#selfcare on Instagram: Proactive Mental Health Has Its Moment

Collin Mullis
University of North Florida, n01123305@unf.edu

Luke Nguyen
University of North Florida, n01242599@unf.edu

Calista Pappas
University of North Florida, n01411066@unf.edu

Faculty Mentor: Dr. Julie Williams Merten, Associate Professor
Department of Public Health

Recommended Citation

#selfcare on Instagram:
Proactive Mental Health Has Its Moment

Collin Mullis, Luke Nguyen, and Calista Pappas

Faculty Mentor: Julie Williams Merten, Ph.D.
Department of Public Health
University of North Florida

Abstract

While widely used by clinicians, self-care has recently emerged as a trending topic in mainstream and social media. Informal health and support communities have formed on social media sites such as Instagram, which hosts more than one billion monthly users and ranks as the second most popular social networking application in the United States (U.S). This study investigates how the term self-care is portrayed on Instagram. In particular, the researchers were interested in whether or not current portrayals of self-care on Instagram aligned with the health themes previously established in the clinical definitions of self-care. Using the search term #selfcare, researchers sampled the top 200 Instagram posts in February 2020 (prior to COVID-19). A codebook was developed, pilot tested, and used to code posts. Two researchers independently coded posts. Directed content analysis of #selfcare reveals that the majority of posts were for a female audience, nearly half (43%, n=86) were explicitly geared toward health with the most common being mental and emotional health (23%, n=46.5), physical wellness (19%, n=38), and interpersonal wellness (6%, n=11.5). The emergence of public self-care dialogue is reflected in patterns of social media use, particularly on Instagram where #selfcare has amassed more than 24 million posts. Images from Instagram may help in understanding public use of the term self-care and should be included in the discussion of health promotion through social media.

Keywords: self-care, Instagram, social media, women, adolescents, young adults, millennials

Introduction

With the increased awareness of mental health, individual strategies to protect and improve mental health have become relevant, particularly on social media. From 2017 to 2021, Instagram, one of the world's most widely used applications, increased

from 800 million users to more than a billion users (Clement, 2019; Clement, 2021). By January of 2021, Instagram had more than one billion monthly users, with most users under the age of 34 (Clement, 2021).

Instagram is a highly visual photo and video-sharing social networking site (SNS), where users can post pictures and videos to share their lives with other users (Engeln et al., 2020). The content can be used to promote a product, service, or even as a tool for advocacy and support. For mental health, Instagram could be used as a platform to connect with others facing similar issues and share coping strategies. The user profile of Instagram also aligns with a priority population identified by Substance Abuse and Mental Health Services Administration (SAMHSA) at an increased risk for depression. Prior to the upheaval of COVID-19, in 2017, the prevalence of major depressive episodes among U.S. adults between the ages 18 to 25 was 13.1%, which was higher than the overall average of 7.1% (SAMHSA, 2017). Additionally, more than 13% of adolescents between the ages of 12 to 17 have had at least one depressive episode, with females more than twice as likely to develop depression than males (SAMHSA, 2017). The Centers for Disease and Control (CDC) also reported in 2016 that 80% of adults report depression-induced difficulties with work, school, and social activities (Brody et al., 2018).

The phrase "self-care" has emerged as a term used to include any activity intended to improve oneself. From a scientific perspective, self-care is any set of daily activities that improve a person's optimal well-being, physically or emotionally (Godfrey et al., 2010). From a clinical perspective, this could mean preventative healthcare, early symptom diagnosis, or chronic illness management. Examples of daily activities that promote physical self-care include exercise, nutrition, and hygiene. The clinical definition of self-care also includes emotional self-care or any daily activity that improves the quality of a person's mental well-being (Godfrey et al., 2010). Examples of emotional self-care include having a non-work hobby, being in a peer-support group, or thinking positively (Godfrey et al., 2010).

