

The Psychological Compatibility in Relation to Movement Satisfaction among Swimming Courses Students

Mohammad Al Dababseh^{1,*}, Khitam Ay², Maysaloun Alshadideh³, Bilal Saada⁴, Ibrahim Almahireh⁵,
Mohammad Abu Altaieb²

¹Department of Physical Education, School of Sport Science, The University of Jordan, Jordan

²Department of Kinesiology and Sport Training, School of Sport Science, The University of Jordan, Jordan

³Department of Physical Education, College of Education Sciences, Al-Bayat University, Jordan

⁴Ministry of Education, Jordan

⁵School of Sport Exercise and Health Science, Loughborough University, Jordan

Received February 13, 2023; Revised April 30, 2023; Accepted June 9, 2023

Cite This Paper in the Following Citation Styles

(a): [1] Mohammad Al Dababseh, Khitam Ay, Maysaloun Alshadideh, Bilal Saada, Ibrahim Almahireh, Mohammad Abu Altaieb, "The Psychological Compatibility in Relation to Movement Satisfaction among Swimming Courses Students," *International Journal of Human Movement and Sports Sciences*, Vol. 11, No. 4, pp. 789 - 795, 2023. DOI: 10.13189/saj.2023.110412.

(b): Mohammad Al Dababseh, Khitam Ay, Maysaloun Alshadideh, Bilal Saada, Ibrahim Almahireh, Mohammad Abu Altaieb (2023). *The Psychological Compatibility in Relation to Movement Satisfaction among Swimming Courses Students*. *International Journal of Human Movement and Sports Sciences*, 11(4), 789 - 795. DOI: 10.13189/saj.2023.110412.

Copyright©2023 by authors, all rights reserved. Authors agree that this article remains permanently open access under the terms of the Creative Commons Attribution License 4.0 International License

Abstract This study aimed to identify whether there are differences between the students in the swimming courses at the University of Jordan in terms of psychological compatibility and movement satisfaction levels which can be attributed to gender. It also aimed to explore the relationship between psychological compatibility and movement satisfaction among the latter students. The sample of the study consists of sixty (60) male students, and forty-five (45) female students from the physical education faculty at the University of Jordan. The researchers used a psychological compatibility questionnaire in which reliability and validity have been checked. This questionnaire consists of 42 items. The researchers used means, standard deviations, independent samples t-test and Pearson correlation coefficient. It was found that there isn't any statistical difference - at the statistical significance level of $P \leq 0.05$ - between the respondents in terms of psychological compatibility and movement satisfaction which can be attributed to gender. It was found that there is a positive correlation - at the statistical significance level of $P \leq 0.05$ - between psychological compatibility and movement satisfaction

among the students enrolled in the swimming courses at the physical education faculty at the University of Jordan. The researchers found that developing the sports skills of the students enrolled in the physical education faculties requires improving their mental and psychological well-being.

Keywords Physical Education, Sport Psychology, Swimming, Attitude

1. Introduction

Playing sports is connected to several areas, including the mental, psychological, and social areas. To meet the goal intended for playing sports, there is a need to dedicate attention to those areas [1]. It has been argued that participating in sports increases students' achievement motivation and self-discipline levels. Participating in sports activities raises promotes team spirit among students. It raises their academic achievement levels [2]. Many

researchers found that the aspirations of physical education students produce promote positive attitudes among them [3], [4]. In addition, participating in sport activities allow students to meet the performance goals sought by higher educational institutions [5]. That applies provided that attention is shown to psychological variables and life skills when setting plans [6].

The need to improve the quality of education outcomes is sought in all fields of education, Physical education (PE) is part of the educational system. The specialists in PE always seek to search for new determinants to raise the effectiveness of the teaching and training processes. That requires conducting studies. The educational process is a multifaceted process and involves polymorphic interaction. That's why the psychological aspects of classes are examined, including the groups in class.

