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The social media see-saw: Positive and negative influences on adolescents' affective well-being

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Abstract

Social media use is nearly universal among US-based teens. How do daily interactions with social apps influence adolescents' affective well-being? Survey self-reports ($n = 568$) portray social media use as predominantly positive. Exploratory principal component analysis further indicates that positive and negative emotions form orthogonal response components. In-depth interviews with a sub-sample of youth ($n = 26$), selected for maximum variation, reveal that affect experiences can be organized across four functional dimensions. *Relational interactions* contribute to both closeness and disconnection; *self-expression* facilitates affirmation alongside concern about others' judgments; interest-driven *exploration* confers inspiration and distress; and *browsing* leads to entertainment and boredom, as well as admiration and envy. All interviewees describe positive and negative affect experiences across multiple dimensions. Analyses suggest the relationship between social technology usage and well-being—whether enhanced or degraded—is not confined to an "either/or" framework: the emotional see-saw of social media use is weighted by both positive and negative influences.

Keywords

Adolescents, peer relationships, self-expression, social browsing, social media, social network sites, teenagers, well-being, youth

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There's never a day that goes by where I'm not constantly on social media. I wouldn't say I'm addicted or anything like that, it's just part of my routine. It's just what I do. (Carl,[1] aged 17)

Social media really impacts my life a lot, from morning to night. (Hanna, aged 17)

Social media is intertwined with daily life—for school-aged teens in developed countries, interacting with and through social media platforms (SMPs) is "just part of [the] routine." Among US-based 13- to 17-year-olds, 94% use one or more SMPs (AP-NORC, 2017b). A majority of youth (89%) also have access to smartphones, which enable social media use as they move through their homes, schools, and communities (AP-NORC, 2017b). Yet, although the widespread popularity of SMPs is well-established, the influence of social media on well-being remains controversial (Best et al., 2014; Pantic, 2014).

Hanna and Carl (quoted above) attend a suburban public high school in the Northeastern United States. They are among the students from their school whose self-reports about SMPs inform the current investigation. Hanna's comment reflects an unambiguous personal assessment that social media impacts her daily life. This study systematically examines the nature of social media's positive and negative influences on adolescents' affective well-being.

Social media and well-being

Well-being, which concerns "optimal psychological experience and functioning," is a complex construct that is defined and measured in myriad ways (Ryan and Deci, 2001: 142). Social media studies tend to describe well-being as a general outcome of interest and examine effects related to psychological indicators, including perceptions of happiness and life satisfaction (Chou and Edge, 2012), stress and quality of life (Bevan et al., 2014), decreased depression (Tandoc et al., 2015), and body image (Haferkamp and Krämer, 2011; Meier and Gray, 2014). Yet, despite a growing number of investigations, the relationship between social media use and well-being remains a source of contention (Best et al., 2014; Pantic, 2014).

Previous studies with adult and young adult populations document associations between overall time spent on social media and ill-being (Vannucci et al., 2017; Wright et al., 2013), as well as linear associations between number of social network sites used and both depression and anxiety symptoms (Primack et al., 2017). Heavier Facebook users are more likely to believe others are happier and have better lives (Chou and Edge, 2012). Correlation does not imply causation: individuals with poorer mental health may also be heavier users of SMPs, and/or heavier social media users may use SMPs for different purposes than lighter users. However, Kross et al. (2013) use an experience-sampling method to demonstrate that Facebook use predicts subsequent reductions in affective well-being and overall declines in life satisfaction during a 2-week period. Jelenchick et al. (2013), who also use an experience-sampling method, do not find a relationship between social media use and clinical depression.

More recent research with adolescents suggests a non-linear relationship between quantity of social media use and well-being. In a large-scale, representative survey of English youth ($n = 120{,}115$), the links between digital media use and mental well-being

are described by quadratic functions, which support a "Goldilocks Hypothesis": moderate screentime (including specifically for smartphone and social media use) "is not intrinsically harmful and may even be advantageous in a connected world" (Przybylski and Weinstein, 2017: 204). Przybylski and Weinstein call for further investigation of *how* adolescents' varied digital media experiences relate to well-being.

