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Research Article

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ASSESSMENT OF THE RELATIONSHIP BETWEEN SEXUAL SATISFACTION AND DIABETES SELF-MANAGEMENT IN ADULTS WITH DIABETES AND THE FACTORS INFLUENCING THIS RELATIONSHIP

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Abstract

Objectives: This study aimed to evaluate the relationship between sexual satisfaction and diabetes self-management among individuals diagnosed with diabetes mellitus (DM), as well as the factors influencing this relationship.

Materials and Methods: This descriptive and correlational study was conducted with 140 individuals with DM in a public hospital in Ankara, Turkey. Data were collected using the "Individual Information Form", "New Sexual Satisfaction Scale (NSSS)", and "Diabetes Self-Management Questionnaire (DSMQ)".

Results: Participants' mean NSSS score was 60.18±17.97, and their mean DSMQ score was 5.65±1.71. Higher NSSS scores were observed in participants who were satisfied with their partner relationship, reported no changes in their sexual life compared to before their DM diagnosis, consumed alcohol, and whose partners had a university-level education or higher ($p < 0.05$). A positive correlation was found between the total scores and subdimensions of NSSS and DSMQ ($p < 0.05$). Regression analysis indicated that fasting blood glucose (FBG) (Beta= -0.22, $p < 0.001$), alcohol consumption (Beta= -6.79, $p = 0.022$), and satisfaction with the partner relationship (Not satisfied, Beta= -18.00) had significant effects on NSSS scores ($p < 0.05$). Additionally, DSMQ had a positive effect on NSSS (Beta= 1.47; $p = 0.05$).

Conclusion: Sexual satisfaction in individuals with DM is influenced by diabetes self-management. Partner relationship satisfaction and FBG are critical determinants of sexual satisfaction. Therefore, integrating sexual health and glycemic control into education and counseling services is essential for individuals with DM.

Keywords: Blood glucose, diabetes mellitus, self management, sexual satisfaction, sexuality.

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Introduction

Diabetes Mellitus (DM) is a chronic condition characterized by elevated blood glucose levels, arising when the body either does not produce insulin, produces insufficient amounts, or fails to use it effectively. Nowadays, DM has become a global health issue, affecting more than half a billion individuals worldwide.[1] According to the 2021 International Diabetes Federation Global Report, the prevalence of DM among adults is 10.5%, and it is projected to increase to 12.2% by 2045.[2] In Turkey, the prevalence of DM is 14.5%.[3] Factors such as the rising prevalence of DM, DM-attributable mortality, and health expenditures associated with DM continue to have significant social, financial, and systemic impacts globally.[2]

Uncontrolled, long-term DM not only leads to vascular and oxidative stress disorders that impair various physiological systems but also causes psychological symptoms.[4] In addition to these extensive effects, an important dimension directly affecting the quality of life of individuals with DM is its negative impact on sexual functioning. Sexuality is a significant aspect of an individual's life, influenced by numerous physical, psychological, and social factors.[4–6] Sexual dysfunctions are recognized as a common complication of DM in both men and women.[4–7] Therefore, the impact of DM on the sexual health and satisfaction of individuals is an area that should not be overlooked in the assessment of DM.

Sexual satisfaction, as defined by Hudson, refers to the degree of harmony and contentment experienced in sexual activities.[8] Suboptimal DM management not only leads to physiological complications but also contributes to sexual dysfunction through psychosocial effects.[4,9,10] Hyperglycemia observed in DM can cause damage to the vascular structures in the genital region and hormonal imbalances in women, leading to sexual dysfunction. In men, disruption of the balance between vasoconstrictive and vasorelaxant factors can restrict penile blood flow, resulting in erectile difficulties. Moreover, hyperglycemia-induced hormonal changes may decrease sexual desire and satisfaction in both women and men.[11,12]Additionally, the constant effort to maintain glycemic control and chronic exposure to hyperglycemia in individuals with DM can increase stress and anxiety,[9,13] fostering negative perceptions toward sexuality.[13,14] The literature highlights that when blood glucose levels cannot be stabilized, sexual satisfaction decreases in both genders.[6,13] In this context, the development of effective DM self-management strategies and the establishment of holistic approaches that integrate glycemic control and psychological support are essential for improving sexual satisfaction.