A 2017 study by Kessing et al. found an association between self-care and better health-related quality of life for chronic heart failure patients. In the cohort study, 459 patients with chronic heart failure were questioned about their quality of life and self-care activities across an 18-month period (Kessing et al., 2017). Self-care activities included daily weight monitoring, fluid intake, sodium intake, amount of exercise, and medication adherence. Quality of life was measured by assessing

heart failure symptoms, functional limitations, and psychological distress. The improvement in the quality of life from self-care was not clinically significant, but the deterioration of life quality due to lack of self-care was noticeable. The study concluded that self-care was necessary for preventing corrosion in quality of life (Kessing et al., 2017).

The significance of self-care was also studied when evaluating medical students. Medical students are of interest pertaining to self-care due to high occupational burnout rates and psychological issues during medical training (Ayala et al., 2018). Similar to the previous article, a cohort study by Ayala et al. published in 2018 surveyed 871 medical students across three months regarding self-care techniques, stress levels, and quality of life (Ayala et al., 2018). Self-care techniques measured included nutrition, physical activity, interpersonal relations, spirituality, stress management, and health responsibility. The researchers determined that self-care engagement inversely correlated with perceived stress and low physical and psychological quality of life (Ayala et al., 2018). They concluded that self-care practices might build resiliency and lower the risk for distress during medical training (Ayala et al., 2018).

The findings that self-care practices can reduce stress to maintain a high quality of life may explain the popularity of self-care among millennials. The American Psychology Association (APA) released results from a survey in 2015 detailing how Americans of different demographics experienced stress. The APA reported that millennials and Gen Xers had stress levels well above the national average and that millennials were most likely to report stress levels increasing in the past year (American Psychological Association, 2015). They also noted that, on average, women reported higher levels of stress than men, with the difference widening since 2007. However, men were more likely to report never engaging in stress relief activity (American Psychological Association, 2015).

Further, the APA report found that individuals dealing with higher levels of stress were more likely to engage in sedentary stress-relief behaviors and that millennials were the most likely demographic to rely on passive stress management (American Psychological Association, 2015). Among high-stress individuals, surfing the Internet was the most popular sedentary activity, especially with millennials (American Psychological Association, 2015). This result would suggest that millennials dealing with stress are most likely to turn to the Internet to find information on stress

management. A small study (n=14) published in 2015 detailed the reliance of community college students, with an average age of 25.71 ± 6.17, on the Internet when searching for personal health and self-care (Rennis et al., 2015). The majority of students were found to use the Internet for health information, along with self-care techniques about fitness and nutrition (Rennis et al., 2015). The self-care techniques implemented by students can be analyzed using the Six Dimensions of Wellness Model.

The Six Dimensions of Wellness Model defines wellness to have six distinct attributes, including physical, social, intellectual, spiritual, emotional, and occupational (Stoewen, 2017). The occupational dimension involves creating a gratifying attitude towards an individual's occupation, where the individual feels their unique attributes are valued (Hettler, 1976). The physical dimension encourages an overall wellness approach to physical health. This includes balancing a nutritional diet, regular physical activity, and making beneficial lifestyle choices. Physical wellness requires being aware of and appreciating one's body (Hettler, 1976). The social dimension comprises contributing to relationships between one's environment and the community. These interrelationships will establish better communications and connections (Hettler, 1976). The intellectual dimension requires creative mental engagement by improving one's intellectual curiosity and sharing one's knowledge with others (Hettler, 1976). The spiritual dimension involves appreciating the cascade of experiences throughout life and the existential search for the human purpose. Spiritual wellness commits to a tolerance of different beliefs and consistency of personal values (Hettler, 1976). The emotional dimension concerns the acknowledgment of feelings and the capacity to manage stress. Emotional wellness focuses on optimism and accepting emotions rather than denying them (Hettler, 1976). The Six Dimensions of Wellness Model provides structure to examine self-care through an all-encompassing lens that demonstrates the interdependence of each attribute towards optimal wellness.

