challenges, overcoming adversity, and embracing setbacks effectively.

(2) Improve the evaluation system of resilience.

To effectively foster students' resilience, it is imperative to establish a robust evaluation system as the foundational step. This system serves to identify students' areas of difficulty in comprehending and provides guidance for targeted training strategies. Teachers should engage actively with relevant theoretical content, refine the evaluation mechanism for resilience in accordance with classroom dynamics, and conduct thorough assessments of students' actual resilience levels (Cheon et al., 2021). By accurately pinpointing students' strengths and weaknesses in resilience, educators can tailor guidance to assist students in overcoming obstacles effectively. Traditionally, teachers assess students' resilience across three dimensions: endurance, resolution, and coping ability. These dimensions correspond to students' capacity to withstand setbacks and stress, resolve stress and anxiety, and navigate difficulties. Only students demonstrating proficiency across all three dimensions can be deemed to possess robust resilience. Conversely, students falling short in any dimension require tailored support and guidance within the context of English teaching. For instance, when teaching content related to "My school calendar," a teacher might intentionally present a class calendar on the blackboard featuring complex language. Subsequently, students are tasked with reading and memorizing the calendar contents, followed by a test to assess their problem-solving approaches, such as consulting a dictionary (Wang & Jiang, 2022). Through such exercises, teachers gauge students' resilience, resolution, and coping abilities.

(3) Enhance students' confidence based on classroom cooperation.

Classroom collaboration stands as a prevalent pedagogical approach in English instruction, particularly evident in dialogue exercises, where students frequently engage in cooperative endeavours to advance their English proficiency (Turgunova & Abdurahimovna, 2023). Indeed, cooperative learning represents an efficacious method for nurturing students' resilience in the face of setbacks. As the adage goes, "many hands make light work." Amidst learning challenges, some students may falter, unable to devise solutions or surmount obstacles independently. Through collaborative endeavours within the classroom, students engage in collective problem-solving, mutual encouragement, and collaborative task completion (Graves et al., 2021). Hence, in practical teaching contexts, educators should actively orchestrate opportunities for cooperative learning, fostering an environment wherein students can

independently learn and explore through collaborative engagement.

(4) Simulate adversity to guide students to effectively resist setbacks.

In the face of adversity, students demonstrate an enhanced capacity to cultivate resilience, prompting educators to incorporate simulated adversarial scenarios into teaching methodologies with the aim of guiding students towards effectively overcoming setbacks (Liu et al., 2022). For instance, in the context of teaching content related to "methods of commuting to school," a teacher might depict a schematic representation on the blackboard delineating various routes and modes of transportation to school, prompting students to contemplate the multitude of pathways available. Initially, students may offer responses that deviate significantly from the correct answers, despite earnest deliberation. However, even when exerting considerable mental effort, they may struggle to generate additional solutions. At this juncture, the teacher assumes a guiding role, leading students through a systematic analysis of various route combinations and facilitating their acquisition of accurate solutions in a methodical manner, thereby equipping them with the requisite skills to effectively navigate setbacks (Shi et al., 2023).

In light of the foregoing analysis, it is imperative to foster students' resilience in primary school English learning, a measure that holds positive implications for both enhancing the quality of English instruction and facilitating students' personal growth. To this end, primary school English educators should intensify efforts to cultivate students' resilience, integrating resilience education into English pedagogy, refining resilience evaluation systems, orchestrating collaborative learning activities to collectively confront setbacks, simulating adverse situations, guiding students in navigating setbacks effectively, and ensuring that students approach challenges with a constructive mindset.

The subjects under examination in this study comprise third, fourth, and fifth-grade students from the inaugural experimental primary school within a designated city. These students exhibit normal intelligence and lack sensory impairments, discounting physical impediments that may hinder English language acquisition. Their psychological profiles are analysed against the backdrop of academic performance data derived from three mid-term and final examinations during the 2020-2021 academic year. Students consistently ranking in the bottom 30% over this period are categorized as exhibiting English language learning disabilities (hereafter referred to as the "learning disabilities group"), while those consistently ranking in the top 30% are deemed proficient English learners (hereafter referred to as the "academic excellence group") for purposes of comparison.

