# The Relationship Between Social Media Engagement and Body-Esteem Among Undergraduates From International Islamic University

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## ABSTRACT

**Introduction** – As the use of social media continues to increase, past research has linked its use with various emotional and physical problems, such as body image distortion and eating disorders. University students have been found to be particularly susceptible to having poor body image.

**Purpose** – This prompted the present study to examine the relationship between social media engagement and body-esteem among students in a public Malaysian university.

**Methodology/Approach** – This study hypothesised that social media engagement is significantly associated with body-esteem. By adopting a correlational study, this research involved undergraduate students (N=116) from International Islamic University Malaysia (IIUM) who were required to fill in the Social Media Engagement Questionnaire (SMEQ) and Body-Esteem Scale Revised (BES-R) through an online survey. A Spearman's correlation analysis was used to identify the correlation between social media engagement (M=22.46, SD=8.06) and body-esteem (M=93.39, SD=19.33).

**Findings** – Results found that there was a significant yet weak positive relationship between the two variables examined ($p = 0.05$, 2 tailed), indicating that higher social media engagement is correlated with higher body-esteem.

**Originality/ Value/ Implication** – These findings imply that social media engagement does not necessarily facilitate negative outcomes such as low body esteem as suggested by past studies. Instead, interactions through social media can aid in increasing body esteem. Nonetheless, as revealed by past research, this positive outcome may depend on the content that social media users engage with.

**Keywords**: social media, image, body-esteem, students

## INTRODUCTION

The term social media (SM) is an incredibly complex concept to digest; largely due to its constant evolving nature. Being a relatively integral part of today's world, it is now the focus of much research done, as according to Aincher et al. (2021), more than 100,000 research papers have been published regarding SM in the past 25 years alone, where many of these articles have defined SM in their own ways. For the sake of the current study, SM can be broadly defined as a broad spectrum of online platforms that may include blogs, enterprise social networks (SN), social gaming, photo and video sharing (Aincher et al., 2021). Some examples of SM platforms are Facebook, YouTube, Instagram, Tik-tok, and so on.

Meanwhile, engagement can be best understood as "a user-initiated action" (Gluck, 2012, p. 8). In addition, Hollebeek (2011) stated that engagement is multidimensional and comprises behavioral (actions), cognitive (thoughts), and emotional (feelings) aspects. In relation to the current study, engagement may be viewed as the social media user's interaction on his or her virtual social platform. Researchers have classified the attitudes of social media users into three main groups;  i) consumption, which refers to lurkers, otherwise known as the passive users who read but do not post messages (e.g., comments) in any online community (Khan, 2016; Takahashi et al., 2003), ii) participation, which concerns active users who actively interact on the internet through comments, likes and video sharing, and the third identified user attitude being iii) production, which refers to the users uploaded content onto the social media platforms, such as YouTube videos (Shao, 2009).

Moreover, according to Allen et al. (2006) and Mond et al. (2011) the concept of body-esteem is often concerned with one's attitudes and evaluations of one's own body which includes body satisfaction and body appreciation. Unsurprisingly, Williams et al. (2012) mentioned that the repercussions of a low body-esteem include disordered eating and depressive symptomatology, including lower self-esteem. Furthermore, body-esteem and self-esteem have been constantly linked and seem to be intertwined, as many researchers consistently mention both concepts when discussing the other (see Abdullahi et al., 2016; Brechan & Kvalen, 2015). Thus, this highlights the reciprocal relationship between these two concepts, and any discussion of one topic, may include the other.

## LITERATURE REVIEW

Research on social media engagement and its impact on body-esteem has been a recurring theme for many years. Despite social media being viewed as a common leisure activity for its users, excessive social media engagement has been continuously linked with emotional, physical, and performance issues (Marino et al., 2018). According to Wu et al. (2013), about 12% of social media users are affected by these issues. Furthermore, another study found that overuse of social media can be damaging towards its users' mental health; as it can lead to numerous psychological problems, such as stress, anxiety, depression and a decrease in the life satisfaction of an individual (Shakya & Christakis, 2017).

With that in mind, a study done by Eow and Gan (2018) found that three in four university students in Malaysia were

not satisfied with their body size. Similar findings were reported in a study by Alipour et. al (2015), which showed that 51.6% female university students, aged 18 to 35 years in Iran, were dissatisfied with their body and only 35.9% had a positive body image of their own. Another study done in Malaysia, which included 319 youths in their 18 to 28 years old, found that increased levels of social media engagement will cause a lower body image evaluation, pointing towards a negative relationship (Khodabakhsh & Leng, 2020). These findings highlight the negative impact that social media could have on its users, especially females.