Given the popularity of Instagram and the interest in self-care among Instagram's primary demographic, this study examined Instagram posts tagged with #selfcare. The research questions were:

1. How is self-care itself portrayed on Instagram? How does that portrayal align with clinical definitions of self-care?
2. How do the self-care themes align with the six dimensions of wellness?
3. How do Instagram users engage with self-care content?

Methods

Sample

Samples of posts (n=200) from Instagram were pulled on February 19, 2020 between 5:30 to 6:30 EST. The top 200 posts were pulled with the #selfcare tag from the mobile application by screenshotting the posts using a new Instagram account. Posts were expanded to include all text, and text that was not in English was translated to English. Posts were analyzed following the codebook.

Coding Instrument

Researchers developed a codebook to analyze posts by determining general information, engagement, origin, and themes related to self-care for each post. General information in posts includes four categories: portrayal of self-care, type of post, contents featured in the posts, and the target audience for the posts. Portrayal of self-care was determined to be negative, positive, or neutral/non-apparent. Types of images considered were still images, videos, or text, and the contents featured in posts considered were promotional products, people, illustrations, nature scene photography, food, quotes, and animals. Combinations of these contents, as well as other contents that did not fit these descriptions, were also considered. The researchers also considered the target audience for posts based on gender: women, men, both, and non-apparent.

Engagement was measured by recording the number of comments and likes of each post at the time the screenshot was taken. The researchers also considered if the post was tagged to another Instagram user account, tagged to an Instagram product advertising account, or linked to a website.

The type of account was determined as personal, brand, self-care promotional, or other types that did not fit these descriptions. The origin of the post was considered if the post in question was a repost, and if the post mentioned sponsors.

The health themes expressed in the posts were determined by the researchers following the six dimensions of wellness:

1. Emotional: posts that discuss improving one's mental state, such as dealing with hardship
2. Occupational: posts that discuss improving one's work life, such as work-life balance
3. Physical: posts that discuss improving one's body, such as fitness or nutrition

4. Social: posts that discuss improving one's social life, such as improving relationships with family or friends

5. Intellectual: posts that discuss improving one's intelligence, such as reading difficult literature

6. Spiritual: posts that discuss improving one's moral values, such as discussing the purpose of one's life

Posts may include multiple dimensions of wellness. Along with these themes, posts were determined if they promoted themes of optimal health, illness prevention, early symptom detection, and chronic illness management. Besides health themes, the researchers also considered if posts expressed humor or promoted beauty, hygiene, and/or grooming.

Results

#selfcare Portrayal

The first research question examined how self-care is portrayed on Instagram and how that portrayal aligns with clinical definitions of self-care. Most of the posts (69%, n=137) were geared to a female audience, featured women, were posted by women, or contained tags directed towards women. In contrast, only two posts (1%, n=2) were geared toward a male audience. Most of the posts were either image-based (73%, n=146) or text-based (26%, n=52.5). The majority of posts with the tag were found to contain pictures of people (40%, n=80), though there were some posts containing images of products (7%, n=14), art (6%, n=12), and quotes (4.5%, n=9).

Overall, the posts were mostly positive or affirmational (62%, n=123.5) with a few using humor (9%, n=17.5).

#selfcare in the Six Dimensions of Wellness

Nearly half (43%, n=86) of the posts were explicitly health related. Of the dimensions of wellness, 23% (n=46.5) were related to emotional health, physical health (19%, n=38), social health (6%, n=12), optimal health (5%, n=9.5), spiritual health (3.5%, n=7), and occupational health (1%, n=2). There were only a few posts related to intellectual health (3.3%, n=6.5).

The study's results exemplify the popularity of physical health in that 40% of posts contained images of people, and 62% of posts were considered positive. One common trend when going through posts was that many users posted photos of their

bodies, often after exercise. This trend would suggest that a substantial fraction of users experience pride in their bodies and use the #selfcare tag to express that pride. For these users, self-care was about improving and having pride in one's physical self.

