

IMPACT OF PROBLEMATIC SOCIAL MEDIA USE AND BODY IMAGE ON SOCIAL ISOLATION AMONG HEALTH AND FITNESS ENTHUSIASTS IN OWERRI, NIGERIA

NJOKU, Ethelbert Chinaka¹, and ONYEKABA, Ujunwa Princess²

Department of Psychology,
Imo State University, Owerri, Nigeria
njokuethelbert111@gmail.com

ABSTRACT

This study investigated the impact of problematic social media use and body image on social isolation among health and fitness enthusiasts in Owerri, Nigeria. A sample of 200 health and fitness enthusiasts were recruited from Prolife fitness gym, Pinewood hotel gym, Wolfsmart gym, Maximobi hotel gym, and Kanu sports center using convenience sampling. The age range of the participants were between 18 and 44 years ($M = 27.57$, $SD = 8.498$) consisting of 85 males and 115 females. Two hypotheses were proposed and tested. Data were collected using both paper questionnaires and google form. Participants completed a demographic survey along with three self-report measures including UCLA Loneliness Scale (UCLA LS) by Russell et al. (1978), Bergen Social Media Addiction Scale (BSMAS) by Andreassen et al. (2012), and Sociocultural Attitudes towards Appearance Questionnaire-4 (SATAQ-4) by Schaefer et al. (2014). A cross-sectional survey design was used in the study and linear regression analysis was used to analyze the data. Results of the study showed that problematic social media use has significant impact on social isolation, and body image also has a significant impact on social isolation. The implications of these findings highlight the importance of promoting healthy social media habits and fostering positive body image perceptions to mitigate the risk of social isolation among health and fitness enthusiasts.

Keywords: *Problematic social media use, body image, social isolation, fitness and health, gym*

INTRODUCTION

In Nigeria, due to the endemic economic and social dislocation in the nation, people are totally becoming disenchanted and have lost confidence in both themselves and the promises of the leaders of the nation. There is galloping inflation, banditry and high level of corruption that are disrupting the needed social and economic strength needed to run a virile nation. Individuals are becoming disillusioned, hopeless, helpless and the resultant effect is seen in behaviours reminiscent to social isolation and social media misuse.

Social isolation is a complex and multifaceted phenomenon that has garnered increasing attention in the fields of psychology, sociology, and public health. It refers to the objective state of having limited social interactions and connections with others and the subjective feeling of being disconnected or lonely. While solitude and occasional alone-time can be beneficial for personal reflection and rejuvenation, prolonged and involuntary social isolation can have detrimental effects on an individual's mental, emotional, and physical well-being.

Research into social isolation has underscored its profound impact on mental health. Prolonged loneliness can lead to symptoms of depression, anxiety, and reduced self-esteem. The lack of emotional support and companionship can create a sense of hopelessness and despair, impacting a person's ability to cope with stress and life challenges. Social isolation has also been linked to cognitive decline in older adults and an increased risk of developing various physical health conditions, including cardiovascular diseases, obesity, and compromised immune function. Holt-Lunstad, et al. (2010) found that individuals with weak social connections had a 50% increased likelihood of mortality compared to those with stronger social ties. Research with younger adults indicates that social media use is positively linked to social isolation. However, less is known about social media use and social isolation in older adults. Thus, this study will investigate the possible association between social isolation and problematic social media use.

Another significant variable that can impact social isolation is problematic social media use. As technology continues to advance, an increased number of individuals are incorporating social



media into their daily lives, blurring the lines between online and offline interactions. While social media can offer numerous benefits, such as facilitating communication, information sharing, and community-building, it also comes with potential drawbacks that can impact individuals' mental health, well-being, and overall social dynamics. Problematic social media use refers to the excessive, detrimental, or compulsive usage of social media platforms that leads to negative consequences in various aspects of an individual's life, such as daily routines, relationships, or overall well-being.

The constant availability of social media platforms on smartphones and other devices allows users to stay connected around the clock, leading to excessive screen time and compulsive checking for updates. The fear of missing out on online interactions and the instant gratification from receiving likes, comments, or messages can create a cycle of continuous usage, leading to neglect of real-life responsibilities and reduced engagement in offline social activities. Another significant issue related to problematic social media use is the negative impact it can have on mental health. Constant exposure to curated and filtered images of others' seemingly perfect lives can lead to social comparison and feelings of inadequacy. The pressure to present an idealized version of oneself on social media can contribute to low self-esteem, cyber bullying, online harassment and body image issues. More so, problematic social media use has implications for interpersonal relationships and social dynamics. Excessive reliance on digital communication may weaken face-to-face social skills and reduce the depth of personal interactions. The pursuit of social validation through likes and followers can overshadow genuine connections, leading to a superficial sense of belonging.