Moreover, another study underlined that image-focused social media accentuated slim bodies as ideal, thus increasing the feeling of dissatisfaction towards the users' own body and weight (Marengo et al., 2018). However, despite the research stating that females generally have lower body-esteem, due to the pressure to fit into society's beauty standards, a study by Frederick et al. (2007), showed that males also feel dissatisfied with their bodies, with 90% of male students from a US university being unsatisfied with their body muscle, and 51-71% dissatisfied with their body fat. Due to the fact that almost all social media sites are free and easily accessible, exposure to unrealistic beauty standards is prevalent and unavoidable. This fact would encourage the users to unconsciously compare their own physical appearance against these, at times unattainable standards, causing the users to have negative body image, lower their body esteem, and feel less satisfied with their own body (Santarossa & Woodruff, 2017).

On the other hand, research seems to point towards the type of engagement playing a role in this relationship, underscoring that specific kinds of social media engagement behaviour can predict body-esteem differently. A study by Chang et al. (2019) sought to investigate the relationship between body-esteem and specific social media engagement behaviours, such as photo posting, browsing and selfie-taking. Their study involved female students from secondary schools aged 12-16 years old (N = 303). Findings suggested that while utilising peer comparison, photo browsing led to low body-esteem. Meanwhile, photo posting had a positive effect on body-esteem. Chang and colleagues further implied that this positive relationship might have occurred due the participants being able to curate and select their best photos to post.

Al Yahya et al. (2020) also discovered that high levels of social media engagement causes a discrepancy in users' perception of ideal body image, and thus leads to poor body-esteem. In their correlational study that involved 513 participants, results indicated that a negative perception of body image is facilitated by social media use. Furthermore, their participants welcomed the idea of cosmetic surgery to mitigate their dissatisfaction with their physical features. Al Yahya and colleagues further emphasized that social media engagement 15 minutes prior to bedtime and upon waking from sleep intensifies decision-making to do cosmetic surgery.

Moreover, a meta-analysis by Barlett et al. (2008) found that similar to women, men are susceptible to low body-esteem as well. The meta-analysis showed that men who were exposed to muscular images on social media, reported more negative self-body images. Likewise, the results indicated

that psychological outcomes such as depression were likely to be increased due to poor body satisfaction and body-esteem. However, their study interestingly suggested that college aged men were more likely to be negatively affected by social media engagement, compared to male adolescents. Nonetheless, this highlights that the effects of social media engagement on body-esteem is not limited by gender.

Unsurprisingly, research indicated that engaging in specific social media platforms plays a role in manipulating body-esteem and body dissatisfaction. In an experiment by Engeln et al. (2020) that involved female undergraduates (N=308), those who engaged with highly visual social media, such as Instagram, reported poorer body-esteem (i.e., low body satisfaction) as well as negative moods, whereas Facebook engagement increased comparison in appearances. Nonetheless, the participants were only instructed to engage in the assigned social media platforms for just seven minutes. Given that their study produced significant results, this may indicate how salient visual social media is in impacting body-esteem. Moreover, Engeln and colleagues suggested that users can block any content that could decrease their well-being in order to ameliorate the negative impacts of social media, such as Instagram.

Nonetheless, there are benefits to social media engagement in mediating body-esteem. Gonzales and Hancock (2010) suggested that the use of social media can build up self-esteem and thus, increase overall body-esteem. Furthermore, Voges et al. (2019) suggested that men can use the ideal bodies represented by others, to upvalue their own self-worth and body satisfaction. In addition, although most research seems to predominantly focus on the negative outcomes of social media engagement and body-esteem, Haussmann et al. (2015) and Goodyear et al. (2018) reported that an opposite relationship exists. For example, Goodyear et al. (2018) found that a positive internalization of health related social media content can actually promote better physical well-being.

Similarly, findings from Robinson et al. (2017) suggested that those exposed to athletic body images reported a sense of inspiration to do exercises, compared to those who viewed thin ideal images Likewise, others have focused on how social media could actually be influencing body-esteem in a positive direction. Research by Cohen (2019) and Lazuka et al. (2020) suggested that social media content is progressive by nature. Concurrently, body positivity trends (Bo-Po) are gaining attention and have been steadfast in being inclusive as well as diverse. Zavattaro (2020) highlighted that although the word "fat" was (and somewhat still is) considered derogatory, people with larger bodies are now able to appreciate and be confident with their bodies due to the Bo-Po movement.