Even though self-care techniques have previously been critical in illness prevention and chronic illness management, only two posts discussed illness prevention, and 3.5 posts discussed chronic illness. Although symptom diagnosis and detection are essential in illness prevention, the two researchers found no posts discussing symptom detection. These results suggest that users posting with the #selfcare tag were of a more mainstream demographic who likely do not have chronic illnesses and lacked interest in diseases. Rather than self-care being a method to remaining healthy, users could have interpreted self-care as a fulfillment method.

Although tangentially health-related, 18% (n=36) of posts were found to be about hygiene or beauty. These findings would demonstrate that roughly one-fifth of posts use the self-care tag to promote beauty. The popularity of beauty in posts with the #selfcare tag may be due to users' general audience sharing posts with the tag. The researchers considered that the audience for most posts with the tag was women. Thus, some users could have used the #selfcare tag to take advantage of the female audience by promoting beauty products or styles. However, most of the posts came from individual accounts, so it was more likely that users considered sharing beauty tips as a form of self-care, since beauty could improve users' general well-being through physical health.

Discussion

This study was the first study to investigate how the tag #selfcare is represented on the social media platform Instagram. The analysis of the 200 posts used in the study demonstrated an overall positive depiction of the tag #selfcare and the popularity of the hashtag among female users and female audiences. The study results also revealed a prevalence of health-related posts using the tag, with many of these posts associated with improving emotional or physical health. These findings align with previous studies that demonstrate the potential positive health effects of Instagram (Hackman & Pember, 2016; Mackson et al., 2019). However, with any social media platform, the potential for harmful, unhealthy messages still exists, and when taking the advice of strangers, users should proceed with caution (Wong et al., 2019). The study demonstrated the popularity of the tag among specific audiences with implications on self-care conveyance through Instagram. Identifying how affirmative content

resonates with the younger user base of the social media platform is essential to indicating which strategies will be the most effective in improving overall wellbeing.

Instagram is especially relevant to millennials and Gen X, who predominate the majority of users (Clement, 2021). Women also make up a little more than most users in the United States, making Instagram a prime platform for female-oriented content (Clement, 2020b). The results of this study revealed that the overwhelming majority of posts using #selfcare were either geared towards female audiences or featured females in the posts. Females are more likely to search social media for fitness and nutrition information (Rennis et al., 2015). The use of social media platforms for proactive self-care techniques may be essential to women who report many symptoms of high stress like lethargy, difficulty falling asleep, poor eating habits, isolation, and feeling extremely anxious. Without information on how to deal healthily with their anxiety, many women may turn to unhealthy habits like drinking alcohol, smoking, overeating, and excessively watching television (American Psychological Association, 2015). These poor habits can become detrimental to their productivity and overall wellbeing. Also, the high rates of depression among women may increase the likelihood of women falling into the cycle of poor lifestyle habits (Brody et al., 2018). These cyclical bad habits are especially harmful when many women claim to lack emotional support to encourage lifestyle changes (American Psychological Association, 2015). Individuals are more likely to adopt self-care into their lives when they have a strong and positive self-awareness, and other individuals surround them by either partaking in or promoting similar activities (Godfrey et al., 2010). Self-care content promoted through social media may help many women alleviate their stress and find healthy coping mechanisms.

Mental health is an essential aspect of the phenomena of self-care on social media platforms. The analysis of the posts in this study demonstrated the popularity of mental health-related posts with the #selfcare tag, which displays the importance of encouraging mental health awareness and healthy coping strategies within self-care methods. Like deep breathing and meditation, specific self-care techniques have proven to have effects on stress reduction and improved moods. Many individuals with chronic illnesses claim that taking responsibility for their mental and emotional health through self-care radically improves their attitudes, productivity, and perceptions of control over their lives (Godfrey et al., 2010). In many ways, self-care has become popularized through the media and endorsements by celebrities.

A famous celebrity, Demi Lovato, increased the public's interest in mental health and self-care strategies through the open dialogue of her personal struggles with her mental health disorder and addictions. Public figures' endorsements of a culture of self-improvement and encouraging awareness of self-worth make mental health struggles more relatable, thus causing self-care to become more achievable (Franssen, 2020). The attention of mental health greatly influences self-care popularity in today's society. Self-care embodies positive themes and affirmative messages by establishing emotional bonds through separate communities on social media.