As highlighted by global DM guidelines, sexual dysfunction emerges as an under-discussed and often neglected complication of DM.[15] While the literature frequently examines sexual dysfunction in relation to type II DM and includes numerous studies focusing on female samples,[6,9,11,14,16–19] studies conducted on individuals with both type I and type II DM, as well as those including both male and female participants, remain limited.[14,20] However, no studies have been identified that assess sexual satisfaction in both genders among individuals

diagnosed with type I and type II DM. Within this scope, the aim of this study is to evaluate the relationship between sexual satisfaction and diabetes self-management in adult individuals diagnosed with type I and type II DM, as well as the factors influencing this relationship.

Research Questions

Do socio-demographic characteristics, health status, and changes in sexual life influence the levels of sexual satisfaction and diabetes self-management in adults diagnosed with DM?

Is there a relationship between sexual satisfaction and diabetes self-management levels in adults diagnosed with DM?

Materials and Methods

Type of Study

The study is descriptive and correlational in design.

Population and Sample

The study was conducted in the internal medicine outpatient clinics of a Public Hospital in Ankara, Turkey. The exact number of individuals diagnosed with type I or type II DM attending the hospital is unknown. Therefore, the global DM prevalence of 10% for the 20–79 age group, as reported in 2021 data, was used for sample size calculation.[1] Using this prevalence, the sample size was determined with the formula for an unknown population ($n=((t_{(1-\alpha)})^2*(p*q))/d^2$) ($t_{(1-\alpha)}=1.96$, p=0.10, q=0.90, d=0.05). Based on this calculation, the sample size was determined to include at least 138 adult individuals with DM.[21] A non-probabilistic sampling method, specifically “convenience sampling”, was employed. The study included participants who met the following criteria:(i) Voluntary participation, (ii) Aged 20 years or older, (iii) Fluent in Turkish, (iv) At least a primary school graduate, (v) Sexually active prior to DM diagnosis, (vi) Diagnosed with type I or type II DM. Individuals with psychiatric/neurological health issues, neuropathy, postmenopausa, or communication barriers were excluded from the study. Of the 171 individuals invited to participate in the study, 5 were excluded due to the presence of neuropathy, and 8 women were excluded as they were in the postmenopausal period. Additionally, 18 individuals withdrew from the study during the data collection phase, as they did not wish to respond to questions related to sexuality. Consequently, the study was completed with 140 individuals.

Data Collection Tools

The Individual Information Form

In line with the literature,[14,19,20] the form was developed by the researchers. This form includes items related to the participants' socio-demographic characteristics, DM-related features, questions specific to their sexual lives, and metabolic parameters obtained during their routine check-ups.

The New Sexual Satisfaction Scale (NSSS)

The validity and reliability of the NSSS were established by Štulhofer et al.,[22] and its Turkish adaptation was performed by Tuğut.[23] Developed to measure sexual satisfaction, the scale is a 5-point Likert-type instrument consisting of 20 items. The minimum and maximum possible scores on the scale are 20 and 100, respectively. The scale comprises two subdimensions: "Ego-centered" (Items 1–10) and "Partner- and sexual activity-centered" (Items 11–20). Higher scores on the scale indicate greater sexual satisfaction.[22,23] The Cronbach's alpha coefficient for NSSS was reported as 0.94 in the original study,[22] 0.94 for women and 0.95 for men in the Turkish adaptation,[23] and 0.96 in the current study.

The Diabetes Self-Management Questionnaire (DSMQ)

The validity and reliability of the Diabetes Self-Management Questionnaire (DSMQ) were established by Schmitt et al.,[24] and its Turkish adaptation was conducted by Eroğlu and Sabuncu.[25] The DSMQ aims to examine the relationship between diabetes self-management and glycemic control by assessing the individual's situation over the past eight weeks. The scale provides scores ranging from 0 to 10, calculated using a specific formula. The DSMQ consists of 16 items and follows a 4-point Likert structure. It includes four subdimensions: "Glucose management", "Diet control", "Physical activity", and "Healthcare use". Nine items on the DSMQ are reverse-scored. Higher scores closer to 10 indicate better diabetes self-management.[24,25] The Cronbach's alpha coefficient for DSMQ was reported as 0.84 in the original study,[24] 0.85 in the Turkish adaptation,[25] and 0.79 in the current study.