Yet, although social media certainly has some advantages, the current era is seeing a worrying trend where children as young as 8 years old are provided with smartphones and granted access to use social media (Winpenny et al., 2014). Consequently, as social media and technological devices are becoming increasingly available for even the young ones, this could bring forth imminent problems, such as younger victims of eating disorders and low self-esteem. This is highlighted by Dakanalis and Riva (2013), who emphasized

that there is a surge in poor body-esteem as well as eating disorders, induced by increasing social media users. Furthermore, there is an apparent lack of literature concerning the relationship between body-esteem and social media engagement within the Malaysian context, specifically among university students.

Therefore, this research was conducted to find out whether social media engagement is associated with the body esteem of undergraduate students in International Islamic University Malaysia (IIUM). The findings of the current study will contribute greatly to society given the increasing use of social media and the role of body-esteem for well-being, as it is a reflection of how one perceives their physical appearance. Accordingly, the research question of this study is "what is the relationship between social media engagement and body-esteem?". It is hypothesized that there will be a significant relationship between social media engagement and body-esteem among the undergraduate students of IIUM.

**Theoretical Framework**

*Figure 1.*
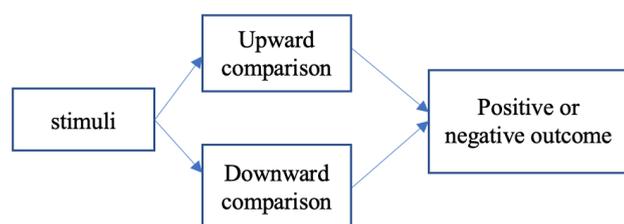


Accordingly, the social comparison theory can be utilized in order to understand the relationship between social media engagement and body esteem. This theory postulates that people self-evaluate by comparing themselves to others, which is done through two ways, i) upward comparison and ii) downward comparison (Festinger, 1957). While the first can perhaps be manifested when one compares him or herself to someone better, (e.g., someone who is thinner, more muscular), downward comparison is centered upon the idea of comparing ourselves to someone worse off, (e.g, someone who weighs more or is shorter).

Findings from Tiggemann and Polivy (2010), who studied social comparison in social media engagement, suggested that upward comparison can indeed lead to low body satisfaction among women. In contrast, participants in their study who used downward comparison reported more positive outcomes such as lower body dissatisfaction. Meanwhile, a study by Perloff (2014) indicated that social media platforms are often peer-based. Hence, social comparison done by female adolescents on some of these platforms tend to be made between peers, instead of celebrities or models (Lafontana & Cillessen, 2010).

**METHOD**

**Study Design**
This study uses a correlational research method to test the hypothesis. In order to examine the relationship between social media engagement and body-esteem, a cross-sectional survey design, whereby the participants were required to complete an online survey, was used. According to Sedgwick (2014), this method was deemed suitable for correlational studies because it is relatively cheap, convenient and reliable for estimating the frequency of an examined behaviour in a population. Variables examined in this study include social media engagement (predictor variable) and body-esteem (outcome variable). The predictor variable was measured by using the Social Media Engagement Questionnaire (SMEQ; Przybylski et al., 2013) while body-esteem was measured by using the Body-Esteem Scale revised (BES-R;Frost et al., 2017).

**Participants**
This study involved undergraduates from International Islamic University Malaysia (IIUM) (N=116). The participants were recruited through convenience sampling, with the only criteria being that the participants must be undergraduate students enrolled in IIUM. The reason behind choosing this sampling method for the current study is due to its simplicity and convenience as it allows the researcher to effectively collect data from the population members that are conveniently available for this purpose, in a way that doesn't cost the researcher much time or money (Jager et al., 2017).

According to Sudman (1976) the minimum sample size required for a survey-based correlational study is 100. Therefore, the present study consisted of 116 individuals, the demographic information of whom included: i) gender, whereby 68 respondents were females (58.6%) while 48 respondents were males (41.4%), ii) year of study, which ranged from 1st year to 5th year and above, the majority of the participants being 3rd year students (61.2%) and iii) age (19-30 years old), the mode being 22 years old (55 participants).

**Measures**
Questionnaire on Social Media Engagement (SMEQ (Przybylski et al., 2013) is a five-item, self-report questionnaire that was designed to assess the frequency of social media use over the period of the last seven days. High scores in this test indicate a high use of social media. The reliability of this questionnaire is $\alpha = .82$ to .89 which makes it a psychometrically sound instrument to use (Przybylski et al., 2013).

The Body-Esteem Scale revised (BES-R), is an amended and shorter version of the original Body-Esteem Scale. BES-R, consisting of 28 body parts and functions that were listed. Participants were required to indicate how they felt about these body parts or functions by selecting options that ranged from 1-5, with 1 representing strong negative feelings and 5 representing strong positive feelings. In addition, Frost et al. (2017) reported the reliability of the revised scale being $\alpha = .72$ to .90.

