



Psychological fluency and its relationship to athletic achievement motivation among fourth- stage students at Faculty of Physical Education and Sports Sciences, Kirkuk University

¹Ali Burhan Hawar*

*Corresponding Author, E-mail:aliburhan@uokirkuk.edu.iq

¹Faculty of Physical Education and Sports Sciences, Kirkuk University

Abstract

The research aims to studying relationship between psychological fluency and athletic achievement motivation among fourth-stage students in Faculty of Physical Education and Sports Sciences, understanding nature of relationship between psychological fluency and achievement motivation and their impact on improving students' athletic and academic performance. The researcher used descriptive method with a correlational approach, as it suited nature of research. Sample consisted of a group of fourth- stage Evening shift students at Kirkuk University, Faculty of Physical Education and Sports Sciences, for academic year 2025-2026, totaling 29 students. The sample consisted of 25 students after excluding 4 students for pilot study. The sample size from total population reached 86.206%. The researcher used Psychological Fluency Scale, consisting of 80 items, as well as Sports Achievement Motivation Scale, consisting of 20 items. Statistical tools were used using Statistical Analysis Program (SPSS). In order to provide a clear and comprehensive explanation of research results, the researcher presented, analyzed, and discussed results based on research objectives. From results of research, the researcher concluded a significant correlation exists between psychological fluency and athletic achievement motivation among sample, importance of psychological fluency as an effective psychological variable in influencing student behavior, role of university environment in developing psychological fluency positively impacts student motivation, integrating psychological and training programs that enhance psychological fluency and improve achievement motivation. In light of results, the researcher recommended need to conduct future studies that address additional variables for a broader understanding of psychological relationships affecting achievement motivation among physical education and sports science students, designing psychological training programs aimed at developing psychological fluency among students, given its role in raising motivation for athletic achievement, adopting findings to develop university educational curricula, urging educational and sports institutions to provide a supportive environment for psychological fluency through activities.

Keywords: Psychology, Psychological Fluency, Athletic Achievement Motivation, Kirkuk

Introduction

Modern psychology has become one of fundamental pillars in development of various educational, training, and sports fields, due to its pivotal role in building individual's personality and achieving psychological balance. Advanced societies have realized importance of this science, and have made psychological stability an essential element in supporting their educational system, based on fact that education represents basic foundation for any civilizational renaissance. In light of this, physical education is viewed as one of vital fields that requires integration of psychological aspects with skill and knowledge to achieve optimal performance. Many specialists in field of physical education have indicated that development in this field must be built on a deep understanding of goals and content of teaching, in addition to relying on effective methods that enhance students' psychological and physical abilities alike.

Among contemporary psychological concepts that have begun to gain increasing attention in field of sports psychology is concept of psychological fluency, which represents a state of positive internal interaction in individual, and enhances self-confidence and ability to express potential in a manner consistent with himself. The researcher believes that psychological fluency contributes to stimulating player's motivation towards better performance, especially when it stems from his awareness of skills in comparison with others. Motivation for athletic achievement, it is one of the most important variables affecting the player's behavior and is directly reflected in desire to achieve excellence, win and reach the highest levels.

Importance of the current research emerges through its endeavor to reveal relationship between psychological fluency as one of positive indicators of psychological state of fourth-stage students in faculty of Physical Education and Sports Sciences and motivation for athletic achievement, which is one of foundations that contribute to their reaching optimal athletic performance. Through this relationship, scientific insights can be provided that contribute to supporting educational and training process alike.

Psychological fluency and motivation are among key psychological factors that affect performance of physical education and sports science students, especially in fourth stage, which represents a crucial stage in their academic and athletic career. Despite importance of these two variables, relationship between psychological fluency and achievement motivation has not been adequately studied in Iraqi university environment. Therefore, this research aims to study extent of relationship between these two variables among fourth-stage students at faculty of Physical Education and Sports Sciences at Kirkuk University in order to understand their mutual impact and to enhance psychological and sports programs that support their performance.

Research Objectives to study relationship between psychological fluency and achievement motivation among fourth-stage students at faculty of Physical Education and Sports Sciences at Kirkuk University in order to understand nature of this correlation and its impact on improving athletic and academic performance of students. Analyzing relationship between psychological fluency and achievement motivation among students of faculty of Physical Education and Sports Sciences at Kirkuk University, in order to highlight extent of impact of this relationship in

providing scientific foundations to support and develop psychological and educational programs in sports field.