Social media platforms, like Instagram, create a sense of kinship between individuals who would otherwise not know each other. Peer support among adolescents with similar situations on Instagram can facilitate open discussions and mutual feelings of support (Kamel Boulos et al., 2016). Instagram has also been associated with lower levels of loneliness and beneficial psychological impacts by creating a positive feedback that increases individuals' sense of belonging (Mackson et al., 2019). The perceived significance of social support among Instagram users could explain the commonality of tagging other accounts and the high engagement of posts with the tag #selfcare. Users who promote self-care strategies might resonate with other users with similar posts in that they engage with the posts by liking, sharing, commenting, or retagging other accounts. When users share personal photos daily as a method of self-care, they develop role identities and friendships within a virtual community (Brewster & Cox, 2019). The socialization aspect of Instagram allows users to establish communal values that represent shared beliefs through virtual interactions. The social media platform also fosters social relationships and social learning through discussions of knowledge and attitudes (Lin & Kishore, 2021). However, social interactions about self-care strategies or mental or physical problems may become problematic with inaccurate and misleading information. Although the intentions behind sharing information about self-care and advice for emotional or physical issues may be well intended, the problems lie with the quality of the shared knowledge and the potentially harmful behaviors suggested (Bucci et al., 2019). The potentially deleterious effects of content on social media could also be associated with how physical health is portrayed as self-care on Instagram.

The promotion of physical health by tagging an image of an individual's body with the tag #selfcare demonstrates the potential implications of Instagram on body image. Although the initial posters may develop increased self-esteem from vulnerably

posting a personal photo, other users may encounter decreased self-esteem from social comparisons (Wong et al., 2019). Adolescent or young adult women, who are especially vulnerable to unfavorable social comparisons, may view these posts and feel negative social pressure to lose a certain amount of weight or look a certain way to feel a sense of self-worth (Hackman & Pember, 2016). Increased Instagram use among women has been correlated with increased anxiety about physical appearance and body image disturbances and increased depression mediated by social comparisons (Engeln et al., 2020; Lup et al., 2015; Hwang, 2019; Sherlock & Wagstaff, 2019). The harmful effects of Instagram may significantly impact body image perceptions because of its focus on images over text (Engeln et al., 2020), evidenced in this study. The depiction of self-care on Instagram is dependent on how it is perceived. While some users might find body images to be motivating and affirmative, other users may compare themselves and, in turn, reduce their self-esteem.

Another critical component of the portrayal of self-care on Instagram was a beauty and hygiene theme. The prevalence of beauty-themed content with the tag #selfcare may be explained by the overwhelmingly female audience and female posters. Although users might perceive content conveying self-care through beauty or hygiene strategies as positive, ulterior motives for product endorsements and consumer marketing may encourage the popularity of beauty self-care on Instagram. Specific trends of self-care beauty techniques may promote altering one's appearance to validate attractiveness. Conflicting interests occur when doctors or other healthcare providers self-promote their cosmetic procedures for financial gain by encouraging individuals to care for themselves by modifying their appearance. These cosmetic procedures and photo-enhancing trends on Instagram could perpetuate unrealistic expectations and create body image disturbances (Wong et al., 2019). The constant flow of altered images on Instagram manipulates what society views as idealistic beauty (Engeln et al., 2020). Constant social comparisons, where women perceive their beauty as less than the images, can lead to emotional disturbances (Hwang, 2019; Lup et al., 2015; Sherlock & Wagstaff, 2019; Tiggemann & Zaccardo, 2015). When women, the predominant users of the #selfcare tag, view images of idealized beauty and fitness on Instagram, their self-rated attractiveness scores decrease. Chronic exposure to idealized images could have long-term psychological effects on young women and adolescents (Sherlock & Wagstaff, 2019). Self-care techniques related to beauty might be a positive means for social media users to take care of their

health and partake in fulfilling and relaxing activities. However, specific promotions of self-care beauty strategies may be linked to conflicting interests and promote unrealistic beauty expectations that could cause negative psychological impacts.