Google Forms was selected as the online platform to create and disseminate the virtual survey to the targeted population. Accordingly, the Google Form started with the study's briefing and consent form before moving on to three sections, which were: i) the demographic information ii) SMEQ and iii) BES-R items.

**Procedure**

Prior to the study, a Google Form that included the study's briefing, consent form and questionnaire items was created. Afterwards, a message was created and shared to numerous IIUM academic groups through WhatsApps; to conveniently gather participants. Upon opening the survey, the participants were presented with a briefing section to inform them of the study's objectives. Afterwards, the participants were required to give their consent before they could proceed with filling in the demographic information and answering the SMEQ and BES-R items, both of which included an instruction section to guide participants in their answering. Following this section was a debriefing note that restated the purpose of this study, as well as a few lines that expressed gratitude towards the participants. After the period of seven days, 116 participants completed the survey and the link to the survey was closed. The survey data was then recorded and saved. Lastly, the data was transferred to IBM SPSS where a Spearman's Correlation analysis was conducted.

**RESULT AND DISCUSSION**

Spearman's correlation analysis was used to identify the correlation between social media usage (M=22.46, SD=8.06) and body-esteem (M=93.39, SD=19.33), for 116 undergraduate students from IIUM. This analysis was used as one of the assumptions of the Pearson correlation was markedly violated; although there is a linear relationship between the two continuous variables ($p = .35$), the assumption of normality was violated for both variables, as Kolmogorov-Smirnov Test showed D=.09, $p = .03$ for the outcome variable (body-esteem). Therefore, Spearman's correlation analysis was used to determine the strength and direction of the monotonic relationship between the two chosen variables.

Results of the Spearman correlation indicated that there was a significant positive association between social media usage and body-esteem ($r_s$ (114)= .18, $p = .05$ (2 tailed). However, Spearman's rho, which was found to be .18 (see Table 1), indicated that it is a weak relationship (Ratner, n.d.).

The aim of this study was to investigate the relationship between social media engagement and body-esteem among undergraduates from International Islamic University Malaysia (IIUM). The study found that there indeed was a significant relationship between the two variables ($p = .05$). Upon analyzing the data using Spearman's correlation, a weak positive correlation was established. The present study hypothesized that there would be a statistically significant correlation between social media use and body-esteem. As the correlation was found to be statistically significant, the null hypothesis is rejected.

It has been found that there is a positive relationship between social media use and body image. Although there is little existing research to support this relationship, similar positive relationships were found in terms of physical well-being, a construct closely related to body image (Eide, 1982). Goodyear et al. (2018), found that social media use

could promote physical well-being, and Robinson et al (2017) found that social media promoted exercise. However, these findings must be understood in the context of the studies. Goodyear et al. (2018) observed the positive relationship between social media usage and physical well-being only when health related social media content was positively internalised, whereas the findings of Robinson et al. (2017) were related to exposure to athletic body images.

Similarly, other studies such as Daley's (2021) proposed that body-positive posts on Instagram improve the body image and mood of young women. Whereas, Cohen et al. (2019) also showed that exposure to body positive posts is correlated with boosting young women's body satisfaction. The general pattern in the findings that support the weak positive correlation found in the present study, is that individuals who experience a positive impact on body satisfaction or physical well-being are able to positively internalise social media content, and are exposed to content that is directly related to promoting physical health. In other words, past research indicates that the type of content that an individual is exposed to moderates the impact social media use has on body-esteem. Due to this, it is unclear whether or not confounding effects were present in the current study that resulted in a weak positive correlation, as social media engagement was taken as a whole, with no regards to the type of content consumed by the participating sample.

Although literature is divided on the relationship between the two variables, the vast majority of it has shown a strong negative association between social media use and body-esteem (Puglia, 2017). It has been found that the amount of time spent on these social media sites plays a major role, as it could be related to higher levels of body dissatisfaction, increasing the drive to achieve ideal body goals. Therefore, the majority of these findings were based primarily on the duration of the time spent on these social media sites, while the type of content that was being engaged with, was not taken into account (Tiggemann & Slater, 2013a; Tiggemann & Slater, 2013b; Meier & Gray, 2014). Therefore, with the present study also overlooking the type of content, the findings are not sufficient to determine that social media engagement in general, does in fact promote higher body-esteem.