The compatibility of students in the classroom is an important topic during the educational process. During this process, there is a need for cooperation between the teacher and the students and between the students themselves. Thus, it is necessary to pay attention to each party in the education process and his/her psychological characteristics. Such characteristics affect the outcome of the activity. In general, psychological compatibility in the educational process can be assessed based on pedagogical aspects and the interaction of the student with others [7].

Psychological compatibility is a process that involves arranging and coordinating continuous values, attitudes, and tendencies to address social problems and adjust human behavior in order to create various relationships to reach harmony with oneself and with others [8]. It is a continuous dynamic process carried out by one. It aims at making changes to one's behaviors to make him more compatible with himself. It allows one to create relationships with others and the environment surrounding him [9]. It aims to allow one to control his behavior and makes him deal with himself and with others in a positive way [8]. The theoretical model of psychological compatibility for students during educational activities and tasks appears at different levels. Such levels include the level of role interaction and the level of motives and personal values [10]. The internal mechanisms of psychological compatibility contact (emotional satisfaction and intellectual assistance) are important and identify two sides of compatibility. The reasons for this contact are psychological compatibility from the emotional aspect of activity and harmony from the instrumental aspect [11].

In sports, there are many circumstances in which psychological compatibility can play an important role [12]. In every society, there are certain institutions that take responsibility for teaching sports to people. Those institutions play an important role in developing the psychological abilities of people and teaching them about psychological and social compatibility. They play an important role in providing people with knowledge about sports and promoting certain beliefs among them. They form people's beliefs about cultural and civilizational

environments and sports. Such beliefs include the ones related to home, schools, sports institutions, such as sports clubs, youth centers, etc. Bayyat, et al. [6] add that adopting suitable instructional methodologies can create an appropriate educational context for acquiring knowledge, fostering psychological preparation. Adopting such methodologies allow students to develop their skills and abilities [12].

Mastering swimming skills requires having certain physical and psychological abilities [13]. Such abilities include psychological compatibility. When it's at the highest level, the student can feel movement satisfaction. Movement satisfaction has been receiving much attention in sports psychology. That's attributed to its great importance in helping one in determining the expected type of behavior in future situations [14]. Movement satisfaction is affected by numerous variables related to biological and psychological components. It also affects one's self-esteem [15].

Movement satisfaction increases with increasing the amount of time spent on physical education activities [16]. Researchers consider movement satisfaction in sports as an independent variable in their models [17], [18]. Movement satisfaction is a great variable in the field of physical education and sports activities. It helps one in determining the individual's inclinations and motivations for practicing some sports activities. Several researchers added that psychological measurements - such as psychological compatibility and movement satisfaction - play an important role in sports activities. That's because those measurements help one in acquiring objective information about the student's level in physical education courses and various psychological skills. It's because those measurements reflect the development of students' sports skills, knowledge of real concepts and understanding, especially when learning new skills such as swimming skills.

The researchers of the present study work in the physical education domain. They teach swimming to students. They noticed that many students in swimming courses were highly in need of mental and psychological preparation before and during acquiring sports skills. Such development shall enable students to overcome their fear of water. Such fear holds many students back from learning, and adapting themselves to the aquatic environment which they were not used to it. Thus, psychological preparation plays an important role in providing students with a supportive environment and allowing them to express themselves and a sense of appreciation. In addition, it develops students' ability to hold responsibility. It allows students to gain social life skills and ensure order when cooperating at various individual or group levels. It allows students to reach a certain movement satisfaction while acquiring swimming skills [19]. In light of the aforementioned information, the present study aimed to identify whether there are differences between the students in the swimming courses at the University of Jordan in

terms of psychological compatibility and movement satisfaction levels which can be attributed to gender. It also aimed to explore the relationship between psychological compatibility and movement satisfaction among the latter students.