Emotional aptitude is predominantly scrutinized through the lenses of English learning anxiety and resilience, utilizing the "Elementary School Field Academic Emotion Questionnaire" and the "Resilience Scale." The latter comprises 26 items, demonstrating commendable internal consistency ($\alpha = 0.866$) and a standardized mean ($\bar{x} = 0.872$), thereby affirming its reliability within this cohort.

Key findings gleaned from the study include:

(1). Substantial disparities in cognitive and emotional capacities between students with English learning disabilities and those exhibiting strong academic performance.

(2). Significantly varying cognitive and emotional proficiencies across different grade levels, albeit with certain exceptions.

(3). Observable gender-based differences in cognitive and emotional competencies.

(4). The pronounced correlation between deficiencies in cognitive and emotional abilities among students with English learning disabilities and their learning challenges, further compounded by a reciprocal influence between these dimensions. Elevating students' resilience equips them with the requisite tools to surmount obstacles encountered in English learning, fostering enthusiasm and a positive outlook, thereby enhancing the efficacy of English instruction.

Analysis of The Significance of Cultivating Pupils' Psychological Resilience in English Learning

(1) Helping to improve the comprehensive ability of primary school students

Renowned inventor Edison famously remarked, "Failure is also what I need, and it is as valuable to me as success." Cultivating resilience enhances the practical skills of primary school students. The development of English resilience in senior primary school students extends beyond classroom materials. Leveraging extracurricular resources, students gradually broaden their experiential horizons and enhance their overall abilities. Through the integration of frustration resistance education with English instruction, students acquire a nuanced understanding that adversity is conquerable through proactive engagement (Leng & Dai, 2021). Over time, with appropriate anti-frustration education, primary school students maintain a positive learning attitude in English, cultivate independence and self-reliance in personal endeavours, laying a sturdy foundation for subsequent academic pursuits in both primary and secondary education levels (Tillott et al., 2022).

(2) Helps to develop the mental potential and intelligence of primary school students

Psychological research findings indicate that moderate stress can trigger physiological responses, enhancing attention and responsiveness while fostering cognitive flexibility, facilitating better problem-solving capabilities. Within the realm of primary school English education, judicious application of psychological resilience education by English teachers can induce psychological and physiological shifts in students, prompting heightened interest and motivation to tackle challenges (Melguizo-Ibáñez et al., 2022)(Melguizo-Ibáñez et al., 2022). During the English learning process among primary school students, the provision of appropriate psychological resilience education by English instructors can incite notable psychological and physiological transformations, consequently engendering heightened interest and a proactive approach towards problem-solving (Tessier et al., 2010). In the realm of anti-frustration education, conventional modes of thinking often prove insufficient in navigating challenges (Park & Ramirez, 2022). Effective problem-solving necessitates the expansion of students' cognitive frameworks, the disruption of entrenched patterns in English learning, and the cultivation of innovative capacities. Anti-frustration education emerges as a potent tool for enhancing memory retention, particularly given the increasing demands for rote memorization among primary school students (Rahawi et al., 2021). Furthermore, by eliciting specific emotional responses, anti-frustration education can deepen memory consolidation and enhance memory retention efficacy.

(3) Helping to cultivate good psychological quality of primary school students

In the contemporary setting of a socialist market economy, the societal landscape and competitive dynamics are growing increasingly intricate. In the absence of anti-frustration education, students' risk being side-lined in their transition to higher education and future integration into society. Through collaborative efforts between teachers and parents, the implementation of frustration resistance education serves to fortify students' resolve, mitigating the propensity for extreme reactions stemming from performance-related pressures, external biases, societal influences, and other factors. This endeavour instils in students a steadfast commitment to maintaining a positive and optimistic outlook, enabling them to confront setbacks and failures resiliently, foster personal growth, harness their capabilities, and contribute meaningfully to the community (Mastrofini et al., 2021).