Excessive time spent on social media may lead to reduced face-to-face social interactions, as individuals prioritize online connections over in-person relationships (Primack et al., 2017), also, exposure to idealized body standards and constant comparison on social media can negatively impact self-esteem and body image, resulting in feelings of inadequacy and withdrawal from social activities (Fardouly et al., 2018). However, addictive nature of social media can lead to preoccupation with online activities, neglecting real-life relationships and social events (Andreassen et al., 2017), thereby contributing to social isolation within the gym community.

Body image is a complex psychological construct that plays a significant role in shaping individuals' perceptions of their physical appearance and overall self-esteem. The way people perceive their bodies can have a profound impact on their mental well-being, influencing their behaviors, emotions, and interpersonal relationships. In recent years, body image issues have become increasingly prevalent, especially due to societal pressures, media portrayal of "ideal" body types, and the prevalence of body comparison on social media platforms. Understanding the relationship between body image perception and body mass index (BMI) across different weight categories is vital for promoting positive body image and fostering a healthier attitude towards body diversity. Body Mass Index (BMI) is a widely used measure to classify individuals into different weight categories

Body image and its relationship to BMI categories have been the subject of extensive research in various fields. Numerous studies have explored the complex interplay between individuals' perceptions of their bodies and their actual BMI categories

Several factors contribute to how individuals perceive their bodies, regardless of their BMI category. Social influences, including family attitudes, peer comparisons, and media representation of "ideal" body types, can significantly impact body image perception. Additionally, personal experiences, such as body shaming, weight-related teasing, or compliments about appearance, can shape individuals' body image perception. Media also plays a significant role in shaping body image perceptions. A meta-analysis (eg Grabe, et al 2008) explored the relationship between media exposure and body image concerns in women. The study



demonstrated a strong link between media representations of idealized bodies and body dissatisfaction in women.

Also, there can be an interplay between problematic social media use and body image, where exposure to idealized body images on social media platforms can intensify body dissatisfaction and contribute to negative self-perception (Fardouly et al., 2018). The combination of problematic social media use and negative body image perceptions among gym enthusiasts can further exacerbate social isolation. This study therefore provides an opportunity to properly understand the intricate ways problematic social media use and body image can address concerns of social isolation.

Statement of the Problem

With the rise of social media platforms, health and fitness enthusiasts have increasingly been exposed to a constant stream of images and messages that promote idealized body standards. This exposure has the potential to contribute to problematic social media use, including excessive comparison and self-objectification, which can negatively influence individuals' perceptions of their own body image. Additionally, excessive time spent on social media platforms may detract individuals from engaging in meaningful social interactions within the gym community, potentially leading to increased feelings of isolation. This excessive use of social media can contribute to the development of negative internalization of appearance ideals, dissatisfaction with one's own appearance, and feelings of inadequacy. Consequently, these factors may contribute to social isolation, as health and fitness enthusiasts experiencing body dissatisfaction may feel reluctant to engage with others, fearing judgment or criticism. Furthermore, these individuals may isolate themselves within the gym setting due to constant comparison with others and negative body image perceptions, leading to reduced social interactions.

Despite these observations, there is a lack of research exploring the factors that contribute to social isolation among health and fitness enthusiasts specifically in Owerri. However, excessive or problematic social media use, coupled with body image concerns, may have detrimental effects on their social interactions and contribute to social isolation. Therefore, this study aims to investigate the impact of problematic social media use and body image on social isolation among gym enthusiasts in Owerri. Also, it intends to update literature in this rare area of knowledge and draws upon the social influence theory as proposed by Cialdini and Goldstein (2004) which provides a lens through which the predictive relationship between problematic social media use and body image on social isolation can be explored, and gives direction to understand how social norms and peer influence on social media platforms impact individuals' body image perceptions, behaviors, and subsequent experiences of social isolation.

Theoretical review and development of hypotheses

Social support theory by Sarason et al., (1983) and social identity theory by Tajfel and Turner, (1979) typically provided a formidable platform for understanding the basis for noticed social isolation in among health and fitness enthusiasts in Owerri. Social support theory highlights the importance of interpersonal relationships, social connections, and support networks in promoting well-being. In the context of Social Isolation, social support theory suggests that inadequate social connections and support networks can lead to increased feelings of loneliness, alienation, and reduced well-being. Problematic social media use and negative body image can further hinder the development of supportive relationships, as individuals may become preoccupied with seeking validation online rather than engaging in meaningful face-to-face interactions. The lack of social support may exacerbate body image concerns, perpetuate problematic social media use, and contribute to social isolation as individuals feel disconnected from others.