Identify whether there are significant differences - at the statistical significance level of $P \leq 0.05$ - between the students in the swimming courses at the University of Jordan in terms of the psychological compatibility and movement satisfaction levels which can be attributed to gender.

Explore whether there is a significant relationship - at the statistical significance level of $P \leq 0.05$ - between psychological compatibility and movement satisfaction among the students in the swimming courses at the University of Jordan.

2. Method

2.1. Sample

The sample of the study consists of sixty (60) male students, and forty-five (45) female students from the physical education faculty at the University of Jordan. The participants were provided with a written informed consent form in order to sign. Those forms identify the benefits and risks associated with participating in the present study. To conduct this study, approval was obtained from the Local Ethics Committee. The sampled students' ages range between 19-23 years. Table 1 presents the distribution of the respondents in accordance with gender.

Table 1. The distribution of the respondents in accordance with gender.

Gender	Frequency	Percentage (%)
Male	60	57.1%
Female	45	42.9%
Total	105	100%

2.2. Data Collection Methods

The researchers used a psychological compatibility scale that is shown in Appendix (A). This scale was designed by Al Dababseh [8], The Cronbach alpha coefficient for the latter scale is 0.80 which indicates that it has a high reliability. This scale consists of 42 items. The rating categories in this scale are (often, sometimes, and rarely).

The movement satisfaction scale used by the researchers is shown in Appendix (B). The Cronbach alpha coefficient for the latter scale is 0.82 which indicates that it has a high reliability. The latter scale aims to measure the respondent's satisfaction with his /her own movements. It was modified by Halaweh [14]. It consists of thirty items. It employs the five-point Likert scale. The categories in this scale are: (strong positive feelings, moderate positive

feelings, no feelings, moderate negative feelings, and strong negative feelings).

2.3. The Study's Procedures

The descriptive approach was adopted because it fits with the study's goals. The goals of the study were clarified for the respondents. Then, the consent forms were filled out by the respondents. They suggest that the respondents agree to participate in the study. Then, the psychological compatibility scale and the movement satisfaction scale were filled out by the respondents.

2.4. Data Analysis Methods

For analyzing the data statistically, the SPSS program was used. In addition, percentages, standard deviations, arithmetic means, and Cronbach alpha coefficient values were calculated. Pearson correlation coefficient values were calculated and the t-test was conducted.

3. Results

The researchers aimed to answer the first research question, which states: (Are there significant differences - at the statistical significance level of $P \leq 0.05$ - between the students in the swimming courses at the University of Jordan in terms of psychological compatibility and movement satisfaction levels which can be attributed to gender?). To answer it, means, and standard deviations were calculated and the independent samples t-test was conducted. Those values are shown in Table 2.

Table 2. Means, standard deviations, p-value and the results of the independent samples T-test to identify whether there are differences between the respondents in terms of psychological compatibility and movement satisfaction levels which can be attributed to gender

Scale	Gender	Mean	S.D.	T-Test	P-Value
Psychological Compatibility	Male	2.2	± 0.3	0.7	0.4
	Female	2.15	± 0.4		
Movement Satisfaction	Male	4.1	± 0.6	1.8	0.07
	Female	3.9	± 0.5		

(*): This sign means that the value is significant at the significance level of $P \leq 0.05$

Table 2 shows there aren't any significant differences - at the statistical significance level of $P \leq 0.05$ - between respondents in terms of psychological compatibility and movement satisfaction levels which can be attributed to gender.

To answer the second research question (Are there statistical differences at the level of $P \leq 0.05$ of psychological compatibility and movement satisfaction according to the variables for the students enrolled in swimming courses in the college of physical education?)

Pearson's correlation coefficient value is calculated. They are shown in Table 3.