Data Collection

Data were collected by the researchers through face-to-face interviews using the "Individual Information Form" and the scales. The completion time for the data collection tools was approximately 15–20 minutes. To ensure the privacy of the participants, an appropriate interview environment was arranged. The researchers thoroughly explained the data collection forms to the individuals with DM, and clarifications were provided for any unclear expressions. The data collection process was completed between September 2023 and August 2024.

Ethical considerations

Necessary permissions for the study were obtained from the Ankara Yıldırım Beyazıt University Ethics Committee for Health Sciences (Date: 14.06.2023, No: 06-309) and a Public Hospital affiliated with the Ankara Provincial Health Directorate of the Ministry of Health (Date: 31.08.2023, No: 223359448). Before the data collection process began, participants were informed about the purpose of the study. It was explained to them that their participation was voluntary and that they had the right to withdraw from the study at any stage. The study was conducted in accordance with the principles of the Helsinki Declaration.

Data Analysis

The data were analyzed using IBM SPSS 27.0 and R-Project software packages. The Shapiro-Wilk normality test was employed to assess whether the variables followed a normal distribution, and parametric tests were used accordingly. The Levene test was utilized to evaluate the homogeneity of variances. Descriptive data were analyzed using frequency, percentage, mean, and standard deviation. Student t test and One Way ANOVA test were used in independent groups. Dunn Bonferroni Test was used to determine which group caused the difference in three or more groups. Pearson correlation analysis was used to evaluate the relationship between scale scores. To identify the factors influencing NSSS scores, certain independent variables that were statistically significant (fasting blood glucose (FBG), alcohol use, partner relationship satisfaction, and DSMQ) were included in the regression model (Figure 1). Based on Variance Inflation Factor (VIF) values (VIF < 10), it was confirmed that there was no multicollinearity issue among the independent variables. This ensured that the regression model's assumptions were sufficiently met, allowing for reliable interpretations and conclusions. A significance level of $p < 0.05$ was accepted for all statistical tests.

Results

In this study, the mean age of individuals with DM was 38.27±7.29 years. 65.0% of individuals with DM had university-level education or higher. 20% of the individuals reported alcohol consumption. Additionally, 52.1% of the individuals had type II DM. The participants' mean FBG from the last three measurements was 130.90±36.54. Furthermore, 61.4% of the individuals expressed satisfaction with their partner relationship. 41.4% of individuals with DM reported a decrease in their sexual satisfaction compared to before the diagnosis of diabetes (Table 1). In addition to diabetes, the presence of chronic diseases among participants was assessed. It was determined that 31 individuals had an additional chronic condition, including hypertension (n=16), thyroid disorders (n=12), epilepsy (n=2), and asthma (n=1). Additionally, 47.9% (n=67) of the participants were smokers.

Table 1. Distribution of socio-demographic, health status, and sexual life characteristics of adults with diabetes (n=140)

Variables	**M±SD**	
Age (Years) (Min-Max = 20-55)	38.27±7.29	
Duration of Diabetes Diagnosis (Years)	11.01±8.85	
HbA1c (%) (n=76)	7.20±1.11	
Fasting blood glucose level* (n=140)	133.90±36.54	
Postprandial blood glucose level* (n=103)	180.26±46.07	
Gender	**n**	**%****
Female	62	44.3
Male	78	55.7
Educational Status		
High school or below	49	35.0
University or above	91	65.0
Perceived Income Status		
Income equals expenses	75	53.6
Income exceeds expenses	20	14.3
Income is less than expenses	45	32.1
Family Type		
Nuclear family	112	80.0
Extended family	28	20.0
Partner's Educational Status		
High school or below	63	45.0
University or above	77	55.0
Alcohol Consumption Status		
Yes	28	20.0
No	112	80.0
Type of Diabetes		
Type I DM	67	47.9
Type II DM	73	52.1
Medication Use Status		
Yes	103	73.6
No	37	26.4
Presence of Additional Chronic Disease		
Yes	51	36.4
No	89	63.6
Satisfaction with Partner Relationship		
Satisfied	86	61.4
Partially satisfied	41	29.3
Not satisfied	13	9.3
Sexual Desire Compared to Pre-Diabetes Diagnosis		
Increased	7	5.0
Decreased	40	28.6
No change	93	66.4
Sexual Satisfaction Compared to Pre-Diabetes Diagnosis		
Increased	5	3.6
Decreased	58	41.4
No change	77	55.0
Frequency of Sexual Intercourse Compared to Pre-Diabetes Diagnosis		
Increased	10	7.1
Decreased	46	32.9
No change	84	60.0
Effect of Sexual Intercourse on Blood Sugar		
Hyperglycemia/Hypoglycemia	68	48.6
No effect	72	51.4