More so, social identity theory explores how individuals' self-concept is shaped by their membership in social groups. This theory emphasizes the role of group membership and social identification in shaping individuals' social interactions and isolation. Fitness and health enthusiasts may develop a strong social identity around their fitness activities and body image. Problematic social media use, such as comparing oneself to fitness influencers, can influence individuals' social identity and contribute to social isolation if they perceive themselves as not measuring up to the ideals promoted on social media. By considering the insights of social identity theory, scholars can examine how individuals' identification with specific social groups related to body image and fitness can influence their sense of social connectedness, acceptance, and potential isolation.

In a study conducted by Meshi et al. (2020), the association between social media use and social isolation in older adults was explored. The researchers recruited 213 participants (79.8% female; mean age 62.6 years, SD 8.3) through online sources and administered an online survey. The survey included measures of living situation, depression, social isolation, estimated daily time spent on social media, and problematic social media use. Binary logistic regression was used to analyze the data and assess the relationships between Social Isolation and social media use. The results of the study suggest that problematic social media use may contribute to higher levels of perceived social isolation in older adults. In another study by Doolan (2019), a quantitative cross-sectional design was utilized and 161 participants were recruited. The participants completed an online questionnaire that assessed their frequency of social media use, loneliness levels, social isolation, and demographic information. The results of the study revealed a significant negative correlation between age and frequent social media use, indicating that younger adults tend to use social media more frequently. Furthermore, after controlling for age, the study found that increased time spent on social media predicted higher levels of loneliness among adults. However, social media use did not significantly predict social isolation. These findings suggest that excessive use of social media may be associated with increased loneliness in adults.

Shavazi and Homayoon (2014) also conducted a study that examined the relationship between the use of new communication technologies (NCTs) and social isolation among students at Shiraz University. The survey utilized a Proportionate Stratified Random Sampling method and collected data from 404 students, including 190 males and 214 females, who completed a questionnaire. The study aimed to provide a comprehensive understanding of Social Isolation by employing multiple indicators, both objective (social disconnectedness) and subjective (perceived loneliness). The findings revealed that Internet use had a significant inverse correlation with Social Isolation, encompassing both subjective and objective dimensions.

Furthermore, Savci et al. (2020) examined the relationship between Problematic Social Media Use (PSMU), family life satisfaction, and social connectedness among adolescents. The study involved 549 adolescents who had been using social media for at least a year and had at least one social media account. The findings indicated that PSMU had a negative impact on both family life satisfaction and social connectedness. Regression analysis revealed that PSMU negatively predicted family life satisfaction and social connectedness. Additionally, both family life satisfaction and PSMU were significant predictors of social connectedness. Mediation analysis showed that family life satisfaction played a meaningful role as a mediator in the relationship between PSMU and social connectedness.

Primack et al. (2017) conducted a cross-sectional study in the U.S. to investigate the association between social media use and perceived Social Isolation among young adults. Self-report measures were utilized to collect data, including surveys assessing participants' social media use and perceived Social Isolation. The results indicated that higher social media use was correlated with increased feelings of perceived Social Isolation, indicating the potential negative



consequences of excessive social media consumption. Although this study revealed a relationship between social media use and perceived Social Isolation, it did not specifically focus on gym enthusiasts or consider the role of body image concerns.

Body image and social isolation

Barnett et al. (2020) conducted a study that investigated the relationship between body image, loneliness, and stigma consciousness among young and older adults. The study utilized a cross-sectional survey design and collected data from fall 2017 to spring 2018. The participants included 459 young adults and 353 older adults over the age of 59. The findings revealed that young adults reported lower levels of body image satisfaction and higher levels of loneliness compared to older adults. The association between loneliness and body image satisfaction was stronger among young adults than among older adults. Among the older adult group, stigma consciousness emerged as a mediator in the relationship between body image satisfaction and loneliness. This implies that older adults who experienced lower body image satisfaction were more conscious of age-based stigmas, which contributed to their feelings of loneliness.

Also, the study by Pop et al. (2022), examined the relationship between social media use and body-esteem, self-esteem, and loneliness among 427 medical students. The researchers collected socio-demographic information, anthropometric data, and self-rated items regarding satisfaction with physical and mental health. The study used an online questionnaire created with Google Forms to gather detailed information on students' perceptions of body image, the influence of social media, and self-evaluations of body image, appearance, self-esteem, and loneliness. The questionnaire collected socio-demographic, anthropometric, and academic information, as well as data on satisfaction with body image, health, emotional support, depression, stress, social media use, and interest in feedback. Three psychological tools, the Body Esteem Scale, Rosenberg Self-Esteem Scale, and UCLA Loneliness Scale, were also included to assess appearance and body image, self-esteem, and loneliness, respectively. The findings revealed that students primarily used social networking sites for socialization, entertainment, and academic tasks, with an average daily usage of 3.38 ± 0.80 hours. The use of Snapchat was positively correlated with self-esteem, while weight status showed a negative correlation with the use of TikTok.

