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# The Use of Social Networking Sites by Adolescents with Psychiatric Illnesses: A Qualitative Study

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#### Abstract

**Background:** Social networking sites (SNSs) are increasingly dominant platforms for communication among adolescents. Recently, concerns have been raised about the risks involved with SNS use, particularly among more vulnerable adolescents. **Objective:** Our goal was to explore the experience of SNS use by adolescents with psychiatric illnesses. We also sought to understand the ways in which these sites may be a useful way to communicate—as well as a potential source of increased stress—for this vulnerable population.

**Methods:** We performed a qualitative study by conducting in-depth, semi-structured interviews with 20 adolescents (mean age, 16 years; 15 female and 5 male participants) attending the Yale Adolescent Intensive Outpatient Program, which includes 3 hours of outpatient treatment 3 or 4 days per week.

**Results:** The participants in our study described multiple ways in which SNSs possessed unique utility as platforms for communication. Participants found that SNSs allowed them to reach out to a broader audience and to "broadcast" feelings of distress without forcing any specific person into a supportive discussion. In addition, SNSs were described as lower-stress means of communication that allowed responses to be carefully formulated; this led to participants sharing information that they would not have shared during face-to-face interactions. However, participants also described anxiety surrounding the pressure to be active on SNSs, and they found it stressful to be exposed to pictures and posts involving former romantic partners.

**Conclusion:** SNSs provide a useful platform for adolescents with psychiatric illnesses to use to communicate, particularly with regard to communicating any feelings of distress. However, there are many ways in which SNSs can increase levels of anxiety, and this aspect may be an important focus of future clinical attention.

Keywords: Social networks; Facebook; Online communication

# Introduction

Social networking sites (SNSs) are services that allow users to construct online profiles and to form connections with other users. Users are then able to communicate with and explore the profiles of other users according to sets of rules that vary across different sites (1). The first SNS (SixDegrees.com) was launched in 1997; it consisted of user profiles, lists of friends, and messaging options. However, it was after the launch of Facebook in 2004 that these services entered a period of unprecedented growth and significance (1). Facebook currently has more than 1 billion users, 757 million of whom access the site daily (2). Additional SNSs that have gained popularity include Twitter, Instagram, MySpace, and

LinkedIn, and new services continue to be developed.

A significant amount of research has been conducted to explore various aspects of SNSs, including the patterns in which they are used and the reasons that people consider them to be of value (3-5). The risks associated with SNS use are also an increasing focus of investigation. A prominent example is the phenomenon of cyberbullying, which was found by a large study to be more damaging than traditional bullying because of the perceived 24/7 nature of SNS interactions (6). Specifically, adolescents who were experiencing cyberbullying reported significantly more social difficulties and higher levels of anxiety and

depression as compared with victims of traditional bullying (6). Another study found that cyberbullying is associated with increased substance use and mental health problems (7). Less overt risks have also been described, including the use of SNSs for people to engage in antisocial behavior (8) and the phenomenon of "distorted perception" (9) that may result from people comparing their own lives to the way others' lives may appear on Facebook. (This most often leads people to conclude that their lives are less happy than the lives of their Facebook friends.)

A more nascent discussion involves the use and consequences of SNS use among anxious adolescents. It had previously been predicted that SNSs would prove to be of utility to this population by giving those with social inhibitions the ability to interact in an environment that facilitated greater anonymity, required less interpretation of social cues, and provided time for the planning of interactions (10,11). A recent study by Baker and Oswald (12) found that individuals with high degrees of shyness reported a stronger association between Facebook use and friendship quality. Supporting this finding is the results of a study of 80 female adolescents which found that participants with unsatisfactory offline social lives were able to compensate to some extent using communication (13). However, other studies have found that those who are socially anxious offline are also less successful online; this is a phenomenon described as the "rich get richer" and the "poor get poorer" hypothesis (10).

In this study, we sought to explore these phenomena in a group of adolescents with psychiatric illnesses. This represents an important area for study given the interactions between psychiatric illnesses, anxiety, and self-esteem issues (14). There is a limited understanding of how individuals with these underlying vulnerabilities experience the use of SNSs and whether this innovation is in fact providing a helpful platform for communication. This is particularly relevant given the likely need for these individuals to communicate thoughts or feelings of distress. In addition, there has been little investigation into how SNSs may in fact contribute to worsened anxiety. Our study represents a preliminary exploration of these ideas.