Table 3. The Pearson's correlation (r) coefficient value to identify whether there is a correlation between psychological compatibility and movement satisfaction among the students in the swimming courses

	Movement Satisfaction	Sig
Psychological Compatibility	$r= 0.8$	0.00*

(*): This sign means that the value is significant at the significance level of $P \leq 0.05$

Table 3 shows that there is a statistical positive correlation - at the statistical significance level of $P \leq 0.05$ - between psychological compatibility and movement satisfaction among the students enrolled in the swimming courses at the physical education faculty.

4. Discussion

There isn't any statistically significant difference between the students in the swimming courses at the University of Jordan in terms of psychological compatibility and movement satisfaction levels which can be attributed to gender as shown in Table 2. That is because the students in those courses use the same study curriculum. The courses related to applied sports psychology help students in utilizing these theories in their studies and their self-compatibility. The sampled students were taught about practical topics such as the physical preparation courses. That allows them to raise their movement satisfaction levels. Swimming courses aim at improving the physical fitness of the students.

Appendix A

The Psychological Compatibility Questionnaire

No	Items	Often	Sometimes	Rarely
1	I can control myself during the swimming exams.			
2	I enjoy learning swimming.			
3	I feel upset when my swimming performance level is low.			
4	I am sensitive toward my swimming teacher.			
5	I am confident about my ability to lead others.			
6	I can perceive myself as a good speaker.			
7	I perceive myself as a good speaker.			
8	I can handle responsibilities during the swimming lessons.			
9	I enjoy the lesson more when the swimming skills become more difficult.			
10	I am concerned, and it is hard for me to return to a natural state when unexpected things happened during swimming lessons.			
11	I can practice the swimming skills with high intensity.			
12	I deal with my colleagues with showing good manners.			

Based on Table 3, the researchers found that positive feelings towards emotional psychological compatibility and society are linked to one's satisfaction with his / her physical attributes, such as speed, strength, flexibility, and endurance. The result in this regard is in agreement with the result reached by [20]. The latter researchers found that the respondents who felt less attractive and more dissatisfied with their motor bodies suffered from psychological problems of greater severity. However, after making a systematic review of the correlations found in other longitudinal and experimental studies, it can be concluded that offering physical education regularly increases the perceived positive changes in terms of physical appearance, fitness, body mass, and health [21].

5. Conclusions

The development of sports skills by the students enrolled in physical education colleges requires showing attention to auxiliary mental, theoretical and psychological factors. That shall make them engage more positively in sports activities [22]. Kondratiev et al [7] found that compatibility can be represented by the correspondence of the styles of pedagogical communication and psychological characteristics of students, like age-specific, cognitive; correspondence of sociometric statuses of students (on the principle of complementarity or symmetry). In this case, she will be diagnosed with mutual satisfaction with the interaction process. Thus, one's positive feelings towards emotional psychological compatibility and society are linked with one's satisfaction with physical attributes, such as speed, strength, flexibility, and endurance.

Appendix A continued

13	I am worry about what other people think about me.			
14	I blame others when I fail in my swimming exam.			
15	I look forward to joining the next swimming lesson.			
16	I am easily stirred when doing difficult positions.			
17	I criticize the teaching method used by the teacher.			
18	I often don't initiate a conversation with other people.			
19	I find it difficult to have a discussion with my colleagues.			
20	I am confident about my swimming skills abilities.			
21	I don't participate in things that are not going my way.			
22	I have excellent swimming skills.			
23	I don't want to take swimming lessons with other students.			
24	I quickly go back to my normal cases after my teacher criticizes me.			
25	I have a high self-confidence level.			
26	The level of my swimming skills performance is not commensurate with my real abilities.			
27	I avoid blaming any of my colleagues.			
28	I feel confident when engaging in competitive sport activities.			
29	I can easily become funny during the swimming lesson.			
30	I consider myself a good assistant for the swimming teacher.			
31	I consider myself stable emotionally.			
32	I am a stubborn person.			
33	I consult my teacher before I make important decisions.			
34	I think I am capable to succeed with showing a distinguished performance in the swimming course.			
35	I am willing to handle my responsibilities.			
36	I am bored and I lack the desire to join the swimming lessons.			
37	It is difficult for me to find words to express myself when I meet new people.			
38	When I face a difficult situation during the swimming lesson, I have the ability to make a quick response.			
39	I lose my temper quickly in case my teacher bothers me.			
40	It is difficult for me to have people my side.			
41	I can control my emotions during difficult situations in the swimming lesson.			
42	I can keep calm when others tease me.			