Winston et al. (2015) also investigated the relationship between body size norms among Black and Hispanic adults and the body sizes of their social network members. The study used egocentric network data from 245 adults in New York City, collected between 2012 and 2013. A multivariable regression model was employed to analyze the association between participants' perception of normal body size and the body sizes of their network members, while controlling for factors such as age, education, race/ethnicity, and network size. The findings indicated that participants' perception of normal body size increased as the number of network members with obesity increased. This suggests that individuals' body size norms are influenced by the body sizes of their social connections.

THEORETICAL FRAMEWORK.

The study employed a theoretical framework grounded in social influence theory to explore the intricate connections between problematic social media use, body image, and social isolation among gym enthusiasts in Owerri. This framework which emphasized the influence of social norms and peer interactions, seamlessly aligned with the observed correlations within the context of health and fitness enthusiasts. In essence, the theoretical framework played a pivotal role in guiding the study, effectively highlighting the impact of social norms and peer interactions on shaping body image perceptions and subsequent experiences of Social Isolation among individuals in the specific demographic of health and fitness enthusiasts in Owerri. This alignment with observed correlations reinforced the study's robust exploration of how problematic social



media use and body image, influenced by these social dynamics, intricately relate to social isolation within this particular group.

Hypotheses

1. Problematic social media use will not significantly impact social isolation among health and fitness enthusiasts in Owerri.
2. Body Image will not significantly impact social isolation among health and fitness enthusiasts in Owerri.

METHOD

Research Design

A cross sectional survey design was employed as data were collected from the health and fitness enthusiasts during the morning and evening sessions in the various centers.

Participants

The researchers recruited 200 health and fitness enthusiasts residing in Owerri, Imo state, Nigeria. A convenience sampling method was utilized to recruit participants from Prolife fitness gym, Pinewood hotel gym, Wolfsmart gym, Maximobi hotel gym, and Kanu Sports center. They were registered members of these health and fitness centers who usually come to participate in health and fitness training. The age range of the participants were between 18 to 44 years ($M = 27.57$, $SD = 8.50$) consisting of 85 males and 115 females. 105 of the participants are married while 95 are single. 80 % of the participants are graduates and 20% are secondary school leavers. The sampling size confidence interval is 6 and 65% of the total participants were involved in the research.

Instruments

Three instruments were used for data collection: UCLA Loneliness Scale (UCLA LS), Bergen Social Media Addiction Scale (BSMAS), and Sociocultural Attitudes towards Appearance Questionnaire-4 (SATAQ-4)

University of California, Los Angeles Loneliness Scale (UCLA Loneliness Scale or UCLA LS) which was developed by Russell et al. (1978) was used to measure Social Isolation. The UCLA LS is a well-established and widely used scale designed to assess subjective feelings of loneliness and Social Isolation. The scale has dual use as stipulated in the manual for its use to measure social isolation because social isolation is a major characteristic of loneliness. The scale consists of 20 items scored on a 4-point Likert scale. Sample items include "I am unhappy doing so many things alone", "I am no longer close to anyone. The total scores on the scale can range from 0 to 60, with higher scores indicating higher levels of loneliness. The UCLA LS is scored by totaling the responses to each of the 20 items. A score of 27 or lower is considered low loneliness or isolation, a score ranging from 28 to 43 is considered moderate loneliness, and a score of 43 or higher is considered high loneliness. The UCLA LS has demonstrated robust psychometric properties. Russell et al. (1978) reported a highly significant internal validity for the scale ($r(45) = .79$, $p < .001$), with Cronbach's alpha coefficients ranging from 0.89 to 0.96. The original coefficient alpha was reported as 0.96, indicating excellent internal consistency. It also has good construct validity and test-retest reliability over a 1-year period was also established ($r = 0.73$). Furthermore, the UCLA Loneliness Scale has been validated in the Nigerian context by Ugwu et al. (2017). The study confirmed the reliability and construct validity of the scale within



the Nigerian sample, indicating its suitability for assessing social isolation in this context. Sample of items in the scale include: I lack companionship. I am in tune with the people around me. The second scale which is Bergen Social Media Addiction Scale (BSMAS) was originally developed by Andreassen et al. (2012) as a modification of the Bergen Facebook Addiction Scale. As stated in the manual, the BSMAS assesses the extent of problematic social media use by examining six core addiction components: salience, mood modification, tolerance, withdrawal, conflict, and relapse, thus, the justification for its use for this research. Participants rate each item on a Likert-type scale ranging from 1 (very rarely) to 5 (very often). The total scores on the scale range from 6 to 30, with higher scores indicating a higher level of social media addiction. According to the developers, scoring more than 3 on at least 4 out of the 6 items indicates a strong indication of addiction (12 in total). The BSMAS has demonstrated good internal consistency, with Cronbach's alpha coefficients ranging from 0.87 to 0.94, indicating the scale's reliability. It has also shown good test-retest reliability, indicating the stability of the scale over time. Additionally, the BSMAS has shown construct validity, indicating that it measures the intended construct of social media addiction. Furthermore, the BSMAS has been validated using a Nigerian sample by Ugwu et al. (2023). The internal reliability of the scale in the Nigerian sample was found to be excellent, with a Cronbach's alpha coefficient of 0.74, indicating its reliability and consistency within the Nigerian context. Sample of items include: You feel anxious and disturbed when you cannot access social media for some time. This is a sign of dependency and craving for an addictive habit between your important work. You have urge to check your phone whenever you hear a notification sound.