#### Methods

Over a 1-month period, we recruited a sample of 20 patients between the ages of 14 and 18 years (mean age, 16 years; standard deviation, 1.37) who were currently enrolled in the Yale Psychiatry Adolescent Intensive Outpatient Program. Of the 20

participants in our study, 5 were male and 15 female. Twelve participants had a primary diagnosis of major depressive disorder, three had a primary diagnosis of mood disorder not otherwise specified, two had a primary diagnosis of post-traumatic stress disorder, one had a primary diagnosis of psychosis not otherwise specified, and one had a primary diagnosis of attention-deficit/hyperactivity disorder. See Table 1 for further demographic details. The Intensive Outpatient Program comprised 3 hours of outpatient treatment 3 or 4 days a week and included both group therapy and individual medication management from a psychiatrist. Informed consent was obtained through phone calls to the parents of the participants, after which the adolescents themselves were offered opportunity to participate. Those who agreed took part in in-depth, semi-structured interviews in which open-ended questions were used to elicit narrative descriptions of their experiences with SNSs (15). Sample questions are listed in Table 2. Interviews were conducted by authors GVS, KK, and PM, all of who have extensive experience conducting interviews with members of this population. Author GVS had extensive experience conducting qualitative research interviews and thus provided the initial training and subsequent supervision of the co-authors throughout the study.

Table 1. Demographics

Parti- cipant	Age	Gender	Race	Diagnosis
1	16	Male	Caucasian	ADHD, mood disorder NOS
2	19	Female	Caucasian	MDD
3	16	Male	Caucasian	MDD, anxiety disorder NOS
4	15	Female	Caucasian	MDD, PTSD
5	15	Female	Caucasian	Psychosis NOS, PTSD
6	18	Female	Caucasian	MDD
7	15	Female	Hispanic	PTSD
8	14	Male	Caucasian	MDD, anxiety disorder NOS
9	14	Female	Caucasian	Mood disorder NOS
10	17	Female	Mixed ethnicity	Mood disorder NOS, learning disability
11	14	Female	Caucasian	Mood disorder NOS, ODD
12	16	Female	Caucasian	MDD
13	17	Male	Caucasian	MDD
14	17	Female	Caucasian	PTSD, mood disorder NOS
15	18	Female	Caucasian	MDD, anxiety
16	16	Female	Caucasian	MDD
17	17	Male	Hispanic	MDD
18	16	Female	Hispanic	MDD
19	16	Female	Caucasian	MDD, anxiety disorder NOS
20	16	Female	Caucasian	MDD

Note. ADHD, Attention-deficit/hyperactivity disorder; MDD, major depressive disorder; NOS, not otherwise specified; PTSD, post-traumatic stress disorder

#### Table 2. Sample questions

- In what ways do you use online social networks like Facebook?
- 2. How is talking over Facebook or another social network different from talking to someone face to face?
- 3. In what ways have online social networks been helpful to you?
  - a. Have you reached out to others in times of crisis?
- b. Do they represent a lower-stress way to communicate?
- 4. Have social networks like Facebook ever made you more stressed out?
- a. In what ways?
- b. Have you experienced any bullying?
- c. What's like having contact with your friends all the time?
- $d. \;\;$  Do you ever feel like you need to monitor Facebook to stay up to date?

The interviews were transcribed and analyzed with the use of inductive thematic analysis, during which data were subjected to repeated rounds of coding with the aid of QSR International's NVivo data analysis software. Specifically, transcripts were read, and specific responses were labeled descriptively according to their content, without consideration for a specific theoretical framework. Responses that centered on similar content were coded together. After this process was complete for all of the transcribed interviews, the codes that had been generated were reviewed to ensure that data were appropriately labeled. Redundant codes were merged, and codes that appeared to be related (e.g., those that referred to similar issues but were not clearly the same) were placed in hierarchies or groups. This process was then repeated with a refined set of codes. The coding process was completed by author GVS and reviewed with coauthor KK at several stages. When reporting the data, preference is given to the themes that emerged most consistently across the sample (16). Approval for the study was obtained from the Yale University Human Investigation Committee.