Overall, Instagram users find the self-care trend positive and affirmative on the social media platform. Users may feel a sense of community with other users who encourage self-care and desire to connect and engage with similar users. They might find the content motivating to improve their emotional and physical health. However, users who frequently post or search images relating to self-care should be aware of the potential adverse effects of social comparisons and be conscious of how modified images do not portray reality. By viewing the content with caution, users may be able to utilize self-care content on Instagram to benefit their overall wellbeing.

Limitations

Several limitations exist with this study. A confined number of studies have investigated the portrayal of specific topics on Instagram, leading to discrepancies in sampling methods during analysis. The analysis of this study included two coders and compiled their results in a table. However, coding is subject to systematic bias and could differ between researchers. Also, users' engagement with posts does not objectively indicate whether users utilized the information about self-care. It is not easy to deduce actual behaviors and attitudes from social media behaviors (Blackstone & Russie, 2020). Additionally, the 200 posts chosen for this study do not depict the millions of posts on Instagram that encourage self-care and could not be generalized to reflect all of Instagram.

Regardless of the limitations, this study demonstrated common perceptions and themes surrounding self-care on the popular social media platform Instagram. It conveyed how self-care is directed towards women and brought awareness to the effects of social media on people's impression of mental and physical health. Also, this study communicated how the information shared through social media should be regulated to avoid biased claims and social comparisons. We would require more investigations into whether the behaviors of users who engage with a post reflect the content they engage with. Further analysis of these behaviors could be accomplished through questionnaires using socio-behavioral theories. This more in-depth analysis would determine how Instagram content impacts individuals' emotions and behaviors and would give a better perspective of the social media platform's influence.

Table 1

Instagram Variable Frequencies

Variable	Response Options	Combined Frequency (n=200)
Average Number of Comments	Number	39.8%
Average Number of Likes	Number	1634.8%
Portrayal of Self-care	Negative	0.3%
	Positive	61.9%
	Not Apparent	37.6%
Image Type*	Still Image	73.2%
	Video	0.5%
	Text Only	26.3%
Image Contents	Product or Products	7.0%
	People	40.1%
	Art or Illustrations	6.0%
	Nature Scene Photography	0%
	Food Photography	1.5%
	Quote	4.5%
	Animal	0.3%
	Combination	7.5%
	Other	33.1%
Audience	Women	55.4%
	Men	1.0%
	Both	3.5%
	Not Apparent	40.1%
Tag to another IG account	Yes	21.8%
Tag to a product account	Yes	7.5%
Link to website in caption	Yes	1.0%
Repost	Yes	3.0%
Mentions sponsor	Yes	3.0%
Type of account	Personal	45.6%
	Brand	7.8%
	Self-care promotion	7.3%
	Other	39.4%
Does this post include the following kinds of health themes?: **Optimal Health**	Yes	4.7%
Does this post include the following kinds of health themes?: **Illness Prevention**	Yes	1.0%
Does this post include the following kinds of health themes?: **Detecting Symptoms Early**	Yes	0%
Does this post include the following kinds of health themes?: **Managing Chronic Illness**	Yes	1.8%
Does this post include the following dimension of wellness?: **Social**	Yes	5.8%
Does this post include the following dimension of wellness?: **Emotional**	Yes	23.3%
Does this post include the following dimension of wellness?: **Occupational**	Yes	1.0%
Does this post include the following dimension of wellness?: **Spiritual**	Yes	3.5%
Does this post include the following dimension of wellness?: **Physical**	Yes	19.1%
Does this post include the following dimension of wellness?: **Intellectual**	Yes	3.3%
Does this post include **any** of the health or wellness related themes mentioned?	Yes	43.1%
Does this post include the following themes?: **Humor**	Yes	8.8%
Does this post include the following themes?: **Beauty, Hygiene, Grooming**	Yes	18.0%
Women?*	Yes	68.7%

***Meaning**: this post contains a picture of a woman, is targeted towards a female audience, you can easily tell by name/profile pic this was posted by a woman's account, AND/OR contains hashtags targeting women.