The third scale used was Sociocultural Attitudes towards Appearance Questionnaire-4 (SATAQ-4). It is a widely used self-report questionnaire developed by Schaefer et al. (2014). It measures a person's thoughts and internalization of appearance ideals and the appearance-related pressures associated with it. The SATAQ-4 consists of 22 items, which are rated on a 5-point Likert scale ranging from "Definitely Disagree" to "Definitely Agree." The questionnaire includes five subscales: Internalization: Thin/Low Body Fat, Internalization: Muscular/Athletic, Pressures: Media, Pressures: Peer, and Pressures: Family. Each subscale has a varying number of items (ranging from 4 to 5). The SATAQ-4 has demonstrated good internal consistency, with Cronbach's alpha coefficients typically ranging from 0.70 to 0.90. Test-retest reliability over a one- to four-week interval has shown acceptable correlation coefficients ranging from 0.65 to 0.85 for different subscales. The questionnaire has shown consistent factor structures across studies, with the aforementioned subscales being commonly reported. In the Nigerian context, the SATAQ-4 has been validated by Offiah and Ogbu (2017) in their study. The study reported a Cronbach's alpha of 0.818. The norm for the entire scale is 61.2 and higher scores on the SATAQ-4 indicate a greater influence of sociocultural factors on the perception of attractiveness, such as higher internalization of appearance ideals and greater perceived pressures from media, peers, and family. Lower scores indicate less influence of these sociocultural factors. Sample items include: I feel pressure from the media to look thinner. I would like my body to look very thin. Higher score of the norm indicates measure of body image perception.

Procedure

To begin, verbal permission was obtained from health and fitness owners and gym instructors to conduct the research within their facilities. Collaboration with health and fitness instructors was established to facilitate participant recruitment and data collection. The questionnaire was administered Online using Google Form (<https://forms.gle/h6e92G5CU4RvLqZ17>) and physically using paper questionnaire which contained sections for Informed consent, demographic information, Bergen Social Media Addiction Scale (BSMAS), Sociocultural Attitudes towards Appearance Questionnaire (SATAQ-4), and UCLA Loneliness Scale (UCLA LS). Gym instructors



played a crucial role in the research process as they assisted in distributing the Google Form link (via their WhatsApp groups and otherwise) and the paper survey, and addressing queries. Their involvement helped establish a supportive environment and encouraged participant engagement. Informed consent was obtained from all participants, ensuring they possess a comprehensive understanding of the study's purpose, procedures, potential risks, and benefits.

Data analysis

To explore the predictive value of problematic social media use and body image on social isolation, a multiple regression analysis was conducted, and descriptive statistics was calculated to summarize the characteristics of the sample.

RESULTS

Table 1: Descriptive statistics and correlations of social isolation, problematic social media use and body image.

Variables	Mean	SD	1	2	3
1. Social Isolation	27.57	12.65	1		
2. Problematic Soc. Media Use	13.02	6.70	-.324**	1	
3. Body Image	56.77	11.74	.655**	-.276**	1

**Correlation is significant at the 0.01 level (2-tailed)

Results from Table 1 above shows that there was a significant negative relationship between problematic social media use and social isolation ($r = -.324$, $p < .01$). There was also a positive correlation between body image and social isolation ($r = .655$, $p < .01$). Lastly there was a significant negative relationship between problematic social media use and body image ($r = -.276$, $p < .01$).

Table 2: Summary of multiple regressions of the influence of problematic social media use, body image on social isolation

Model	β	t value	p value	Decision
Problematic Social Media Use	-.155	-2.815	.005	Sig.
Body image	.612	11.145	.000	Sig.
R ²	.451			
F	80.904			
Df	2,1			



Dependent variable: social isolation

The result in Table 2 shows that the R square value is .451, which means that 45% variation in social isolation is explained by the predictor variables (problematic social media use and body image). The table also shows that the f-test is significant [$df (2, 197) = 80.904, p < .01$] which means the overall model is significant.

Table 2 result also tested the hypotheses of the study. The first hypothesis which stated that problematic social media use will not significantly impact social isolation among health and fitness enthusiasts in Owerri ($\beta = -.155, r=354, t = -2.815$) is rejected. The negative correlation is an indication that as problematic social media uses decreases, social isolation increases.

