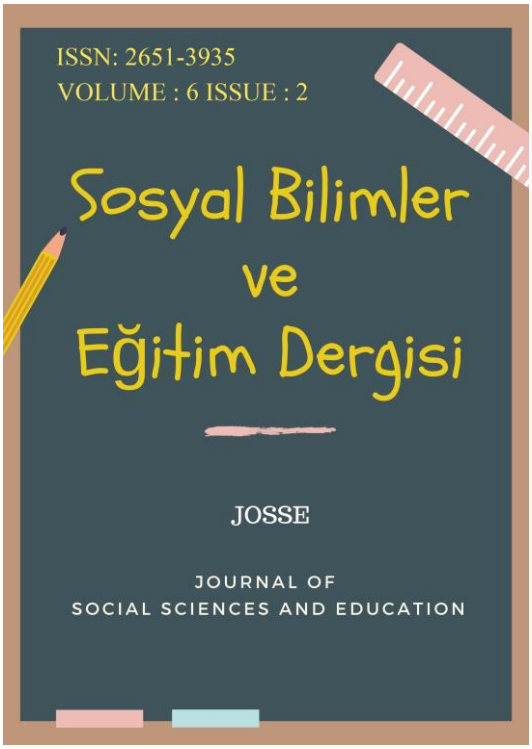
JOURNAL OF SOCIAL SCIENCES AND EDUCATION (JOSSE)



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The Effect of Recreational Flow Experience on Mental Well-Being in Fitness Participants*

** The abstract of this research was presented at "ERPA International Education Congresses 2023" Balıkesir/Cunda*

Cihan AYHAN[1]
Sakarya University of Applied Sciences, Faculty of Sport Sciences, Department of Recreation, Sakarya, Türkiye
Assist. Prof.
cihanayhan@subu.edu.tr
Orcid ID: 0000-0002-7633-1389

Şeyda ALANOĞLU[2]
Balıkesir University, Institute of Health Sciences, Balıkesir, Türkiye
Ph.D. Student
alanogluseyda@gmail.com
Orcid ID: 0009-0006-6520-6765

Article Type: Research Article
Received: 5.10.2023
Revision received: 15.10.2023
Accepted: 23.10.2023
Published online: 25.10.2023

Citation: Ayhan, C., & Alanoglu, Ş. (2023). The effect of recreational flow experience on mental well-being in fitness participants. *Journal of Social Sciences and Education*, *6*(2), 346-360.

The Effect of Recreational Flow Experience on Mental Well-Being in Fitness Participants*

Cihan AYHAN[1]

Sakarya University of Applied Sciences, Faculty of Sport Sciences, Department of Recreation, Sakarya, Türkiye

Şeyda ALANOĞLU[2]

Balıkesir University, Institute of Health Sciences, Balıkesir, Türkiye

Abstract

This study aimed to determine the effect of recreational flow experience on mental well-being in fitness participants. The "Recreational Flow Experience Scale" developed by Ayhan et al., (2020) and the "Warwick-Edinburgh Mental Well-Being Scale" developed by Tennant et al., (2007) and adapted into Turkish by Keldal (2015) were used as data collection tools in the study. The research group consists of a total of 501 volunteer individuals, 344 males (68.7%) and 157 females (31.3%), selected by convenience sampling method among individuals attending the fitness center. The normality test of the obtained data was tested by checking the skewness-kurtosis values and it was determined that the data showed a normal distribution. In this context, in addition to descriptive statistics, pearson correlation and regression analyses were used in the analysis of the data. According to research findings, it has been determined that there is a positive relationship between recreational flow experience and mental well-being. Additionally, it has been observed that recreational flow experience has a positive effect on mental well-being, and recreational flow experience predicts mental well-being by approximately 17%. Accordingly, it was concluded that the flow experience experienced during recreational activities is an important factor in the mental well-being of the participants.