Research Hypothesis there is a significant positive correlation between psychological fluency and athletic achievement motivation among fourth- stage students at faculty of Physical Education and Sports Sciences at Kirkuk University.

Terms definition

Psychological fluency: An ideal psychological state, as well as a state of positive experience, which the player can enjoy under any circumstances to participate in races.

Achievement Motivation in Sports: The player’s readiness to face competitive sports situations and to try to excel and be distinguished in light of a certain level or standard of standards or levels of excellence and distinction by showing a great deal of activity, effectiveness and perseverance as an expression of the desire to struggle and fight for excellence and distinction in competitive sports situations.

Research Methodology

The researcher used descriptive method with correlational relationships approach because it is suitable for nature of research problem and its objectives. Survey method collects data from individuals and communities to try to determine current state of society in a specific variable.

The research population consisted of (29) fourth-stage evening shift students at faculty of Physical Education and Sports Sciences, Kirkuk University, for academic year (2025-2026). The research sample consisted of (25) students after excluding (4) students from them due to their participation in pilot study. Sample percentage from total research population reached (86.206%). Table No. (1) illustrates this:

Table 1. Sample details

Research population	Excluded	Main sample
29	Exploratory experiment	25
100%	4	86.206%

The two scales used

Psychological Fluency Scale: Psychological Fluency Scale prepared by (Howaida Ismail Ibrahim, 2005) was adopted, consisting of (80) items with three alternatives: (I strongly agree, I moderately agree, I slightly agree) and weights of (1-3), as in Appendix (1).

Sports Achievement Motivation Scale: The scale adopted was (Rafe’ Idris Abdul Ghafour and others, 2013), consisting of (20) items with five alternatives: (very high, high, moderate, low, very low) and weights of (1-5) as in Appendix (2).

Scientific factors of the two scales

The two scales used for scientific factors were acquired by verifying following :

Reliability of the two scales: The test-retest method was used to confirm the reliability coefficient. The Psychological Fluency Scale and the Sports Achievement Motivation Scale were distributed to a sample from the research population outside the main research sample on Sunday, October 5, 2025. The two scales were then retested on Wednesday, October 15, 2025. The correlation coefficient between the first and second tests for each scale was found to be (0.88) for the Psychological Fluency Scale, while the correlation coefficient was (0.93) for the Sports Achievement Motivation Scale, which is a high value indicating that the two scales have a high degree of reliability.

Validity of the scale: The self-validity of the two scales was found by calculating the square root of the test reliability coefficient. The self-validity coefficient for the psychological fluency scale was (0.938), and its value for the mathematical achievement motivation scale was (0.964), which indicated that the two scales had acquired self-validity.

Objectivity of the two scales: The two scales used in the current research are highly objective in terms of the sample's ability to answer the items and their understanding of them. Based on this, it can be said that every test that is characterized by validity and reliability is an objective test because its objectivity contributes to ensuring the accuracy of its measurement and the reliability of its results.

Pilot Experiment

The pilot test was conducted on Wednesday, October 15, 2025 to confirm sample's ability to answer the two scales, time taken to answer, make sure you get accurate answers.

Main Experiment

The main experiment was conducted in halls of faculty of Physical Education and Sports Sciences on Thursday, 10/16/2025, on fourth-year evening students at faculty of Physical Education and Sports Sciences, Kirkuk University, for academic year (2025-2026), by distributing questionnaire forms to the students, with the exception of the exploratory experiment sample.

Statistical Methods

Methods are among the most important tools in data analysis, as they are used to draw conclusions and verify the validity of scientific hypotheses accurately and objectively. The data was processed using SPSS statistical package. Based on following mathematical laws (percentage, mean, standard deviation, numerator correlation coefficient).

Results

Statistical parameters of research variables shown in table 2.

Table 2. Statistical parameters of research variables

Variables	Measurement unit	M.	St.d	(r) value	Sig. value	Sig. type
Psychological fluency	Degree	189	4.222	0.911	0.013	Sig.
Motivation for athletic achievement	Degree	73	8.214			

Significant under level value < 0.05

Table (2) shows that mean of psychological fluency scale was (189) with a standard deviation of (4.222), while mean of athletic achievement motivation scale was (73) with a standard deviation of (8.214). Value of correlation coefficient (r) was (0.911), and significance level was (0.013), which is less than error ratio (0.05), indicating that there is a significant correlation between the two variables.