Similarly, the second hypothesis which stated that body image will not significantly impact social isolation among health and fitness enthusiasts in Owerri ($\beta = .612, r=602, p < .01, t = 11.145$) is upheld. The positive correlation implies that the higher the body image perception/internalisation, the higher the social isolation.

DISCUSSION

The study investigated problematic social media use and body image on social isolation among health and fitness enthusiasts in Owerri. Two hypotheses were formulated and were tested. The first hypothesis proposed which stated that problematic social media use will not significantly impact social isolation among health and fitness enthusiasts in Owerri was rejected. This is because the negative correlation observed ($\beta = -.155, p=.005, t = -2.815$) suggests that a



decrease in problematic social media use is associated with an increase in social isolation. This aligns with studies by Meshi et al. (2020), Savci et al. (2020), and Primack et al. (2017), which demonstrated the adverse impact of problematic social media use on social isolation suggesting that problematic social media use is associated with higher levels of social isolation. On the contrary, Doolan (2019), Shavazi and Homayoon (2014), Ahn and Shin (2013), and Kircaburun et al. (2020) did not find a significant impact of problematic social media use on social isolation. The disparities in findings may be attributed to variations in sample characteristics, methodologies, and cultural influences. The second hypothesis, suggesting that body image would not significantly impact social isolation, was also rejected. This is because the observed positive correlation ($r=.655$, $p<.01$) indicates that higher body image satisfaction correlates with lower levels of social isolation, aligning with Barnett et al.' (2018) findings. In contrast, Okoro et al. (2021) study found an inverse relationship between body image dissatisfaction and self-esteem among female undergraduate students. While their focus wasn't explicitly on social isolation, the results hinted at higher body image dissatisfaction associating with lower self-esteem and potentially contributing to lower social isolation levels. Pop et al. (2022) and Winston et al.'s (2015) studies did not explicitly explore the direct impact of body image on social isolation. Instead, they investigated various aspects related to body image and social isolation, indicating a multifaceted relationship. The environment in which the participants were selected may have contributed to the outcome of these results. Owerri is full of a youthful population who pay serious attention to social media use and body image.

The findings of this study hold significant implications for understanding the dynamics between problematic social media use, body image, and social isolation among health and fitness enthusiasts in Owerri. The identified negative impact of problematic social media use on social isolation suggests the need for interventions targeting the digital habits of this demographic. Additionally, the positive correlation between body image and social isolation highlights the importance of addressing body image perceptions to enhance social connectedness. These insights contribute to the development of targeted strategies for promoting mental well-being and interpersonal relationships among health and fitness enthusiasts.

Based on the findings of this study, it is recommended that interventions and initiatives be developed to address the significant impact of problematic social media use on social isolation among health and fitness enthusiasts in Owerri. Given the rejection of the hypothesis suggesting that problematic social media use will not significantly influence social isolation, it becomes imperative to focus on media literacy programs tailored for this specific demographic. These programs should equip individuals with the skills to navigate social media consciously, fostering a more mindful and positive engagement that mitigates the adverse effects on both body image and social isolation.

Furthermore, the results affirm the positive correlation between body image and social isolation, indicating that higher body image perception/internalization is associated with increased Social Isolation among gym enthusiasts. In light of this, fitness centers and related establishments are encouraged to promote initiatives that celebrate diverse body types and prioritize overall well-being over narrow standards of appearance. Additionally, the establishment of supportive online communities or forums specifically catering to gym enthusiasts is recommended. These platforms can serve as spaces for positive discussions about body image, offering mutual support and encouragement. Creating a sense of community in the digital realm may counterbalance the negative impact of social media, providing individuals with avenues to connect, share experiences, and combat feelings of isolation.

Lastly, recognizing the interconnected nature of physical and mental well-being, it is suggested that fitness centers and health professionals incorporate mental health assessments and counseling services into their offerings. This holistic approach acknowledges that addressing



social isolation and body image concerns requires not only physical fitness guidance but also emotional support. Integrating mental health support within the fitness context, individuals can receive comprehensive assistance in navigating the challenges identified in this study.

Limitations of the study and direction for further studies

While this study provides valuable insights, certain limitations were acknowledged. Firstly, the research focused on gym enthusiasts in Owerri, limiting the generalizability of the findings to broader populations. Secondly, the cross-sectional nature of the study restricts the establishment of causal relationships. Longitudinal studies could offer a more nuanced understanding of the dynamic interplay between social media use, body image, and Social Isolation. Thirdly, the sample which comprised of 200 gym enthusiasts may not have been representative of the target population. Additionally, self-report measures were employed, introducing the potential for response bias. However, Future research in this area could benefit from exploring the nuanced relationship between specific types of social media platforms and their impact on social isolation among health and fitness enthusiasts. Investigating whether distinct platforms have varying effects on individuals' body image perceptions and subsequent social isolation could provide a more detailed understanding of these dynamics.