Keywords: Recreation, Recreational flow experience, Mental well-being, fitness participants

Research Article

Received: 5.10.2023
Revision received: 15.10.2023
Accepted: 23.10.2023
Published online: 25.10.2023

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[1] Corresponding author:
Assist. Prof.
cihanayhan@subu.edu.tr
Orcid ID: 0000-0002-7633-1389
[2] *Ph.D. Student*
alanogluseyda@gmail.com
Orcid ID: 0009-0006-6520-6765

Introduction

Individuals have to use their time efficiently in daily life activities (Gümüşay et al 2023). Individuals participate in fitness activities to renew both physically and spiritually. Fitness is a concept that is mentioned a lot and its popularity is increasing day by day. The widespread fitness centers appear as a recreational activity area in which individuals participate in their leisure time. Recreation is leisure time activities that are performed with the consent of individuals in line with certain conditions and motivations and have mental, physical, social, and cultural gains for individuals (Turhan & Koç, 2022). During the activities, the flow experience, which is an optimal experience formed by the positive interaction between the individual's ability and the environment, is experienced (Jang, 2016).

The basis of the flow experience is rooted back to Maslow's work in the 1960s. In the 1970s, psychologist and researcher Csikszentmihalyi, who was influenced by Maslow's work, developed and conceptualized the concept of flow (Turan, 2019). Currently, flow experience is a research area within positive psychology. Flow experience is defined as an optimal experience in which the individual is completely focused on the activity, he/she participates so that environmental factors and thoughts are filtered, there are clear goals, and the sense of control is intensely felt (Csikszentmihalyi, 1977). When the individual is cognitively engaged in the activity, concentration is so intense that irrelevant perceptions and thoughts are filtered out and concerns about other problems disappear. In the most intense moments of the activity, the participant's actions are identified with his/her awareness (Csikszentmihalyi, 1990). In the moment of flow that the individual experiences during the activity, the concentration is so intense that irrelevant perceptions and thoughts are filtered and the worries about the problems encountered in daily life disappear (Csikszentmihalyi, 1975; Csikszentmihalyi, 1990). This experience is also experienced intensely during recreational activities. Recreational flow experience can be expressed as a positive experience in which an optimal experience of difficulty and skills is experienced during the activity, environmental factors and thoughts are filtered, concentration is intense, and a feeling of pleasure and happiness is aroused (Ayhan, Eskiler, & Soyer, 2020). This experience is also defined as the most positive emotion in human life, the most pleasurable experience, and a psychological state that arouses a feeling of happiness (Decloe, et al. 2009). During the recreational flow experience, the individual relaxes mentally, forgets his/her worries, and experiences a subjective and temporary experience full of pleasurable and positive emotions. At the end of the activity, the

individual gains positive benefits by experiencing positive emotions and feelings (Csikszentmihalyi, 1975). In this context, the positive experiences of the individual during the activity will contribute to their mental well-being.

Mental well-being is defined as "being aware of the individual's abilities, being able to overcome the stress in his/her life, being productive and useful in business life and contributing to the society in line with his/her abilities" (Who, 2004). In another definition, mental well-being is defined as the fact that the individual is satisfied with the emotional, cognitive, behavioral, and environmental behaviors at that time, feels peace and in this sense does not feel psychological and mental turmoil (Sawyer et al., 2001). Studies show that mental well-being is an important factor reflecting the positive side of individuals' mental health. (Koivumaa-Honkanen, & Kaprio 2005).

Participation in recreational activities contributes to reducing anxiety and tension in individuals and increasing self-confidence and happiness (Chang, 2015; Hutchinson, Bland & Kleiber, 2008; Kim, June & Rhayun, 2002; Li, Zeng & Li, 2021; Wang & Wong, 2014). In this context, it is possible that individuals' mental well-being levels will increase with the flow experienced during participation in recreational activities. Despite that, there are different studies on recreational flow experience and mental well-being in the literature. Looking at the studies on flow experience, Tao et al. (2022) found that leisure participation had a significant effect on flow experience in the study in which they examined the effect of regular leisure participation on flow experience. In the studies conducted to examine the flow experience in leisure participation, it is seen that studies on flow experience in serious leisure activities that require commitment and regular participation are dominant (Dieser et al., 2015; Frash Jr & Blose, 2019; Heo et al., 2010; Hsu & Liu, 2020; Shen et al., 2022). Considering the studies on mental well-being, Kim et al. (2015) examined the relationship between leisure time attitude, leisure time satisfaction, and psychological well-being of university students and reported that leisure time attitude and leisure time satisfaction positively affect satisfaction and there is a positive relationship. In another study, Hribernik and Mussap (2010) examined the relationship between leisure time satisfaction and subjective well-being of individuals and reported a positive relationship between leisure time satisfaction and health. When different studies are examined, Ryff and Singer (2008) stated that mental well-being, managing relationships with people, self-understanding, and self-realization affect an important part of people's lives. It is essential to understand the relationship between sports and mental well-being concepts in terms of taking part in physical activities that are beneficial for physical and