(4) It is beneficial for primary school students to correctly understand themselves

An excessively comfortable environment may foster detrimental behaviours among primary school students, including arrogance, selfishness, and a perception of themselves as flawless individuals. This environment often leads to a lack of self-awareness, manifested through overconfidence or complacency, hindering accurate self-assessment and exacerbating self-doubt in the face of minor setbacks. Moreover, students may exhibit a strong reliance on the protection and guidance of parents and teachers, indicative of significant dependence on others. Through anti-frustration education, primary school students can gain a nuanced understanding of their strengths and weaknesses, enabling them to effectively address their shortcomings.

Literature Review

Zhang Sizhong's theory of "psychological advantage" posits that in the realm of English instruction, fostering students' intellectual and non-intellectual attributes mutually reinforce each other (HE et al., 2023; Manchia et al., 2022). Prioritizing the cultivation of non-intellectual factors in English teaching to engender psychological advantages among students is deemed essential for significantly enhancing the quality of English instruction (Duan, 2022). Psychological advantage is characterized by a potent force in psychological endeavours, characterized by a resolute drive to pursue goals, accompanied by a robust inclination towards success, experiential success, and a deliberate pursuit of success to attain objectives (Lin, 2021). In the classroom context, psychological advantage entails the creation of conducive conditions for students, optimal utilization of concentrated time, and effective utilization of materials for listening, reading, and writing skills training, thereby achieving substantial gains within a scientific timeframe. This approach ensures that students at various proficiency levels derive benefits, surmount psychological hurdles, and sustain psychological advantages (Di, 2019).

Buzzai et al. (2021) explored how students' satisfaction and frustration of needs in educational settings indirectly impact academic performance through academic input. The study, involving 551 students (299 male, 252 female; mean age = 16.19 years, SD = 1.49), utilized a modified version of the basic psychological needs satisfaction and frustration scale. Results indicated significant positive associations between autonomy satisfaction and relatedness satisfaction with academic input, a significant negative association between autonomy frustration and academic investment, and subsequent improvements in academic performance. These findings underscore the importance of tailored training programs to foster school

environments attuned to students' psychological needs (Buzzai et al., 2021).

Goegan and Daniels (2022) investigated satisfaction and frustration in self-efficacy, fatigue, and burnout among students with and without learning disabilities, utilizing online course surveys for junior college students. Differences between students with learning disabilities and their typical peers were examined, with basic psychological needs satisfaction and frustration serving as predictors of self-efficacy, fatigue, and burnout. Recommendations were proposed from a broader perspective of learning design.

Conversely, the psychological dimension of resilience against frustration assumes a pivotal role in students' educational trajectories, particularly within the domain of English language acquisition. Extensive research underscores the favourable effects of sports participation on various cognitive and behavioural facets, encompassing enhanced self-esteem, self-discipline, and perseverance. scholars posit that these psychological attributes fostered through engagement in sports activities may bolster students' capacity to effectively manage frustration and confront challenges in academic settings, including English language learning. For instance, Hanna et al. (2017) observed heightened levels of frustration resilience among athletes compared to non-athletes, which positively correlated with their academic achievements. Additionally, Sullivan et al. (2023) noted that student-athletes exhibited greater resilience and adaptability when encountering academic setbacks, hinting at a plausible association between sports-related advantages and psychological resilience against frustration in educational milieus.