Additionally, longitudinal studies tracking individuals over time would offer valuable insights into the long-term effects of problematic social media use and body image on social isolation. This approach could help uncover patterns of change and identify critical periods where interventions may be most effective.

Also, considering the evolving nature of social media and technology, it would be beneficial to explore how emerging platforms, features, or trends influence the relationship between problematic social media use, body image, and social isolation. This could contribute to more up-to-date and relevant recommendations for individuals and communities.

Conclusion

This study investigated the impact of problematic social media use and body image on social isolation among gym enthusiasts in Owerri. Both proposed hypotheses were found to be significant. The findings, backed by thorough literature review and statistical analyses, emphasize the substantial influence of problematic social media use and body image on social isolation within this demographic. With the variation in social isolation explained by the identified predictors, the study underscores the complexity of these dynamics. The implications of these results extend to the development of targeted interventions to enhance mental well-being and social connectedness among health and fitness enthusiasts, challenging assumptions about the impact of social media use and affirming the role of body image in shaping social interactions.

REFERENCES

- Ahn, D., & Shin, D.-H. (2013). Is the social use of media for seeking connectedness or for avoiding social isolation? Mechanisms underlying media use and subjective well-being. *Computers in Human Behavior, 29*(6), 2453-2462.
- Andreassen, C. S., Pallesen, S., & Griffiths, M. D. (2017). The relationship between Addictive use of social media, narcissism, and self-esteem: Findings from a large national survey. *Addictive Behaviors, 64*, 287-293.
- Andreassen, C. S., Torsheim, T., Brunborg, G. S., & Pallesen, S. (2012). Development of a Facebook addiction scale. *Psychological Reports, 110*(2), 501-517.
- Barnett, M. D., Moore, J. M., & Edzards, S. M. (2020). Body Image satisfaction and loneliness among young adult and older adult age cohorts. *Archives of Gerontology and Geriatrics*. <https://doi.org/10.1016/j.archger.2020.10408>.
- Bandura, A. (1986). *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs, NJ: Prentice-Hall, Inc.
- Cialdini, R. B., & Goldstein, N. J. (2004). Social influence: Compliance and conformity. *Annual Review of Psychology, 55*, 591-621. Doi: 10.1146/annurev.psych.55.090902.142015.
- Cash, T. F., & Pruzinsky, T. (2002). *Body image: A handbook of theory, research, and clinical practice*. Guilford Press.
- Doolan, E. (2019). *The Relationship between Social Media Use, Loneliness and Social Isolation*. Dublin: National College of Ireland.
- Fardouly, J., Diedrichs, P. C., Vartanian, L. R., & Halliwell, E. (2018). Social media and Body Image concerns: Current research and future directions. *Current Opinion in Psychology, 28*, 1-5.
- Festinger, L. (1954). The Social Comparison Theory. *Human Relations, 7*, 117-140.
- Fredrickson, B. L., & Roberts, T. (1997). Objectification theory: Toward understanding women's lived experiences and mental health risks. *Psychology of women Quarterly 2*, 173-206.
- Grabe, S., Ward, L. M., & Hyde, J. S. (2008). The role of the media in Body Image Concerns among women: A meta-analysis of experimental and correlational studies. *Psychological Bulletin, 134*(3), 460-476.
- Grogan, S. (2008). *Body image: Understanding body dissatisfaction in men, women, and children*. Routledge.
- Hawkey, L. C., & Cacioppo, J. T. (2010). Loneliness matters: A theoretical and Empirical review of consequences and mechanisms. *Annals of Behavioral Medicine, 40*(2), 218-227.
- Herman, C. P., & Polivy, J. (2008). External cues in the control of food intake in humans: The sensory-normative distinction. *Physiology & Behavior, 94*(5), 722-728.
- Holt-Lunstad, J., Smith, T. B., & Layton, J. B. (2010). *Social relationships and Mortality risk: A meta-analytic review*. PLoS Medicine, 7(7), e1000316.
- Huang, C. (2017). Time spent on social network sites and psychological well-being: A meta-analysis. *Cyberpsychology, Behavior, and Social Networking, 20*(6), 346-354.
- Kircaburun, K., Griffiths, M. D., & Billieux, J. (2020). Balancing connectedness and Disconnectedness online: A risk-benefit assessment of social media use in adolescence. *Current Addiction Reports, 7*(4), 405-411.
- Kross, E., Verduyn, P., Demiralp, E., Park, J., Lee, D. S., Lin, N., Shablack, H., Jonides, J., & Ybarra, O. (2013). *Facebook use predicts declines in subjective well-being in young adults*. PloS one, 8(8), e69841.