mental health and increase body resistance to negativities and diseases and quality of life by creating a lifestyle (Biddle, Fox, & Boutcher, 2000).

It is seen that studies in which recreational flow experience and mental well-being are included together in fitness participants are limited in national and international literature. Considering this information, the importance of this research emerges to explain the mental well-being of fitness participants as a result of experiencing flow during the activity. In this context, the study aimed to investigate the effect of recreational flow experience on mental well-being in fitness participants.

Method

Model

In this study, the relational survey model, which was one of the quantitative research methods, was used. The relational survey model refers to a scientific approach that aims to reveal the relationship or effect between two different quantitative variables (Büyüköztürk et al. 2012; Fraenkel, Wallen, & Hyun, 2012; Karasar, 2016). According to this model, in the study, after descriptive analyses were conducted on the relationship between recreational flow experience and mental well-being levels of individuals participating in fitness activities, the relationship between these variables was explained with the relational screening model.

Sample and Population

The research group consisted of a total of 501 participants, 344 males (68.7%) and 157 females (31.3%), who were selected by convenience sampling method on the basis of volunteerism among individuals who were living in Sakarya province, aged 18 and over, and participate in fitness activities. Data from the research group were collected between February and May 2023. The demographic characteristics and participation status of the participants are presented in Table 1.

When Table 1 was analyzed, it was seen that 68.7% of the participants were male and 31.3% were female. It was determined that the highest participation was at the age of 18-24 with 40.9%, followed by 25-32 years with 38.1% and 33 years and older with 21.0%, respectively. It was observed that the highest level of education of the participants was the bachelor's degree with 52.7%, followed by high school and earlier with 29.7% and master's degree with 17.6%, respectively. It was determined that the participants had an average

monthly income of 0-11,500 TL at 50.5%, 11,501-23,000 TL at 32.7%, and 23,001 and above at 16.8%. It was determined that 43.3% of the participants answered the question "Who do you attend events with?" as "with friends", 39.5% "alone" and 17.2% "with family". Moreover, it was determined that 74.7% of the participants answered "yes" and 25.3% answered "no" to the question of whether they would participate in the fitness activity again next year. It was determined that 79.2% of the participants answered "yes" and 20.8% answered "no" to the question of whether they would recommend the last fitness activity to their friends. Besides, it was determined that the participants answered the question "For what purpose do you participate in these activities?" as Physical Health with 59.7%, Mental Health with 21.0%, and Socialisation with 19.4%.

Table 1

Demographic Characteristics of the Participants

Variables	Variable	N	%
Gender	Female	157	31.3
	Male	344	68.7
	Total	**501**	**100.0**
Age	18-24	205	40.9
	25-32	191	38.1
	33 and older	105	21.0
	Total	**501**	**100.0**
Educational Status	High school and earlier	149	29.7
	Bachelor's degree	264	52.7
	Master's degree	88	17.6
	Total	**501**	**100.0**
Monthly Income	0-11.500 TL	253	50.5
	11.501-23.000 TL	164	32.7
	23.001 and more	84	16.8
	Total	**501**	**100.0**
Who do you attend events with?	With Friends	217	43.3
	With Family	86	17.2
	Alone	198	39.5
	Total	**501**	**100.0**
Will you be attending the fitness event again next year?	Yes	374	74.7
	No	127	25.3
	Total	**501**	**100.0**
Would you recommend the last fitness event you attended to your friends?	Yes	397	79.2
	No	104	20.8
	Total	**501**	**100.0**
For what purpose do you participate in these activities?	Socialization	97	19.4
	Physical Health	299	59.7
	Mental Health	105	21.0
	Total	**501**	**100.0**