In another investigation, psychological variables such as motivation and goal establishment have received extensive attention in literature examining the correlation between athletic advantages and academic attainment (Golby & Wood, 2016). In the context of English language acquisition, where perseverance and sustained commitment are indispensable, the self-motivation and goal-oriented mentality cultivated in athletes could prove advantageous. Research suggests that children who excel in sports may exhibit heightened levels of intrinsic motivation owing to their enjoyment and fervour for physical activities, potentially transferring to their English language learning endeavours. For instance, Hogan et al. (2018) illustrated that athletes displayed elevated levels of intrinsic motivation in academic endeavours, which positively impacted their language acquisition outcomes. Moreover, goal-setting techniques commonly embraced by athletes, characterized by the establishment of specific and measurable objectives, have been associated with enhanced performance and could potentially fortify students' psychological resilience against frustration in English language learning. This assertion finds support in the research findings of Tso et al. (2020), who identified a positive correlation between goal-setting behaviours and academic success among student-athletes.

Prior research underscores a plausible link between sports advantages and students' psychological resilience against frustration in English language acquisition. The literature reviewed suggests that individuals with athletic prowess may exhibit heightened levels of frustration resistance, motivation, and goal-setting abilities, thereby potentially enhancing their proficiency in English language learning. Nonetheless, additional investigations are warranted to elucidate the precise mechanisms underpinning these associations and to devise pragmatic interventions harnessing sports advantages to foster psychological resilience and achievement in English language acquisition. Thus, building upon prior research, the present study aims to investigate the psychological frustration resistance among students endowed with sports advantages in the context of English learning.

Methodology

The participants selected for this study comprised third, fourth, and fifth-grade students from the primary experimental school in an urban area. These students exhibited normal intelligence and lacked sensory impairments, ensuring the exclusion of physical factors that could impede English learning. The selection criteria were based on the performance of students in three mid-term and final exams during the 2020-2021 academic year. Those consistently ranking below the 30th percentile was categorized as the "learning disabilities group," while those consistently ranking in the top 30% were categorized as the "academic excellence group" for comparison purposes. Excluding factors such as illness-related absences and school transfers, a total of 400 third-grade students, 300 fourth-grade students, and 290 fifth-grade students participated in the three academic exams. The top and bottom 30% of each grade were then screened based on their average rankings across the three exams. Consequently, the academically good group comprised the top 30% of students, while the academically poor group comprised the bottom 30% across the three exams. Subsequently, 60 students from the third grade (30 boys and 30 girls) and 65 students from the academically poor group (47 boys and 18 girls) were selected. Similarly, 40 students from the fourth grade (20 boys and 20 girls) and 56 students from the academically poor group (48 boys and

8 girls) were chosen. Additionally, 40 students from the fifth grade (20 boys and 20 girls) and 52 students from the academically poor group (37 boys and 15 girls) were selected. The total sample size comprised 313 students, including 140 students in the academically good group and 173 students in the academically poor group. Among these, there were 202 boys and 111 girls, with 125 students from the third grade, 96 students from the fourth grade, and 92 students from the fifth grade.

Research Content and Tools

Through the examination of the aforementioned factors contributing to academic disabilities, it becomes evident that various factors and their interplay contribute to this phenomenon. This study primarily delves into psychological traits encompassing cognitive and emotional capacities. Cognitive prowess is assessed through two dimensions: memory and attention, evaluated via the forward-backward recall test and attentional blink task, respectively. Emotional aptitude is scrutinized across two facets, specifically, English learning anxiety and resilience, utilizing the "Primary School Students' Academic Emotion Questionnaire" and the "Resilience Scale" devised by Yu Xiaonan. The "Anti-Frustration Ability Scale" comprises 26 items, demonstrating an internal consistency coefficient of 0.866 and a standardized coefficient of 0.872, thereby establishing its reliability for use within this demographic.

The English iteration of the "Primary School Domain Academic Emotion Questionnaire" encompasses a total of 38 items, exhibiting an internal consistency coefficient of 0.874 and a standardized coefficient of 0.872. This reliability renders it suitable for utilization within this demographic for testing purposes.

Research Process

Between May and June 2020, two examination papers and two scales were administered to both the academically proficient group (comprising 140 individuals) and the academically challenged group (comprising 173 individuals), organized into six centralized examinations delineated by grade and group. Prior to the examinations, thorough explanations were provided to alleviate any concerns among individual students. Detailed descriptions of the testing methodology and filling criteria were elucidated.