M: Mean, SD: Standard deviation. * Mean of the Last Three FBG Measurements. %**: Column percentage.

When the scale scores of individuals with DM were examined, the mean NSSS score was 60.18±17.97, and the mean DSMQ score was 5.65±1.71 (Table 2).

Table 2. Distribution of scale scores (n=140)

Scales and Subdimensions	M±SD
NSSS	60.18±17.97
Ego-centered	30.76±9.38
Partner-and sexual activity-centered	29.43±10.17
DSMQ	5.65±1.71
Glucose Management	6.17±2.71
Diet Control	4.86±2.01
Physical Activity	5.07±2.80
Healthcare Use	6.15±2.40

NSSS: The New Sexual Satisfaction Scale, DSMQ: The Diabetes Self-Management Questionnaire. M: Mean, SD: Standard deviation.

The analysis revealed that individuals with DM whose partners had a university-level education or higher had significantly higher NSSS scores compared to those whose partners had a high school education or lower ($p < 0.05$). Similarly, individuals with DM who consumed alcohol had significantly higher NSSS scores compared to non-drinkers ($p < 0.05$). Additionally, in terms of partner relationship satisfaction, individuals who expressed satisfaction with their marriage had significantly higher NSSS scores compared to other groups ($p < 0.05$). The differences in NSSS scores among groups based on changes in sexual life (sexual desire, sexual satisfaction, and frequency of sexual intercourse) were statistically significant ($p < 0.05$) (Table 3).

The DSMQ scores of individuals with DM were found to be significantly higher in women compared to men ($p < 0.05$). Individuals diagnosed with type I DM had significantly higher DSMQ scores compared to those with type II DM ($p < 0.05$). Additionally, individuals using medication had significantly higher DSMQ scores compared to those not using medication ($p < 0.05$) (Table 3).

There was a weak positive correlation between NSSS and DSMQ total scores ($r = 0.28$; $p < 0.05$). Additionally, very weak but significant correlations were observed between NSSS and the DSMQ subdimensions of "glucose management", "physical activity", and "healthcare use" ($r = 0.18$, $r = 0.24$, and $r = 0.25$, respectively; $p < 0.05$) (Figure 1).

Table 3. Distribution of scale scores according to some characteristics of adults with diabetes (n=140)