Data Collection Tools

Recreational Flow Experience Scale: The "Recreational Flow Experience" scale developed by Ayhan et al. (2020) was used to determine the flow experiences perceived by fitness participants during the activity. The related measurement tool was developed in a sample of individuals participating in traditional and extreme sports branches for recreational purposes. The recreational flow experience scale consisted of 9 items and one dimension. The items in the scale were measured on a 7-point Likert scale ranging from 1 (strongly disagree) to 7 (strongly agree). The high mean value to be obtained from the scale means high recreational flow experience, while the low mean value means low recreational flow experience. Besides, it was determined that the developed recreational flow experience scale had a sufficient level of internal consistency (α= .892).

Warwick-Edinburgh Mental Well-Being Scale: "Warwick-Edinburgh Mental Well-Being Scale" developed by Tennant et al. (2007) and adapted to Turkish culture by Kendal (2015) was used to determine the mental well-being levels of the participants. This scale consisted of 14 positive items and had a 5-point Likert-type measurement level ranging from 1 (Strongly Disagree) to 5 (Strongly Agree). The lowest score was 14 points and the highest score was 70 points. High scores obtained from the scale indicate high mental well-being. The validity and reliability coefficient of the scale was reported as (α= .920) (Kendal, 2015).

Statistical Analysis

The data obtained from the scales were analyzed using the IBM SPSS 24.0 package program. In addition to descriptive statistics, Pearson correlation analysis was performed to determine the relationship between recreational flow experience and mental well-being in fitness participants. Moreover, linear regression analysis was performed to determine the effect of recreational flow experience on mental well-being in fitness participants. In the statistical analysis and interpretations of the data, the significance level was taken as 0.05. To determine whether there was a multicollinearity problem in the data to be used for the analyses, Durbin-Watson coefficient values, binary correlations ($r<0.80$), tolerance values ($1-R^2>0.20$), variance inflation factor ($VIF=[1/(1-R^2)]<10$) and maximum case index value ($CI<30$) were examined for the regression model and it was determined that there was no autocorrelation problem between variables (Coşkun et al., 2012; Büyüköztürk, 2016).

Ethics Committee Approval

In this research, participants were given detailed information about the aim and content of the study and signed an informed consent form. Ethical approval for this study was obtained from Balikesir University (Decision No: 2023/92) and the research was carried out within the scope of the Council of Higher Education Scientific Research and Publication Ethics Instruction.

Findings

In this part of the study, the results and interpretations of the statistical analyses conducted following the research were presented.

Table 2

The Relationship between Recreational Flow Experience and Recreation Area Preference Factors

Sub-dimensions		1	2
Recreational Flow Experience (1)	**r**	1	.411**
	p		.000
Mental Well-Being (2)	**r**	.411**	1
	p	.000	

**p<0.001; N=501

When the results of the analyses were examined, it was determined that there was a positive and moderately significant relationship between recreational flow experience and mental well-being (p<.01; Table 2). This result shows that as the participants' recreational flow levels increase, their mental well-being levels will also increase.

Linear regression analysis was used to determine the effect of recreational flow experience on mental well-being. As a result of the analysis, it was determined that recreational flow experience predicted mental well-being by approximately 17% (adj.R^2= .167). In other words, it was determined that the independent variables had a statistically significant effect on the dependent variable (p<.001). Accordingly, it was observed that the effect of recreational flow experience on mental well-being was significant in the model (Table 3).

Table 3

The Effect of Recreational Flow Experience on Mental Well-Being

Dependent Variable: **Mental Well-Beıng**					
Variables	**B**	**Standard Error**	**β**	**t**	**p**
(Constant)	2.070	.175		11.803	.000
Recreational Flow Experience	.296	.029	.411	10.058	.000
R^2=.169, $_{ADJ.}R^2$=.167					
F=101.164, p=.001				**Method:** Enter	

Discussion and Results

The results obtained from this study, which was conducted to determine the relationship between participants' recreational flow experience and mental well-being levels, were discussed and interpreted in this section. When the results of the analyses were examined, it was determined that there was a positive relationship between recreational flow experience and mental well-being. Accordingly, as the level of flow experienced by the participants during recreational activities increased, it was seen that there was a positive change in their mental health perceptions. Moreover, it was observed that recreational flow experience had a positive effect on mental well-being and recreational flow experience predicted mental well-being by approximately 17%.