Memory Test

This assessment involves tasks assessing forward digit span in short-term memory and backward digit span in working memory. The forward and backward tasks entail the following procedure: In a tranquil indoor testing environment, the instructor audibly recites a series of numbers (commencing with two digits) at a consistent pace. The student then repeats the sequence, and if accurately reproduced, proceeds to the subsequent sequence containing an additional digit. If an error occurs, the instructor reiterates the current sequence (with altered numerical content). If two consecutive errors are made, the test is terminated. The score is determined by the number of sequences successfully recalled by the student.

Backward Task

During a calm indoor examination, the instructor meticulously dictates a sequence of numbers (initiating with two digits) at a consistent pace. Students are tasked with reciting them in reverse order, and upon correct recitation, they proceed. Subsequently, the instructor advances to reciting three numbers, and so forth. If errors arise, the instructor reiterates the current number of digits (utilizing different numerical values). Should two consecutive errors transpire, the examination ceases. The student's score is determined by the number of sequences accurately recited. Both the forward and backward scoring data are documented in Excel spreadsheets and subsequently imported into SPSS software for analysis.

Assessment of English Learning Anxiety

This study utilizes the English domain subset questionnaire from the "Primary School Student Domain Academic Emotion Questionnaire" to evaluate English learning anxiety. The questionnaire comprises 38 items designed to assess students' psychological states during English learning sessions. These encompass affirmative inquiries concerning feelings of happiness, relaxation, and affirmation, alongside negative queries pertaining to anxiety, confusion, stress, aversion, guilt, and helplessness. Each question offers five response options: "1. Completely inconsistent with your actual situation", "2. Relatively inconsistent with your actual situation", "3. Unclear", "4. Relatively consistent", and "5. Completely consistent". Positive questions are scored from 1 to 5 points, while reverse-scored questions are scored from 5 to 1 point. The cumulative score of all 38 items yields the total English learning anxiety score. Higher scores indicate lower levels of anxiety and more positive emotional states during English learning, whereas lower scores suggest heightened anxiety and more negative emotions. Scores for each question and the English learning anxiety scores are recorded in an Excel spreadsheet and subsequently imported into SPSS software for analysis.

Anti-Frustration Ability Scale

This study employs the "Anti Frustration Ability Scale" developed by Xiao Nan et al. The scale comprises 26 items, such as "I am capable of effectively handling various life changes" and "Even when facing adversity, I can maintain a calm demeanour." Students are prompted to assess their positive psychological disposition when confronted with pressure, challenges, and difficulties. Response options range from "extremely inconsistent" to "very consistent", with corresponding scores from 0 to 4 points. The cumulative score across all items yields the total anti-frustration score. Scores for each question and the overall frustration resistance scores are recorded in an Excel spreadsheet and subsequently imported into SPSS software for further analysis.

Test Summary

Following six centralized filling tests, an equal number of questionnaires were distributed and collected. Subsequently, the data was gathered to constitute the initial dataset for both the academically proficient and academically challenged groups. This data was then imported into SPSS software for the subsequent stages of data summarization and analysis.

Data Analysis and Results

This research employs SPSS software to conduct data analysis. An "independent sample t-test" is utilized to determine whether a noteworthy difference exists between the two student groups regarding cognitive ability scores (front-to-back, attention to accuracy) and emotional ability scores (English learning anxiety, resilience). Additionally, a "correlation analysis between two variables" is employed to assess potential correlations between cognitive ability scores, emotional ability scores, and exam scores, as well as between cognitive ability scores and emotional ability scores. Furthermore, gender and grade differences are examined.

Data Analysis Results of Two Groups of Students' Cognitive Abilities (Front Back-to-Back, Attention to Right and Wrong)

Table 1

Performance of the English Language Learning Disability Group and The Academic Excellence Group in Cognitive Tasks.