#### Results

Several prominent themes emerged during this study and are best organized around two main ideas (Table 3). First, participants consistently described the advantages of SNSs as including providing them with a context in which it was easier to communicate and open up about their problems, with substantial benefits experienced in terms of having access to a large support network. Seventeen participants described some way in which they had found SNSs to be helpful. However, equally prominent was the extent to which SNSs resulted in significant anxiety as a result of the perception that a lack of engagement or, indeed, less successful engagement would lead to negative peer evaluation; such concerns were highlighted by 18 participants. Participants also shared several examples of how these opposing ideas had interacted to both their benefit and their detriment at different times. Both female and male participants appeared to have similar ideas about the usefulness of SNSs and the associated potential for anxiety.

#### Table 3. Summary of themes

- Unique features of communicating on social networking sites

- -Broader access to sources of support
- -Ability to "broadcast" feelings to a large audience
- -Messages of support stored for future
- -Less stressful way to open up about problems
- -Allows time to formulate responses carefully
- Ways in which social networking sites make participants feel more anxious
  - rticipants feel more anxious
  - -Time to agonize about their responses -Fear about missing out if not engaged
  - -Anxiety about posts being negatively
  - perceived
  - -Negative content may be posted by others
  - -Exposure to the experiences of one's former romantic partners

# The Unique Usefulness of Communicating on a Social Networking Site

Participants spoke about the advantages of communicating via SNSs, particularly with regard to conveying feelings of distress or anxiety. A number of these advantages related to the practical benefits of the technology for broadening their access to sources of support. When asked whether SNSs had ever been helpful to them, several participants described instances in which they had been able to reach out to people living far away:

"I mean, I had a really bad upbringing and stuff, so it's difficult for me to, um, talk to people, and then, social networks just help me because of the fact that I'm able to contact certain people...that I know will, like, support me in different things, when even though they might be far away from me, or somewhere, they're still there."

—Participant 7, a 15-year-old female

Participants further described the advantages of being able to post messages on their SNS walls, thereby communicating their distress to a broader audience and then being able to discuss their issues further with whoever was available to assist them:

"On the wall, I'll post, like, 'Having a bad day,' and, like, my friends, they'll private chat me, and they'll be like, 'What's wrong?"

—Participant 7, a 15-year-old female

"They might not be ready for it or whatever, versus some people, they might see it, and it's just gonna be like, 'I should answer it, I should help,'

and other people might be like 'No, I'm not gonna do that right now.' 'Cause you don't know what they're going through at that moment."

# —Participant 8, a 14-year-old male

Other practical advantages that were mentioned included being able to look back at previous messages of support that were stored online and having constant access to supportive friends:

"I have a good friend of mine, who I talk to a lot, and she's been, too, in like a very similar situation that I've been, so when I can't, like, go talk to her in person, I talk to her over Facebook, and she helps me a lot and vice versa. There's just one person that I always talk to, which is her, which, when I can't, like, get hold of her, she's always on Facebook, so I can always reach her through Facebook."

# —Participant 10, a 17-year-old female

In addition to describing the mechanisms by which SNSs broadened their access to support, the majority of participants also described a sense in which it was more comfortable for them to open up about their problems online:

"It's actually helped me to talk to people and open up to people, because I've been able to, like, tell my sister what's been going on with me, through, like, Facebook, [as] opposed to having to tell her face to face, where I'd be really overwhelmed and anxious and I wouldn't be able to."

## —Participant 20, a 16-year-old female

"Cause some people don't like things, like, straight to someone's face, they like saying it through, like, a phone or something, like, so they don't, like, they can't judge them or something. So I find it easier to just type it to them."

# —Participant 17, a 17-year-old male

This sense of online interactions being less anxiety provoking and less likely to result in perceived judgment was reiterated by several participants. Three participants suggested that this had led to their being able to communicate in a way that helped them to avoid self-injurious behavior:

"I have actually [reached out] to my best friend, I call her my sister. Um, when I've had the urge to cut or I've had suicidal thoughts, I've messaged her and told her, and she's talked, like, talked me through it and talked me out if it. And, like, it's helped me a lot."

#### —Participant 20, a 16-year-old male

An additional advantage mentioned was the ability afforded by the medium to provide the necessary time to consider, formulate, and reformulate responses:

"Um, I think talking over Facebook or Instagram or stuff like that, it's, like, you feel more comfortable, because you're not in front of the person, and you have, like, time to think about what you want to say, and if, like, you don't want to say it, you can just erase it and rewrite it. But if you just are talking to the person, you kinda can't take back what you said."