These results indicate that increase in students' levels of psychological fluency is directly related to their increased motivation for athletic achievement, which is consistent with what researchers in field of sports psychology have indicated, namely that a positive psychological state and ability to regulate psychological energy are among essential factors in motivating an individual to achieve outstanding athletic performance.

Discussion

Results highlight a significant correlation between psychological fluency and athletic achievement motivation among fourth-stage students at faculty of Physical Education and Sports Sciences. This correlation is attributed to fact that psychological fluency represents a state of psychological balance and ability to control feelings and emotions, which enhances students' ability to face athletic challenges with high confidence and increases their motivation towards achieving athletic success.

According to what was mentioned in sports psychology studies, ability to regulate psychological energy is a pivotal factor in success of training programs, as success is not limited to acquiring physical skills only, but depends largely on individual's psychological ability to control and manage his psychological energy. Theories indicate that state of psychological fluency and its regulation leads to the best state of mental readiness that allows players to achieve the best possible performance. Talal Najm Abdullah and Rafqa Mu'ayyad Saeed (2025) confirm that "psychological fluency contributes to athlete's immersion in performance, and this state is almost necessary for every athlete, as it enhances psychological abilities and increases efficiency in performing various skills". Yas Majid Dahash and Zeina Hadi Abbas (2024) add that people who possess psychological fluency can commit to duties in the most difficult circumstances in order to achieve the required goals.

Results also emphasize importance of focusing on psychological aspects when preparing and training athletes, as enhancing psychological fluency not only contributes to improving athletic performance but also works to raise motivation for athletic achievement, which leads to continued effort and excellence in athletic field. Accordingly, paying attention to psychological preparation programs that enhance psychological fluency and motivation for athletic achievement is one of fundamental pillars for achieving sustainable development in athletic performance.

Conclusions

The study results confirmed a significant correlation between psychological fluency and athletic achievement motivation. The results highlight importance of psychological fluency as an effective psychological variable in influencing student behavior within educational and training contexts. The results indicate that university environment plays an important role in developing psychological fluency, which positively impacts students' motivation to achieve personal, academic, and athletic goals. The researcher concludes that enhancing psychological fluency can be an effective approach to improving achievement motivation, which calls for integrating psychological and training programs that focus on developing this aspect within physical education and sports science curricula.

Recommendations

Need to conduct future studies that address additional variables for a broader understanding of psychological relationships affecting achievement motivation among physical education and sports science students. Designing psychological training programs aimed at developing psychological fluency among students, given its role in raising motivation for athletic achievement. Adopting research findings in development of university educational curricula. Urging educational and sports institutions to provide a supportive environment for psychological fluency through activities

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Appendix (1)

Psychological fluency scale

No.	Paragraphs	Alternatives		
		I strongly agree	I moderately agree	I slightly agree
1	I am confident of achieving my best performance despite the pressures of competition.			
2	I can endure anything that will bring victory over the opponent.			
3	I have the ability to focus in order to achieve victory.			
4	My concentration is weak at the beginning of the match.			
5	I can achieve my goals no matter how tough the competition.			
6	I am not afraid of my opponent's superiority during the competition.			
7	I can predict the outcome by observing the competitor.			
8	My performance improves in challenging situations.			
9	I enjoy a high degree of concentration during performance.			
10	I have the ability to recover from failure.			
11	I utilize my abilities during difficult situations.			
12	I had doubts about myself during the match.			
13	I perform most of the skills quickly and			