Variables	NSSS			DSMQ		
	M±SD	t/F	p	M±SD	t/F	p
Gender						
Female	61.19±18.27	t= 0.590	0.556	6.02±1.58	t= 2.359	**0.020**
Male	59.38±17.80			5.35±1.75		
Educational Status						
High school or below	56.38±15.36	t= 1.851	0.066	5.40±1.63	t= 0.395	0.205
University or above	62.23±18.99			5.78±1.74		
Perceived Income Status						
Income equals expenses	58.01±17.71			5.52±1.67		
Income exceeds expenses	57.20±20.97	F=2.587	0.079	6.09±1.44	F=0.874	0.419
Income is less than expenses	65.13±16.28			5.66±1.86		
Family Type						
Nuclear family	60.33±19.14	t= 0.259	0.797	5.75±1.69	t= 1.411	0.160
Extended family	59.57±12.43			5.24±1.75		
Partner's Educational Status						
High school or below	56.79±14.41	t= 2.110	**0.037**	5.43±1.53	t= 1.342	0.174
University or above	62.96±20.09			5.82±1.83		
Alcohol Consumption Status						
Yes	66.85±19.22	t= 2.227	**0.028**	5.91±2.08	t= 0.792	0.357
No	58.51±17.33			5.58±1.60		
Type of Diabetes						
Type I DM	62.52±20.67	t= 1.480	0.141	6.13±1.68	t= 3.293	**0.001**
Type II DM	58.04±14.89			5.21±1.68		
Medication Use Status						
Yes	59.63±18.51	t= 1.165	0.246	6.02±1.56	t= 4.567	**<0.001**
No	63.13±16.22			4.62±1.70		
Satisfaction with Partner Relationship						
Satisfied	66.95±15.87[a]	F=20.595	**<0.001**	5.90±1.72	F=2.538	0.083
Partially satisfied	50.39±15.12[b]			5.20±1.52		
Not satisfied	49.30±18.10[b]			5.41±1.93		
Sexual Desire Compared to Pre-Diabetes Diagnosis						
Increased	59.57±14.29[ab]	F=15.695	**<0.001**	6.33±1.37	F=1.497	0.227
Decreased	48.12±16.22[a]			5.31±1.62		
No change	65.41±16.49[b]			5.74±1.75		
Sexual Satisfaction Compared to Pre-Diabetes Diagnosis						
Increased	62.60±17.27[ab]	F=10.644	**<0.001**	6.25±1.53	F=0.996	0.372
Decreased	52.52±16.55[a]			5.43±1.57		
No change	65.97±17.03[b]			5.78±1.81		
Frequency of Sexual Intercourse Compared to Pre-Diabetes Diagnosis						
Increased	60.30±12.32[ab]	F=15.883	**<0.001**	5.35±1.58	F=0.512	0.601
Decreased	49.28±16.31[a]			5.50±1.59		
No change	66.14±16.68[b]			5.76±1.79		
Effect of Sexual Intercourse on Blood Sugar						
Hyperglycemia/Hypoglycemia	60.16±17.76	t= 0.015	0.988	5.74±1.69	t= 0.653	0.515
No effect	60.20±18.28			5.56±1.72		

NSSS: The New Sexual Satisfaction Scale, DSMQ: The Diabetes Self-Management Questionnaire. [a,b]: The groups shown by different letters were different with respect to NSSS overall scores (Dunn Bonferroni Test). M: Mean, SD: Standard deviation.