# —Participant 10, a 17-year-old female

Although this additional response time was often described as an advantage, some participants framed it as a potential source of anxiety:

"I, like, over-analyze everything I've written. Like, if I'm commenting on something, I, like, read it over and over again before I post it. Like, I'm just like, uh, and tweet, like, I'll look back at my past tweets and be like, 'Oh, I shouldn't have posted that."

# —Participant 16, a 16-year-old female

This was one of many examples that our participants provided about specific ways in which SNSs led to them feeling more anxious. More details about this phenomenon are provided in the next section.

# The Use of Social Networking Sites Made Participants Feel Anxious

Eighteen of the participants in our study described some way in which SNSs contributed to their anxiety. Broadly, the sources of anxiety were divided into two areas: those surrounding the consequences of not being engaged on SNSs and those that arose during the course of participation in an SNS, while either posting or viewing content. With regard to the issue of being engaged, some participants described their concern about missing out on things:

"I remember, I didn't have my phone, so I couldn't see what was going on with everyone. Everyone around me was like, 'Oh my god, that's so funny,' and I was like, 'Oh, what's going on?""

#### —Participant 7, a 15-year-old female

"Like, I mean, I guess it could be like you might feel like you might have to be on it all the time and always be checking it, because who knows what's gonna come up, like somebody could be doing something. I mean, I guess that could be stressful, because you feel like you have to spend all your time on the computer or your phone checking it."

—Participant 19, a 16-year-old female

Another participant framed it as follows:

"[I]t's just kinda like addicting to look through it [SNS], so during like homework or something, then I will resort to my social networks, but when I really should be doing my homework, so then I end up being much more stressed out."

# —Participant 4, a 15-year-old female

When participants were engaged with SNSs, they described concerns about how the content they were posting was being perceived:

"Like I said, I over-analyze everything. If I see, like, really pretty girls in pictures or something or, like, if I'm not getting as many 'likes' as someone else, like, it definitely causes a lot of stress actually. Like, if you have a picture, if I post a picture of, like, me and two of my friends, but then, like, another girl does the same thing and she gets the more 'likes' than I do, I'll take it very personally."

—Participant 16, a 16-year-old female

Participant 15, an 18-year-old female, described these concerns as follows:

Participant 15: "Cause, like, if you don't post good statuses or whatever, then people are gonna be like, 'You're not cool, because you can't do this' or whatever, and how many likes you get on a photo..."

Interviewer: "That stuff matters?"

Participant 15: "Yeah."

This type of anxiety extended to content that was posted about these individuals by other users:

"When people put, like, embarrassing pictures of me, like, there's a thing that people do on Instagram called 'Women Crush Wednesday,' and, like, a lot of my friends, they usually put, like, embarrassing pictures of, like, their friends. And, like, I hate when they put me up there. It's really embarrassing."

—Participant 2, a 19-year-old male

Participants also described distress when seeing content about people with whom they no longer had relationships. A prominent example was being exposed to the lives of former boyfriends and girlfriends:

"Cause it's like my ex-boyfriend, I know we were, we were together for like a year or so, and then I realized that, um, we had broken up, and it's been a while, but we still, like, decided that we were gonna be friends, and so we were okay with it. And then, like, eventually, on his wall, he would post, you know, 'Just went out on my date with my girlfriend,' and I'd be really upset, because, you know, like, he would take her to places that we used to go."

—Participant 7, a 15-year-old female

In some isolated cases, participants described instances in which they had been bullied online, either by friends or, in some cases, people they had never met, although overall this was a less prominent theme.

#### Discussion

The findings related to the utility of SNSs in our sample are consistent with those found in the existing literature, which suggests that this form of communication has several advantages for individuals who are socially anxious (10,11). However, our study raises several new points of interest in this regard. First, there was the idea that

SNSs allowed people to communicate their distress in a non-specific manner to a broad audience through the use of mechanisms such as the Facebook wall. This appeared to be of value for "broadcasting" distress without pushing anyone into a conversation for which they might not have the capacity or desire at a specific time. As a result, the user could be assured that whoever replied was someone who had declared his or her willingness to engage in a supportive discussion. This is of particular value for a population in which concerns about self-esteem may be of significance and in which fear may exist that one is being "overburdensome" to his or her support network (13). The utility of this feature of SNSs was enhanced by the fact that participants reported being able to maintain contact with friends and family who lived further away and who may perhaps otherwise not have been potential sources of support.