	Academic Disability Group		Academic Excellence Group			
	M	SD	M	SD	T	P
Recitation in Positive Order	7.6	0.956	8.7	1.2	10.487	0
Recitation in Reverse Order	3.4	0.667	4.5	0.9	11.36	0
Pay Attention to Cancellation	65	19	86	13	11.37	0

Table 1 illustrates that the academically proficient group outperforms the academically deficient group across front, back, and attention measures, with a notable discrepancy between the maximum and minimum values. Furthermore, a subsequent T-test confirms significant disparities between the academically proficient and deficient groups in front-to-back ($t=10.487$, $p<0.001$), back-to-front ($t=11.36$, $p<0.001$), and attention ($t=11.37$, $p<0.001$). Thus, a substantial variance in cognitive ability is evident between the academically proficient and deficient groups.

Data Analysis Results of Emotional Ability (Anti Frustration Ability, English Learning Anxiety) of Two Groups of Students

Table 2

Performance of English Learning Disabilities and Good Academic Achievements in Emotional Tasks.

	Academic Disability Group		Academic Excellence Group			
	M	SD	M	SD	T	P
English Learning Anxiety	130	15.3	155	14	17	0
Resilience	59	11	74	11	13	0

Table 2 reveals that the academically adept cohort exhibits superior scores in resilience and emotional factors compared to their academically challenged counterparts, suggesting a preliminary association between academic proficiency and emotional well-being. Notably, the disparity between the maximum and minimum values is considerable. Additionally, a subsequent T-test underscores significant discrepancies in anti-frustration ($t=13$, $p<0.001$) and emotional dimensions ($t=17$, $p<0.001$) between the academically proficient and deficient groups, indicating a substantial variance in emotional competence between the two cohorts.

Table 3

Test for Differences in Cognition and Emotion Between Men and Women.

	Male		Female			
	M	SD	M	SD	T	P
Recitation in Positive Order	8.04	1.15	8.42	1.26	-2.1	0.06
Recitation in Reverse Order	3.82	0.95	4.06	1.008	-2.2	0.26
Pay Attention to Right and Wrong	73	19	78	20	-2.21	0.31
English Learning Anxiety	138	20	148	19	-4.6	0
Anti-Frustration	62.3	12.82	69	12.5	-5.1	0

Table 3 demonstrates notable gender disparities in both cognitive and emotional domains, with boys exhibiting relatively inferior performance compared to girls. This is evidenced by the negative t-values, indicating that boys' average scores across each item are lower than those of girls.

Differences in Cognitive and Emotional Abilities Between Different Grades

Table 4

Difference Test of Cognition and Emotion Among Different Grades

	Grade 3		Grade 4		Grade 5			
	M	SD	M	SD	M	SD	F	P
Recitation in Positive Order	7.8	1.1	8	1.26	8.85	1.12	20	0
Recitation in Reverse Order	3.69	0.9	3	1.1	4	0.91	5.9	0.003
Pay Attention to Right and Wrong	70	13	72	21	80	21	8	0
English Learning Anxiety	144	18	136	22	143	21	3.94	0.021
Anti-Frustration	63.3	12	65	15	69	12	5.7	0.005

As can be seen from Table 4, there are differences in some cognitive and emotional abilities among grades, with the main effect being that higher grades are higher than lower grades. The items with significant differences in the post test are: front back scores, which are better in fifth grade than in third grade, and fourth grade than in third grade; The fifth grade scored better than the third grade in backtracking; English learning anxiety scores (the higher the score, the less anxiety) were higher in grade three than in grade four, and higher in grade five than in grade four; The score of anti-frustration ability in grade 5 is better than that in grade 4, and that in grade 5 is better than that in grade 3. The remaining unlisted items indicate that there is no significant difference between grades (Schneider, 2021).

Correlation Results

This article further analyzes the correlation between cognitive ability and English academic performance, emotional ability and English academic performance, and cognitive ability and emotional ability, respectively.