Individuals who experience flow during participation in recreational activities not only do sports, but also achieve positive outcomes in terms of self-improvement through exercise, avoiding social alienation, protecting their mental and physical health, and improving their creative expression skills (Kim & Lee, 2008). During the recreational flow experience, the individual relaxes mentally, forgets his/her worries, and experiences a subjective and temporary experience full of pleasurable and positive emotions. At the end of the activity, the individual experiences positive emotions and feelings and gains positive gains (Csikszentmihalyi, 1975). Moreover, flow experience points to a psychological state in which people feel successful, happy and motivated. The flow experience has a structure that directly affects the feeling of happiness in individuals and increases it positively as a result and process.

Moreover, the flow experience increases individuals' motivation and strengthens their belief that they can perform even more difficult tasks. These positive emotions they feel as a

result of this experience indirectly contribute positively to their mental well-being (Moneta & Csikszentmihalyi, 1996; Moneta, 2004). Recreational flow experience is important for mental health due to its stress-reducing effects, increasing positive emotions, providing self-improvement opportunities, and strengthening social connections. In this context, it can be stated that recreational flow experience has a significant effect on mental well-being.

There were studies in the related literature that support the results of this study. LeFevre (1988) observed an increase in the positive emotions of individuals in direct proportion to the time and frequency spent in the flow experience. In the study conducted by Bloch (2001), it was revealed that flow experience caused several positive psychological states such as joy, cheerfulness, happiness, and honor. Fullagar and Kelloway (2009) also reported that flow experience had a positive effect on people's mental well-being. Moreover, there were studies in the literature that flow experience was effective on various issues in the field of positive psychology as well as mental well-being. In these studies, conducted on various sample groups, it was reported that flow experience was effective on happiness (Sahoo & Sahu, 2009; Tsaur, Yen, & Hsiao, 2013); subjective well-being (Bryce & Haworth, 2002; Carpentier, Mageau, & Vallerand, 2012; Cheng & Lu, 2015; Clarke & Haworth, 1994; Moutinho et al., 2019) and life satisfaction (Chang, 2003; Chen et al., 2010).

As a result, it was determined that there was a moderate positive relationship between recreational flow experience and mental well-being, and recreational flow experience predicted mental well-being by approximately 17%. It was concluded that the flow experience during recreational activities was an important factor in the mental well-being of the participants. The study, which is thought to be a locomotive for future studies, will have the importance and quality to make a difference in terms of contributing to the field as an important study in which recreational flow experience and mental well-being are combined.

Limitations and Suggestions

In this study, the relationship between recreational flow experience and mental well-being was investigated. In future studies, structural equation modeling can be used with variables such as recreational flow experience, mental well-being, leisure time interest, psychological commitment, recreational specialization, and perceived benefit.

To increase the recreational flow experience, which has a significant impact on the mental well-being of individuals, some suggestions are given below for fitness businesses:

- Organise yoga, zumba, spinning, and other group activities that contribute to the recreational flow, as group classes can help individuals strengthen social connections and enjoy exercising together.
- It is recommended to hire well-trained and motivating trainers. Well-trained and motivating instructors can help clients to better understand and correctly perform their exercises. Trainers can support the recreational flow experience by paying attention to the emotional and psychological needs of clients.
- By creating specific programs focused on achieving personal goals, clients' exercise should be complete more meaningful. In this way, the sense of achievement obtained by participants can contribute to increasing mental well-being.
- Modern equipment and a clean, organized environment can encourage clients to come to the fitness center regularly. This in turn can increase recreational flow levels.

Ethics Committee Approval

In this research, participants were given detailed information about the aim and content of the study and signed an informed consent form. Ethical approval for this study was obtained from Balikesir University (Decision No: 2023/92) and the research was carried out within the scope of the Council of Higher Education Scientific Research and Publication Ethics Instruction.

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