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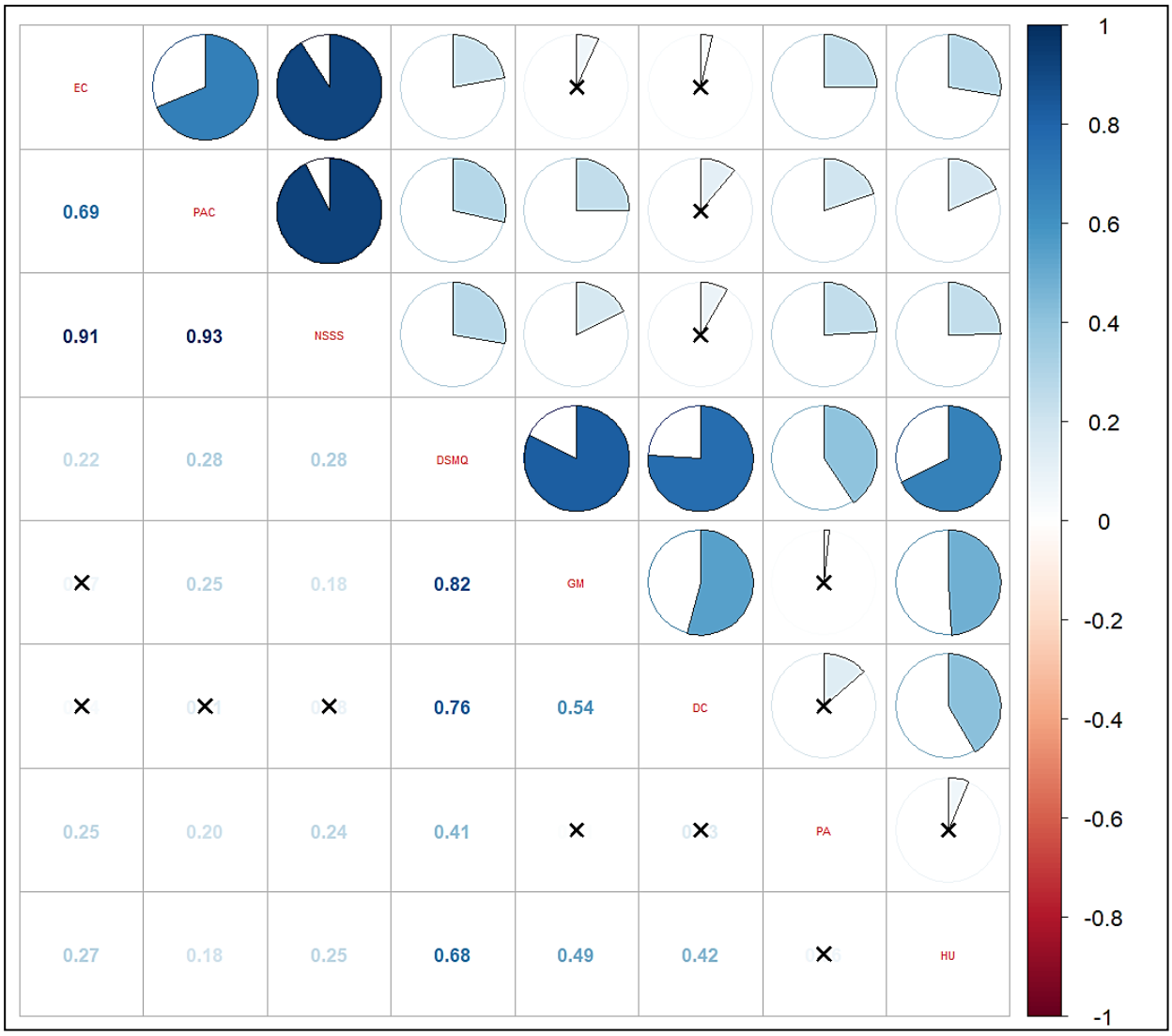

Figure 1. Correlations between NSSS and DSMQ and its subdimensions (n=140)

EC: Ego-Centered, PAC: Partner- and Sexual Activity-centered, NSSS: New Sexual Satisfaction Scale, DSMQ: Diabetes Self-Management Questionnaire, GM: Glucose Management, DC: Diet Control PA: Physical Activity, HU: healthcare use