This study uses the Pearson correlation analysis method of two variables in the correlation analysis module of SPSS software. The correlation analysis between cognitive ability and English academic performance, emotional ability and English academic performance, and cognitive ability and emotional ability is shown in Table 5. Cognitive abilities include facing backwards and paying attention to right and wrong; Emotional abilities include English learning anxiety and resistance to frustration; The English academic achievement is the average of three grades.

From Table 5, it can be seen that there is a significant positive correlation between the three dimensions of cognitive ability, namely, positive memorization, reverse memorization, and attention, and English academic performance (the probability of significance is less than 0.01). Therefore, in a certain sense, it can be speculated that the better a student's cognitive ability, namely, positive memorization, reverse memorization, and attention performance, the better their academic performance will be Conversely, students' academic performance will be worse.

There is a significant positive correlation between the two dimensions of emotional ability, namely resilience and English learning anxiety, and students' academic performance (the probability of significance is less than 0.01). Therefore, to some extent, it can be inferred that the better a student's emotional ability, the higher their academic performance will be. On the contrary, their academic performance is relatively low.

There is a significant positive correlation between the two dimensions of emotional ability (resilience and English learning anxiety) and the three dimensions of cognitive ability.

Table 5

Relevant Analysis Table.

	Academic Performance	Recitation in Positive Order	Recitation In Reverse Order	Pay Attention to Right and Wrong	English Learning Anxiety	Anti Frustration
Academic performance						
Recitation in positive order	0.42					
Recitation in reverse order	0.46	0.41				
Pay attention to right and wrong	0.53	0.35	0.34			
English Learning Anxiety	0.58	0.42	0.36	0.35		
Anti frustration	0.49	0.44	0.36	0.38	0.56	

Discussion

The cognitive and emotional capacities of students experiencing English learning disabilities exhibit marked disparities compared to those of students demonstrating strong academic performance. Notably, the deficiency in cognitive and emotional capacities among students with English learning disabilities correlates significantly with their learning impairments, suggesting a bidirectional relationship between these factors.

Analysis of test data reveals notable discrepancies between the two groups across cognitive dimensions (memory and attention) and emotional dimensions (anti-English learning anxiety and resilience). Specifically, students with poor academic performance exhibit significantly lower scores in these dimensions compared to their academically proficient counterparts.

Attentional capacity serves as a fundamental underpinning for effective information processing and learning. Test results from attentional cancellation tasks indicate that students with academic disabilities struggle to sustain high-quality attention over extended durations, resulting in diminished accuracy in information acquisition. Consequently, their information processing efficacy lags behind that of students with strong academic performance. Empirical observations in teaching settings further validate this, as students with learning disabilities often exhibit lower retention of taught material compared to their peers, leading to instances where teachers encounter discrepancies in students' knowledge recall during post-class reviews.

Memory function plays a pivotal role in students' ability to consolidate and retrieve information. Test outcomes from memory recall tasks reveal a significant decline in memory retention among academically challenged students as memory load and recall intervals increase. Consequently, their ability to retain information is notably weaker compared to academically proficient peers. Despite repeated emphasis on teaching content in classroom instruction, students with learning disabilities often exhibit inaccuracies in exam responses, despite acknowledging familiarity with the material during subsequent tutoring sessions.

In sum, these findings underscore the intricate interplay between cognitive and emotional abilities and their impact on academic performance among students with English learning disabilities, necessitating tailored interventions to address these challenges effectively. Teaching experiences align with Swanson's findings, indicating a strong correlation between working memory performance and academic abilities, particularly in reading. Consequently, students with learning disabilities often struggle with memory tasks, hindering their comprehension and retention of English teaching content during basic education. This leads to difficulties in remembering words, texts, pronunciation, and grammar, ultimately reflected in their exam scores. Poor attention spans, distractions, and delayed homework further impede effective learning outcomes in various aspects of classroom instruction.