Appendix B

The Movement Satisfaction Questionnaire

No	Items	Strong positive	Moderate positive	No feeling	Moderate negative	Strong negative
1	Other people's opinions about my ability to move well.					
2	I have the ability to learn physical skills easily.					
3	I have the ability to maintain my balance when moving.					
4	I have the ability to jump for height.					
5	I have the ability to run fast.					
6	I have the ability to move rapidly whenever I wish to.					
7	I have the ability to learn new movements without feeling discouraged.					
8	I have the ability to maintain my balance when I am standing still					
9	I have the ability to move with a feeling of lightness.					
10	I have the ability to throw over arm for distance.					
11	I have the ability to balance myself on one leg.					
12	I have the ability to move quickly around obstacles.					
13	I have the ability to participate in movement activities without having fear of failing					
14	I have the ability to stretch my body.					
15	I have the ability to move better than my friends whenever I wish to.					
16	I have the ability to perform very vigorous physical activities					
17	My skill in swimming.					
18	I have the ability to perform physical skills without unnecessary movements.					
19	I have the ability to meet the physical demands of everyday living.					
20	I have the ability to move freely without being tense.					
21	I am confident in moving well in almost all situations.					
22	Pride with physical activities.					
23	I have the ability to walk with poise.					
24	I have the ability to move to music.					
25	I have the ability to perform movements smoothly in most of the physical tasks I do.					
26	I have the ability to determine the distance between myself and others or between myself and objects when I am moving.					
27	I have the ability to relax at will.					
28	I have the ability to get my arms and legs to work together when appropriate.					
29	I have the ability to produce sudden movement.					
30	Grace in performing everyday movement activities.					