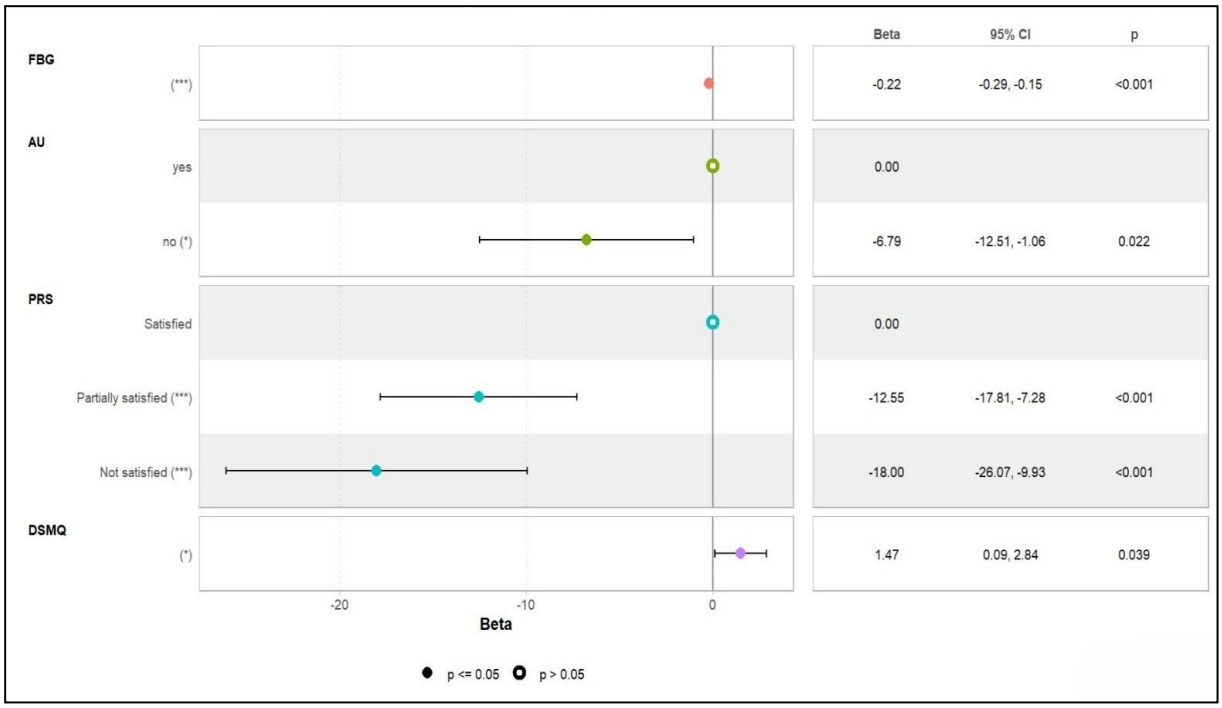

Figure 2. Regression model with NSSS as the dependent variables (n=140)

FBG: Fasting Blood Glucose, AU: Alcohol Use, PRS: Partner Relationship Satisfaction, DSMQ: The Diabetes Self-Management Questionnaire

According to the results of the regression analysis, FBG, alcohol consumption, and the level of satisfaction with the partner relationship were found to have significant effects on NSSS scores ($p < 0.05$). A one-unit increase in FBG was associated with an average decrease of 0.22 units in NSSS scores (Beta = -0.22, $p < 0.001$). Individuals who did not consume alcohol had NSSS scores that were, on average, 6.79 units lower compared to those who consumed alcohol (Beta = -6.79, $p = 0.022$). The NSSS scores of individuals who were partially satisfied or dissatisfied with their partner relationships were significantly lower (Beta = -12.55 and Beta = -18.00, respectively; $p < 0.001$). It was determined that as satisfaction with the partner relationship decreased, the negative impact on NSSS scores increased. In addition, DSMQ had a significant positive effect on NSSS scores; a one-unit increase in DSMQ scores resulted in an average increase of 1.47 units in NSSS scores (Beta = 1.47, $p = 0.039$). This demonstrates that DSMQ has a meaningful and positive contribution to NSSS scores (Figure 2). These findings indicate that the dependent variable, NSSS, is significantly influenced by fasting blood glucose levels, alcohol consumption, and satisfaction with the partner relationship. Furthermore, DSMQ contributes significantly to improving NSSS scores.

Discussion

DM is known to have a negative impact on sexual function in both women and men. It can affect sexual life in multiple ways, including orgasmic dysfunction, erectile dysfunction, decreased sexual desire, anxiety, and psychological issues.[4,7,14,20] Problems related to glycemic control in DM management can adversely affect individuals' quality of life.[26] In this context, sexual quality of life in DM is influenced by glycemic control and diabetes self-management.[9] This study identified a relationship between sexual satisfaction and diabetes self-management. Sexual satisfaction was found to be influenced not only by diabetes self-management but also by alcohol consumption, FBG levels, partner's education, and satisfaction with the partner relationship.

In this study, the NSSS (60.18±17.97) and DSMQ (5.65±1.71) scores of individuals with DM were found to be at a moderate level. The literature shows variability in the tools used to evaluate the sexual lives of individuals with DM, and it has been observed that sexual quality of life and sexual satisfaction scores in these individuals are relatively lower compared to the findings of this study.[9,19] The relatively higher NSSS scores in this study population, compared to the literature, may be explained by the younger age of the participants and the lower average age of the study group. Findings by Topaloğlu Ören et al. support this explanation, as sexual quality of life was reported to be higher in younger women with type I DM compared to those with type II DM.[14] In terms of diabetes self-management, the findings of this study align with the literature, showing moderate or above-moderate DSMQ scores.[9,24,27] Similarly, in the study by Schmitt et al. DSMQ scores for individuals with an HbA1c level of 9% or higher were consistent with the findings of this study.[24]