- Leigh-Hunt, N., Bagguley, D., Bash, K., Turner, V., Turnbull, S., Valtorta, N. K., & Caan, W. (2017). An overview of systematic reviews on the public health consequences of social isolation and loneliness. *Public Health*, 152, 157-171.
- Meshi, D., Cotten, S. R., & Bender, A. R. (2020). Problematic Social Media Use and Perceived Social Isolation in Older Adults: A Cross-Sectional Study, 66(2), 160–168. <https://doi.org/10.1159/000502577>
- Offiah, C., & Ogbu, S. (2017). Understanding the Effects of the Media's Promotion of the "Perfect Body" Image Among Adolescent Girls in Lagos, Nigeria. *Specialty Journal of Humanities and Cultural Science*, 2(3), 47-59. Retrieved from <http://www.sciarena.com>.
- Okoro, E. N., Ajayi, O. H., & Okoro, O. M. C. (2021). Body Image dissatisfaction and physical appearance-related comparison as correlates of self-esteem among female undergraduate students, Nasarawa State University, Nigeria. *Sapientia Foundation Journal of Education, Sciences, and Gender Studies*, 3(3). pg 234-250
- Pantell, M., Rehkopf, D., Jutte, D., Syme, S. L., Balmes, J., & Adler, N. (2013). Social isolation: A predictor of mortality comparable to traditional clinical risk factors. *American Journal of Public Health*, 103(11), 2056-2062.
- Perloff, R. M. (2014). Social media effects on young women's Body Image concerns: Theoretical perspectives and an agenda for research. *Sex Roles*, 71(11-12), 363-377.
- Pop, L. M., Iorga, M., & Iurcov, R. (2022). Body-esteem, self-esteem, and loneliness among social media young users. *International Journal of Environmental Research and Public Health*, 19(9), 5064.
- Primack, B. A., Shensa, A., Sidani, J. E., Whaitte, E. O., Lin, L. Y., Rosen, D., ... & Miller, E. (2017). Social media use and perceived social isolation among young adults in the U.S. *American Journal of Preventive Medicine*, 53(1), 1-8.
- Russell, D., Peplau, L. A., & Ferguson, M. L. (1978). Developing a measure of loneliness. *Journal of Personality Assessment*, 42, 290-294.
- Sarason, I. G., Levine, H. M., Basham, R. B., & Sarason, B. R. (1983). Assessing social support: The Social Support Questionnaire. *Journal of Personality and Social Psychology*, 44(1), 127.
- Savci, M., Tekin, A., & Elhai, J. D. (2020). Prediction of Problematic Social Media Use (PSU) using machine learning approaches. *Current Psychology*, 1-10.
- Schaefer, L. M., Burke, N. L., Thompson, J. K., Dedrick, R. F., Heinberg, L. J., Calogero, R. M., ... & von Holle, A. (2015). Development and validation of the sociocultural attitudes towards appearance questionnaire-4 (SATAQ-4). *Psychological Assessment*, 27(1), 54-67.
- Shakya, H. B., & Christakis, N. A. (2017). Association of Facebook use with compromised well-being: A longitudinal study. *American Journal of Epidemiology*, 185(3), 203-211.
- Shavazi, M. T., & Homayoon, P. (2014). Social Media and Social Isolation: A study of relationship between new communication technologies and social isolation. *Cultural Studies & Communication*, 10(36), 43-66.
- Tajfel, H., & Turner, J. C. (1979). An integrative theory of intergroup conflict. In W. G. Austin & S. Worchel (Eds.). *The social psychology of intergroup relations* (pp. 33-48). Monterey, CA: Brooks/Cole.
- Tiggemann, M., & Slater, A. (2014). NetGirls: The Internet, Facebook, and Body Image concern in adolescent girls. *International Journal of Eating Disorders*, 47(6), 630-643.
- Ugwu, C., Ogba, K. T. U., Nwonyi, S. K., Ugwuegede, P. N., & Iorfa, S. K. (2017). Personality, loneliness and mental health in a Nigerian sample of university students. *Nigerian Journal of Psychological Research*, 13. Department of Psychology, University of Nigeria, Nsukka.



Ugwu, L. E., Idemudia, E. S., & Chukwu, O. O. (2023). Measuring the Impact of Social Media on Young People's Mental Health: Development and Validation of the Social Media-Induced Tendency Scale. *Depression Research and Treatment, Volume 2023*, Article ID 8677521, 11 pages. <https://doi.org/10.1155/2023/8677521>

Winston, G., Phillips, E., Wethington, E., Wells, M., Devine, C. M., Peterson, J., Wansink, B., Ramos, R., & Charlson, M. (2015). The relationship between social network body size and the body size norms of Black and Hispanic adults. *Preventive Medicine Reports, 2*, 941-945.