Our study provides further support for existing ideas that communication via SNSs may in some ways be less stressful than other forms of communication (3,10,11). In particular, participants described being able to "open up"; in some cases, they even stated that this had led to them discussing things that they previously had not been able to discuss. This is consistent with a well-articulated theory by Schouten and colleagues (17), which describes the concept of enhanced self-disclosure and suggests that people are more willing to open up about significant details of their lives within the context of online interactions. It is also suggested that this phenomenon could lead to improved relationships, because self-disclosure is thought to be of value in this regard (17). Our findings further support this idea by suggesting that an increased willingness to disclose via SNSs could be of value preventing negative behaviors adolescents with mental illnesses.

The concept of SNSs allowing people to have time to prepare their responses was previously described by Arkin and Grove (11). This was clearly a significant theme in our study, although it was not always considered to be beneficial. Some participants did consider being able to type, read, and edit a response to be an advantage, but it was clear that, in other instances, this led to participants becoming obsessive about how they were posting and how their posts were perceived by others. The overall consequence of this feature of SNS communication therefore remains unclear, although our results suggest that it is not of benefit in all cases.

A second significant cluster of findings in our study related to ways in which the use of SNSs contributed to increased stress or anxiety in the lives of our participants. The bulk of existing literature in

describes this area the phenomenon cyberbullying. However, in our study, participants emphasized the ways in which a lack of engagement with SNSs contributed to their anxiety, because they felt that they were missing out on important developments going on within their peer networks. Participants described feeling pressure to constantly monitor the various SNSs in which they were engaged, and this resulted in them having difficulty engaging in other activities, such as doing homework. To our knowledge, this finding has not been discussed in existing literature, but it is consistent with the previously mentioned theory described by Valkenburg (10) whereby the "rich get richer" and the "poor get poorer," which suggests that those who are most effective at managing offline relationships are also most effective at managing online relationships (and vice versa). This finding points toward an extension of that idea by suggesting that individuals who have difficulty with their offline interactions may feel a particular pressure to be effectively engaged online, which potentially leads to a more stressful online experience.

Consistent with this idea were the vivid descriptions that multiple participants gave of being very anxious about the content they posted on SNSs. They often found themselves agonizing about the wording of their posts or how they might appear in images. Participants appeared to believe that posting content that would be literally "liked" could be of benefit to their social status, thereby leading to them to attribute high stakes to every online interaction. However, it is unclear whether this ever truly led to significant improvements in the quality of their relationships or their self-esteem, although the immediate effect on their levels of stress and anxiety was apparent. Further research is needed to determine the extent to which the ability to think and plan responses is in fact of value to SNS users with anxiety.

A final idea of interest found by this study relates to the stress that our participants described feeling when browsing SNSs. Specifically, participants discussed how seeing the pictures and posts of individuals with whom they had largely suspended offline contact could lead to negative feelings. Most often, this involved seeing the posts of former boyfriends or girlfriends with whom they continued to be friends on SNSs. Participants described a range of reactions from simply being upset to feelings of jealousy, particularly in cases in which the former romantic partner was posting about engaging in activities with a new significant other. This finding resonates most closely with the reports of Chou and Edge (9), who found that people have a tendency to feel that their lives are worse than those of their online friends; this finding is thought to be related to a form of posting bias. It appears that the participants in our study who had maintained only online contact with former partners would, over time, be exposed to positive events and new relationships in that person's life but perhaps be less aware of negative experiences that person may have gone through, thus leading to a sense that the ex-partner had more successfully navigated the breakup.

#### Clinical Significance

The results of our study represent a preliminary exploration of the experience of SNS use among adolescents with psychiatric illnesses. Our data are consistent with existing descriptions of ways in which SNSs may facilitate communication in the socially anxious population through a number of mechanisms. However, we also found significant evidence to suggest that there are many ways in which the use of SNSs can increase anxiety. In particular, being able to painstakingly formulate responses in addition to feeling pressure to be constantly and successfully engaged create potential sources of stress for our especially vulnerable participants. Our study suggests that the experience of SNSs may be an important focus for clinical attention in this vulnerable population. This consideration will continue to increase in relevance as SNSs become the primary communicative platforms for adolescents.

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