References

Al-Eisa, E., Al-Rushud, A., Alghadir, A., Anwer, S., Al-Harabi, B., Al-Sugahaier, N., Al-Yoseef, N., Al-Otaibi, R., & Al-Muhaysin, H.A. (2016). Effect of Motivation by "Instagram" on Adherence to Physical Activity among Female College Students. *BioMed Research International*, 2016, 1-6. https://dx.doi.org/10.1155/2016/1546013.

American Psychological Association. (2015). Stress in America. Paying with our health. From https://www.apa.org/news/press/releases/stress/2014/stress-report.pdf.

Ayala, E. E., Winseman, J. S., Johnsen, R. D., & Mason, H. (2018). U.S. medical students who engage in self-care report less stress and higher quality of life. *BMC medical education*, 18(1), 189. https://doi.org/10.1186/s12909-018-1296-x.

Blackstone, S., & Russie, C. (2020). Using Instagram to deliver a theory-based wellness intervention designed to promote behavior change. *European Journal of Public Health*, 30(Supplement_5), ckaa166-008. https://doi.org/10.1093/eurpub/ckaa166.008.

Brewster, L., & Cox, A. M. (2019). The daily digital practice as a form of self-care: Using photography for everyday well-being. *Health*, 23(6), 621-638. https://doi.org/10.1177%2F1363459318769465.

Brody, D. J., Pratt, L. A., & Hughes, J. P. (2018). Prevalence of Depression Among Adults Aged 20 and Over: United States, 2013-2016. *NCHS Data Brief*, (303), 1-8. From https://www.cdc.gov/nchs/products/databriefs/db303.htm.

Bucci, S., Schwannauer, M., & Berry, N. (2019). The digital revolution and its impact on mental health care. *Psychology and Psychotherapy: Theory, Research and Practice*, 92(2), 277-297. https://doi.org/10.1111/papt.12222.

Clement, J. (2019). Number of monthly active Instagram users from January 2013 to June 2018. In *Statista - Social Media & User-Generated Content.* From https://www.statista.com/statistics/253577/number-of-monthly-active-instagram-users/.

Clement, J. (2020a). Instagram user share in the United States 2020, by age group. In *Statista - Social Media & User-Generated Content.* From https://www.statista.com/statistics/398166/us-instagram-user-age-distribution/.

Clement, J. (2020b). Instagram user share in the United States 2020, by gender. In *Statista - Social Media & User-Generated Content*. From https://www.statista.com/statistics/530498/instagram-users-in-the-us-by-gender/.

Clement, J. (2020c). Instagram: distribution of global audiences 2020, by gender. In *Statista - Social Media & User-Generated Content*. From https://www.statista.com/statistics/802776/distribution-of-users-on-instagram-worldwide-gender/.

Clement, J. (2021). Distribution of Instagram users worldwide as of January 2021, by age group. In *Statista - Social Media & User-Generated Content*. From https://www.statista.com/statistics/325587/instagram-global-age-group/.

Custers, K. (2015). The urgent matter of online pro-eating disorder content and children: clinical practice. *European Journal of Pediatrics,* 174(4), 429-433. http://dx.doi.org/10.1007%2Fs00431-015-2487-7.

Engeln, R., Loach, R., Imundo, M. N., & Zola, A. (2020). Compared to Facebook, Instagram use causes more appearance comparison and lower body satisfaction in college women. *Body Image*, 34, 38-45. https://doi.org/10.1016/j.bodyim.2020.04.007.

Franssen, G. (2020). The celebritization of self-care: The celebrity health narrative of Demi Lovato and the sickscape of mental illness. *European Journal of Cultural Studies*, 23(1), 89-111. https://doi.org/10.1177%2F1367549419861636.