REFERENCES

- [1] Bataineh, M. F., Al-Nawaiseh, A. M., Abu Altaieb, M. H., Bellar, D. M., Hindawi, O. S., & Judge, L. W. (2018). Impact of carbohydrate mouth rinsing on time to exhaustion during Ramadan: A randomized controlled trial in Jordanian men. *European Journal of Sport Science*, 18(3), 357-366. doi:10.1080/17461391.2017.1420236
- [2] Rees, D. I., & Sabia, J. J. (2010). Sports participation and academic performance: Evidence from the national longitudinal study of adolescent health. *Economics of Education Review*, 29(5), 751-759. doi.org/10.1016/j.econedurev.2010.04.008
- [3] Darling, N., Caldwell, L. L., & Smith, R. (2005). Participation in school-based extracurricular activities and adolescent adjustment. *Journal of Leisure Research*, 37(1), 51-76. doi.org/10.1080/00222216.2005.11950040
- [4] Marsh, H., & Kleitman, S. (2002). Extracurricular school activities: The good, the bad, and the nonlinear. *Harvard Educational Review*, 72(4), 464-515. https://doi.org/10.17763/haer.72.4.051388703v7v7736.
- [5] Muñoz-Bullón, F., Sanchez-Bueno, M. J., & Vos-Saz, A. (2017). The influence of sports participation on academic performance among students in higher education. *Sport Management Review*, 20(4), 365-378. doi.org/10.1016/j.smr.2016.10.006.
- [6] Bayyat, M. M., Orabi, S. M., & Abu Altaieb, M. H. (2016). Life Skills Acquired in Relation to Teaching Methods Used Through Swimming Context. *Asian Social Science*, 12(6), 223. doi: 10.5539/ass.v12n6p223.
- [7] Kondratiev, S., Kalita, V., Yulina, G., Baranova, & Reva, T., (2020). Psychological compatibility of student in dyadic and group spaces, *Revista Inclusiones ISSN 0719-4706 volum N 7 –Numero Especial–2020*, 260-277.
- [8] Al Dababseh, M. F., Ay, K. M., Abu Al-Taieb, M. H., Hammouri, W. Y., & Abu Areeda, F. S. (2017). The relationship between psychological compatibility and academic achievement in swimming. *Journal of Human Sport and Exercise*, 12(2). doi: 10.14198/jhse.2017.122.16.
- [9] Mahjob, W. (2000), *Motor learning and developing*, Baghdad, Iraq.
- [10] Krichesky, R.L., & Antonova, I.B. (1980). *Interpersonal compatibility in small groups. Psychological and pedagogical problems of communication*. Leningrad: Znanie. 1980.
- [11] Winter, I.A. (2001). *Educational Psychology: textbook for universities*. Moscow: Logos.
- [12] Abu Altaieb, M. H., Ay, K. M., Al Dababseh, M. F., Bataineh, M. F., Al-Nawaiseh, A. M., & Taifour, A. (2017). The impact of an educational course for swimming on free style swimming performance and life skills for deaf students. *Journal of Human Sport and Exercise*, 12(4). doi: 10.14198/jhse.2017.124.13
- [13] Ay, K., & Abu Al-Taieb, M. (2019). The effect of distributed and intensive styles of teaching within the mastery learning strategy on improving swimming skills among physical education students at the university of Jordan. *Drassa Journal of Development and Research for Sport Science Activities*, 2(1), 35-46. doi.org/10.31377/jdrssa.v2i1.508.
- [14] Halaweh, R. S., Ay, K. M., & ABU AL -TAIEB, M. H. (2013). Movement Satisfaction in Relation to Learning Sport Skills in Mixed Practical Courses at faculty of Physical Education at the University of Jordan. *Journal of Physical Education and Sport*, 13(2), 231-237. doi:0.7752/jpes.2013.02038
- [15] Sira, N., & White, C. P. (2010). Individual and familial correlates of body satisfaction in male and female college students. *Journal of American College Health*, 58(6), 507-514. doi.org/10.1080/07448481003621742.
- [16] Olchowska-Kotala, A., & Chromik, K. (2013). Body satisfaction and time spent on physical activity in Polish students. *Human Movement*, 14(4). doi.org/10.2478/humo-2013-0033
- [17] Carron, A. V. (1982). Cohesiveness in sport groups: interpretations and considerations. *Journal of Sport Psychology*, 4, 123-138.
- [18] Chelladurai, P. & Riemer, H. A., (2001) Satisfaction and commitment of Canadian University athletes: The effect of gender and tenure. *AVANTE*, 7, 27-50.
- [19] İlkım M, Kalaycı MC, Güleroğlu F, Gündoğdu C. Down (2018). Sendromlu Çocuklarda Sportif Etkinliklere Katılma Durumuna Göre Sosyal Uyum ve Beceri Düzeyinin İncelenmesi, İnönü University Uluslararası Sosyal Bilimler Dergisi, (1):162-172.
- [20] Keeton, W. P., Cash, T., & Brown, T. (1990). Body image or body images?: Comparative, multidimensional assessment among college students. *Journal of Personality Assessment*, 54(1), 213-230. doi.org/10.1207/s15327752jpa5401&2_21
- [21] Fox, K. R. (1999). The influence of physical activity on mental well-being. *Public Health Nutrition*, 2(3a), 411-418. doi.org/10.1017/s1368980099000567.
- [22] Al-Haliq, M. A., Oudat, M. A., & Al-Taieb, M. A. (2013). The Effect of Using Video on Developing Physical Fitness of Physical Education Students at the Hashemite University. *Asian Social Science*, 10(1), 21-27. doi: 10.5539/ass.v10n1p21