In this study, sexual satisfaction in individuals with DM was found to be associated with DSMQ and its subdimensions of "glucose management", "physical activity", and "healthcare use". This finding is further supported by the results of advanced analyses conducted in this study. As sexual satisfaction increases, diabetes self-management also improves. The findings of this study align with those of Eroğlu, who reported that as the sexual quality of life of individuals with DM improves, their perception of diabetes self-management also increases.[9]

One of the most significant findings related to diabetes self-management in this study is glycemic control management. Failure to maintain glycemic control in individuals with DM can lead to neurovascular changes, which in turn contribute to sexual dysfunction.[5] Schmitt et al. reported that individuals with DM who maintained HbA1c levels below 7.5% had higher DSMQ scores.[24] In the study, higher FBG levels and lower "glucose management" scores were found to be associated with reduced NSSS scores. These findings suggest that diabetes management and glycemic control have a multifaceted impact on sexual satisfaction. Additionally, factors such as gender, DM type, and medication use, which were found to be significant in this study, should be carefully considered in education and counseling programs aimed at enhancing diabetes self-management.

In this study, partner relationship satisfaction was found to be associated with higher NSSS scores. These findings, including regression analyses, suggest that individuals who are satisfied with their partner relationships have greater sexual satisfaction. Individuals who reported decreased sexual desire, satisfaction, and frequency of sexual intercourse after their DM diagnosis also had lower NSSS scores. Partner adaptation to DM, along with the need for partner support and empathy skills, significantly influences sexual life.[16] Mehdipour-Rabori et al. reported that sexual dysfunction in women with DM negatively affects life satisfaction and marital/partner harmony.[18] Kaplan Serin et al. highlighted that marital harmony enhances the quality of sexual life in women with DM and emphasized the importance of involving spouses in DM care.[17] The findings of this study are consistent with the literature. The inclusion of partners in care and the improvement of partner adaptation are essential to increasing partner awareness. This study also found that individuals with DM whose partners had a higher level of education reported higher sexual satisfaction, supporting the importance of partner involvement and education.

In this study, another notable finding related to sexual satisfaction was alcohol consumption. NSSS scores were lower in individuals with DM who did not consume alcohol compared to those who did, indicating that non-drinkers had lower levels of sexual satisfaction. Shettigar et al. emphasized that alcohol consumption is a factor associated with blood glucose levels.[28] Cui et al. suggested that occasional or light alcohol consumption might be acceptable for individuals with abnormal glucose metabolism, while excessive alcohol consumption should be avoided. However, it was also noted that DM guidelines provide limited information regarding alcohol consumption.[29] In this study, no data were collected regarding the daily or weekly alcohol consumption amounts of participants. Therefore, it remains unclear whether these individuals were light or heavy drinkers. Additionally, no studies were found that specifically examined the relationship between alcohol consumption and sexual life.

The study has four limitations. The first limitation is that the sample group consists of individuals with DM who attended the hospital where the study was conducted; thus, the results can only be generalized to individuals receiving services from these centers. The second limitation is that the responses provided in the data collection forms are based on participants' self-reports. Some individuals with DM had difficulty recalling their HbA1c, FBG, and postprandial blood glucose values. The third limitation is that, due to the inclusion of questions about sexual life, some individuals chose not to participate in the study. The fourth limitation was that the amount of alcohol consumption was not questioned.

Sexual life in individuals with DM is influenced by diabetes self-management. Factors such as glucose management, physical activity, healthcare utilization, and FBG levels, which are associated with diabetes self-management, are among the key determinants of sexual satisfaction in individuals with DM. Additionally, satisfaction with partner relationships is another significant determinant of sexual satisfaction in this

population. In this context, issues related to sexual life, as a critical determinant of health, should also be addressed in education and counseling services provided to individuals with DM. Healthcare professionals, particularly nurses, should contribute to raising awareness about the impact of DM on sexual health as part of DM management. Additionally, future research is needed to explore the impact of alcohol consumption levels and glycemic control on sexual life.

Ethical Considerations: : Approval for our study was obtained from the Ankara Yıldırım Beyazıt University Ethics Committee for Health Sciences (Date: 14.06.2023, No: 06-309). The study was conducted following the principles of the Declaration of Helsinki.

Conflict of Interest: The authors declare no conflict of interest.

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