Godfrey, C.M., Harrison, M.B., Lysaght, R., Lamb, M., Graham, I.D., & Oakley, P. (2010). The experience of self-care: a systematic review. *JBI Libr Syst Rev*, 8(34), 1351-1460. doi: 10.11124/jbisrir-2010-168.

Hackman, C. L., & Pember, S. E. (2016). Qualitative Investigation of Health Information Seeking Behavior Utilizing Social Media in A College Population. *American Journal of Health Studies,* 31(1).

Hettler, B. (1976). The Six Dimensions of Wellness Model. Retrieved from https://cdn.ymaws.com/members.nationalwellness.org/resource/resmgr/pdfs/sixdimensionsfactsheet.pdf.

Hwang, H.S. (2019). Why Social Comparison on Instagram Matters: Its impact on Depression. *KSII Transactions on Internet and Information Systems,* 13(3), 1626-1638. https://dx.doi.org/10.3837/tiis.2019.03.029.

Kamel Boulos, M., Giustini, D., & Wheeler, S. (2016). Instagram and WhatsApp in Health and Healthcare: An Overview. *Future Internet*, 8(3), 37. https://dx.doi.org/10.3390/fi8030037.

Kessing, D., Denollet, J., Widdershoven, J., & Kupper, N. (2017). Self-care and health-related quality of life in chronic heart failure: A longitudinal analysis. *European Journal of Cardiovascular Nursing: Journal of the Working Group on Cardiovascular Nursing of the European Society of Cardiology*, 16(7), 605–613. https://doi.org/10.1177/1474515117702021.

Lin, X., & Kishore, R. (2021). Social media-enabled healthcare: A conceptual model of social media affordances, online social support, and health behaviors and outcomes. *Technological Forecasting and Social Change*, 166, 120574. https://doi.org/10.1016/j.techfore.2021.120574.

Lup, K., Trub, L., & Rosenthal, L. (2015). Instagram #instasad?: Exploring associations among Instagram use, depressive symptoms, negative social comparison, and strangers followed. *Cyberpsychology, Behavior, and Social Networking*, 18(5), 247-252. https://doi.org/10.1089/cyber.2014.0560.

Mackson, S.B., Brochu, P.M., & Schneider, B.A. (2019). Instagram: Friend or foe? The application's association with psychological well-being. *New Media & Society*, 1-23. https://dx.doi.org/10.1177/1461444819840021.

Rennis, L., McNamara, G., Seidel, E., & Shneyderman, Y. (2015). Google it!: Urban community college students' use of the internet to obtain self-care and personal health information. *College Student Journal*, 49(3), 414-426. From https://www.ingentaconnect.com/content/prin/csj/2015/00000049/00000003/art00010.

SAMHSA, Center for Behavioral Health Statistics and Quality (2018). Results from the 2017 National Survey on Drug Use and Health: Summary of National Findings. Rockville, MD: U.S. Department of Health and Human Services; 2018. https://www.samhsa.gov/data/sites/default/files/cbhsq-reports/NSDUHMethodSummDefs2017/NSDUHMethodSummDefs2017.pdf.

Sherlock, M., & Wagstaff, D. L. (2019). Exploring the relationship between frequency of Instagram use, exposure to idealized images, and psychological well-being in women. *Psychology of Popular Media Culture,* 8(4), 482. https://psycnet.apa.org/doi/10.1037/ppm0000182.

Stoewen, D. L. (2017). Dimensions of wellness: Change your habits, change your life. *The Canadian Veterinary Journal*, 58(8), 861–862. From https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5508938/.

Tiggemann, M., & Zaccardo, M. (2015). "Exercise to be fit, not skinny": The effect of fitspiration imagery on women's body image. *Body Image*, 15, 61-67. https://dx.doi.org/10.1016/j.bodyim.2015.06.003.

Wong, X. L., Liu, R. C., & Sebaratnam, D. F. (2019). Evolving role of Instagram in #medicine. *Internal Medicine Journal,* 49(10), 1329-1332. https://doi.org/10.1111/imj.14448.