	automatically . organized			
14	The result of the match is distracting me, which is negatively affecting the outcome.			
15	I made mistakes in the match because I was focused on some tactical duties.			
16	I feel scared when my opponent outperforms me during a match.			
17	I feel unable to concentrate during the match.			
18	He made many mistakes when he lost the ability to concentrate.			
19	Many players on the team believe I am a very confident player.			
20	My skill performance lacks precision in competitions.			
21	I will do my best to turn around the result of the match we initially lost.			
22	I fear failing to achieve my best performance during the competition.			
23	I have personal goals that I strive to achieve in every match.			
24	I fear defeat at the hands of a weak opponent.			
25	The shouting of the crowd is distracting me.			
26	I feel my heart racing before I buy a ticket to the competition.			
27	I feel my body is tight during competition			
28	Act in difficult times			
29	I feel my body tense during the competition			
30	Give it your all in the competition			
31	The more important the match, the more I enjoyed the performance.			
32	I have the ability to focus in order to achieve victory.			
33	I have the ability to control my emotions in front of the competitor			
34	I control my emotions throughout the match or competition.			
35	I feel scared when a large audience is present.			
36	I control my emotions if I am subjected to a wrong decision by the referee.			
37	He handled the difficult moments of the match well.			
38	I feel I am doing my duty well			
39	It's easy to get me worked up during a match.			
40	A sense of excitement contributes to my performance in competition			
41	When things go wrong in a competition, I			

	don't give up easily.			
42	He has the ability to excel in performance during competition.			
43	I get nervous when certain important people see me.			
44	I feel the enjoyment while performing in the competition			
45	I'm not as interested in training as I am in competition.			
46	I immediately assess the situation in the game.			
47	My performance is inconsistent and fluctuating in important competitions.			
48	I feel the enjoyment of the intense match			
49	Reach peak performance in competitive skill			
50	I feel unwell before participating in the match.			
51	Public opinion worries me and distracts me.			
52	I feel comforted by the constant encouragement from the audience.			
53	Public criticism of my performance makes me lose focus.			
54	I work on ensuring my performance improves steadily from match to match.			
55	I find it difficult to master the skills.			
56	I am unsure of my athletic abilities and skills during the competition.			
57	My anxiety and distress increase when I think about the match.			
58	I am good at movements that require speed of execution.			
59	I am good at quickly analyzing the opponent's movements.			
60	I can compete in the game positively			
61	Feel mentally relaxed during the game or competition			
62	I eagerly await the competition.			
63	I can recall everything that happened in the game after the match ended			
64	I fear the possibility of getting injured in the competition.			
65	Before the important competition, I feel optimistic about winning.			
66	I am happy when I achieve my goals in the match.			
67	My performance in all competitions is consistently high and unchanging.			
68	I feel dissatisfied when participating in weak matches.			

69	ca n't control my emotions when a competitor bothers me.			
70	It's easy for me to lose my temper quickly if I lose at the beginning of a match.			
71	I feel bored, unmotivated, and unwilling to play during the competition.			
72	I can perform well in terms of physical movement at any point during play.			
73	I can adapt to unpredictable match circumstances			
74	I am happy when I achieve my goals in the match.			
75	I listen With the competition that challenges my abilities			
76	I feel anxious and stressed during crucial moments in competition.			
77	Stay calm when facing difficult situations			
78	I reached a high level of accuracy and precision on match day.			
79	Automatically dealing seriously with other players			
80	When the competition intensifies, I feel hesitant.			

Appendix (2)

Sports Achievement Motivation Scale

No.	Paragraphs	Alternatives				
		Very high	High	Moderately	Slightly	Very slightly
1	I find it difficult to try to sleep after my defeat in a competition.					
2	I admire the player who trains for extra hours to improve his level.					
3	When I make a mistake in my performance during a competition, I need some time to forget about the mistake.					
4	Excellence in sports is not one of my primary goals.					
5	I often feel fear right before I enter the competition.					
6	Enjoy taking on any task that other players might consider difficult.					
7	I fear defeat in the competition					
8	Luck leads to more success than effort.					
9	Sometimes when I lose a competition, it bothers me for several days.					

10	I am willing to train non-stop in order to succeed in my sport.					
11	I have no trouble sleeping the night before I participate in a competition.					
12	Winning the competition gives me a great deal of satisfaction.					
13	I feel nervous before a sports competition					
14	I prefer to rest from training in the period following the end of official competition.					
15	When I make a mistake in my performance, it exhausts me throughout the competition.					
16	I have a very strong desire to be successful in my sport.					
17	Before entering the competition, I don't preoccupy myself with thinking about what might happen in the competition or about its results.					
18	I try my best to be the best player					
19	I can remain calm in the moments immediately preceding the competition.					
20	My goal is to excel in my sport.					