These cognitive challenges subsequently give rise to anxiety, feelings of inferiority, and avoidance behaviours among students. Their inability to cope with setbacks in English learning exacerbates psychological distress, resulting in a further decline in academic performance. This is evidenced by questionnaire responses indicating a higher prevalence of negative sentiments, such as burnout

and perceived difficulty in learning English, among students with learning disabilities compared to their academically successful peers.

The interaction between cognitive and emotional abilities exacerbates these challenges. Emotional downturns impede students' adoption of positive attitudes and effective learning strategies, while cognitive deficiencies erode self-confidence, exacerbating emotional distress. This is evident in questionnaire responses, with a higher proportion of students with learning disabilities choosing negative responses compared to their academically proficient counterparts.

Survey findings indicate that students with English learning disabilities exhibit significantly lower cognitive abilities (memory, attention) and emotional abilities (anti-English learning anxiety, resilience) compared to their academically proficient peers. Moreover, there exists a correlation between cognitive and emotional abilities and academic performance. To address English learning disabilities and enhance academic outcomes, English teachers should prioritize training and improving students' memory, attention, anti-English learning anxiety, and resilience within the English teaching process (Fu et al., 2021).

Implications and Future Recommendations

The research carries significant implications, particularly concerning students with athletic backgrounds, and their associated rewards. Theoretically, this study contributes to the advancement of our comprehension regarding the correlation between psychological stress and English proficiency, particularly within the demographic of students possessing athletic affiliations. By scrutinizing the capacity for psychological stress resilience, the research adds to the existing body of literature on determinants impacting language acquisition outcomes, illuminating the intricate interplay between psychological fortitude and academic achievement.

From a practical standpoint, the findings hold manifold implications. Foremost, the research can enlighten educational institutions and educators on the imperative nature of addressing psychological stress within the English learning milieu, particularly among students endowed with athletic prowess. It offers insights into efficacious strategies and interventions aimed at bolstering students' resilience and coping mechanisms, thereby fostering enhanced English language acquisition outcomes. Furthermore, the outcomes can inform the formulation of targeted support initiatives and resource development to aid students in adeptly managing and navigating psychological stressors. Ultimately, the practical ramifications of this study contribute to refining English language education by acknowledging the pivotal role of psychological well-being and resilience in the learning trajectory. These implications underscore the significance of students' psychological stress resilience in English language acquisition, particularly within the context of athletic advantages.

Despite its significant contributions, the research also offers practical implications that may enrich future investigations in this emerging field. Initially, the study's limitation to a singular country precludes its generalizability to nations characterized by diverse cultural and environmental contexts. Consequently, future inquiries may explore alternative geographical settings or economic landscapes to broaden the scope of understanding. Secondly, employing a mixed-methods approach encompassing both qualitative and quantitative methodologies could enhance the research's generalizability by providing a more comprehensive understanding of the phenomena under scrutiny. Lastly, the adoption of longitudinal research designs in forthcoming studies holds promise for augmenting generalizability by tracking developments over time, thereby offering insights into the dynamics of the subject matter across diverse contexts.

Conclusion

Students with English learning disabilities demonstrate markedly lower cognitive and academic emotional abilities compared to their academically proficient peers. Significant variations exist in cognitive and emotional capacities across different grades and genders, with some exceptions. Deficiencies in cognitive and emotional abilities among students with English learning disabilities correlate significantly with their learning challenges, indicating a reciprocal relationship between cognitive and academic emotional abilities. Effective primary school English teaching entails guiding students in handling setbacks, fostering interest and confidence in English learning, and enhancing overall teaching quality. Achieving a cohesive integration of English subject instruction and resilience education necessitates theoretical and practical exploration by English teachers. This involves instilling a deep understanding of English learning, fostering confidence and perseverance, engaging students through stimulating teaching materials, nurturing positive teacher-student relationships, and judiciously employing multimedia resources. Recognizing and acknowledging students' incremental progress promptly is crucial for cultivating psychological advantages in English learning, constituting essential strategies for effective English instruction.

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