With that being said, one way through which the findings of the present study can be explained, is by taking into consideration the cultural factors that may have played a role. Studies have found that the content on social media directed towards the Malaysian audience, are usually structured to flaunt material objects rather than ideal body images (Khodabakhsh & Leng, 2020). In other words, Malaysian social media users may not be as exposed to content related to body image, as their Western counterparts would be, taking into consideration that the vast majority of the studies mentioned, were based on a Western context. This may explain why the relationship between body esteem and social media use was found to be weak, as the type of content directed towards Malaysian audiences are more material based, with a lack of exposure towards content that may influence body image.

Additionally, body-esteem in Western cultures tends to focus on physical features and structures, such as the shape

of one's jawline and muscle tones. By contrast, body ideals in South Eastern countries such as Malaysia, are consistently centered upon colorism and weight (Kuan et al., 2011; Rajendrah et al., 2017). Consequently, the participants of the current study internalize ideal body standards differently, in comparison to western population. This point brings to light the fact that the BES-R scale, as is the case with many other scales, was created with the western population as reference, further highlighting the need for a culturally suitable scale that would be able to measure the body esteem of Malaysian individuals, specifically.

**Table 1. Correlations**

| | | | BESR | Total score SMEQ |
|---|---|---|---|---|
| Spearman's rho | BESR | Correlation coefficient | 1.000 | .182 |
| | | Sig. (2-tailed) | | .050 |
| | | N | 116 | 116 |
| | Total score SMEQ | Correlation coefficient | .182 | 1.000 |
| | | Sig. (2-tailed) | .050 | |
| | | N | 116 | 116 |

## CONCLUSION AND RECOMMENDATION

It is important to note that while both scales used to measure the variables in this study are sound and reliable, it was noted that some participants had felt uncomfortable answering some of the BES-R items, as it involved questions regarding their private parts and sexual behaviours. Participants had complained about not knowing how to answer some questions as they were unable to relate to them, or did not understand what was meant by them. This is rather problematic as this may have affected their honesty while completing the survey, rendering their data somewhat unreliable. This could further explain the positive correlation found, and accentuates the complication of using a scale that was not developed with the sampled culture in mind.

Furthermore, the discrepancy between findings from the current study and past research indeed serves as further support for the social comparison theory (Festinger, 1957). As initially stated, comparison to evaluate oneself can be done in two ways, which are: i) upward comparison and ii) downward comparison. Past studies referring to this theory, indicate that it is the use of upward comparison in social media that results in the negative association with body-esteem, further indicating that the use of downward comparison on the other hand, can in fact lead to positive outcomes, suggesting a positive rather than a negative association (Tiggemann & Policy, 2010). This notion seems to support the current study's findings; as prior studies often involved participants who were more likely to view stimuli that would lead to an upwards comparison with individuals perceived to be better than them (e.g., thinner and more muscular), whereas it is likely that the population from the present study engaged in downward comparison; due to the assumption that the majority of the Malaysian population are not as widely exposed to content that showcases body ideal images as Westernised societies are. This is primarily linked to the modest culture of the Malaysian society, and as stated earlier, the relative dominance of material-oriented content. In other words, a positive outcome was observed likely due to the participants' unlikelihood of comparing their bodies to others, as the opportunity to do so is absent.

Another limitation that may have caused this result to formulate, is the fact that the participants could have answered the items based on their internal standards and values, as opposed to their reality. According to the Objective Self-Awareness Theory (Duval & Wicklund, 1973), when an individual focuses their attention on themselves, they tend to evaluate and compare their current behavior to their internal standards and values. Going off of this theory, this raises the concern that the participants may have been unaware of their true social media behavior and how they actually feel about and perceive their bodies, but rather answered the items according to what they believe to be appropriate based on their standards and values. This highlights a bias that may exist in the answers provided, further jeopardizing the assumption that the participants answered the questions honestly.

With these limitations in mind, future studies could perhaps measure these elements using scales that are culturally specific or appropriate, that is after the formulation of such scales. Furthermore, future studies should look into which aspects of social media usage are, more or less, responsible for people's concerns regarding their body image. As well as whether or not there is a specific social media platform, that is responsible for the biggest impact on the user's body esteem.

To conclude, while the direction of the relationship found seemed to be the opposite of those established in past research, this study was nonetheless able to highlight important points and concerns, shedding light onto areas that are often overlooked and accepted as unavoidable consequences. The findings from the current study was able to further advance the collective understanding on the role of culture in social media content and engagement, serving as a guide for future research to be more prepared in choosing the appropriate tools, and answering more specific and detailed questions. As social media continues to be a prominent force in current times, perhaps future research could focus on educating people how to internalize and process their social media content in a positive light, in order to minimize the negative impacts of social media engagement to their well-being. Finally, the current study is but a stepping stone for further research on this area, within this specific context, in hopes of a better, healthier future for the generations to come.

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