Indeed, adolescents' social media experiences are influenced by the nature of their networked interactions. Elevated Facebook-related appearance exposure, though not overall Facebook use, is correlated with weight dissatisfaction, drive for thinness, and thin ideation among adolescent girls (Meier and Gray, 2014). Receiving positive peer feedback on profiles enhances adolescents' self-esteem and well-being, whereas negative feedback decreases these outcomes (Valkenburg et al., 2006). Studies with both young adult and adolescent populations also underscore the importance of individual differences. For example, individual differences in envy (Tandoc et al., 2015) and fear of missing out ("FoMO"; Beyens et al., 2016) mediate the relationships between social media use and depression and stress, respectively. Envy also mediates the relationship between passive following and life satisfaction—and intense passive following triggers envy (Krasnova et al., 2013). Both individuals' practices and responses are therefore associated with social media-related outcomes.

Other studies highlight a multitude of positive experiences related to adolescents' uses of networked technologies. Youth can leverage opportunities for self-expression, which enable self-reflection, catharsis, and validating feedback (boyd, 2008; Stern, 2008). Adolescents also use social media for interest-driven learning (Ito et al., 2009) and to strengthen friendships (Reich et al., 2012). Online peer communication can facilitate self-disclosure and a sense of belonging, which support identity development (Davis, 2012). Teens who use SMPs report that social media makes them feel closer to friends (78%), more informed (49%), and connected to family (42%), while comparably fewer teens report feeling pressure to always show the best versions of themselves (15%), overloaded with information (10%), overwhelmed (9%), and/or as though they are missing out (9%) (AP-NORC, 2017a). In a naturalistic study of adolescents' ($n = 172$) text messages over 4 days, interactions were typically positive or neutral (Underwood et al., 2015). However, the adolescents who engaged most heavily in negative text talk also reported more withdrawn depression (Underwood et al., 2015).

George and Odgers (2015) review evidence that adolescents' online behaviors, interactions, and self-presentations "tend to closely mirror their offline activities, interests, and personalities" (p. 843). Related to social interactions, empirical studies support the rich-get-richer and poor-get-poorer hypotheses, which suggest that social skills can transfer online to replicate and amplify differences in offline social success (see Reich, 2016, for discussion). Findings also demonstrate the potential for social compensation: online, individuals can compensate for offline social deficits (Reich, 2016). Across multiple areas of youths' social media use, current research therefore indicates nuanced effect patterns and bidirectional influences.

In sum, adolescent social media use is not intrinsically harmful. Different aspects of teens' social media experiences can positively and negatively influence well-being. Prior studies tend to examine targeted aspects of SMP use, which contribute a collection of potentially relevant social media practices (e.g. self-expression) and well-being-related

outcomes (e.g. envy, connectedness). However, it remains yet unclear how various positive and negative social media experiences fit together in the lived experiences of networked youth. Furthermore, is social media either positive or negative for specific individuals—or do the same adolescents have both positive and negative experiences? For example, might a teen who feels left out when using social media also enjoy benefits of networked self-expression? While it is unlikely that any single investigation can capture the full complexity of social media use and well-being, a more holistic view can extend current knowledge of adolescents' multifaceted experiences.

Affective well-being: positive and negative emotions

This study explores well-being through the lens of self-reported positive and negative affect experiences. Affect is a defining component of well-being (Diener et al., 1999). Broad approaches to well-being research often include non-affect components, such as behavioral and psychosomatic experiences (e.g. Van Horn et al., 2004). Yet in the context of subjective well-being, affect remains a defining element. As Diener and Suh (1997) summarize, "subjective well-being consists of three interrelated components: life satisfaction, pleasant affect, and unpleasant affect. Affect refers to pleasant and unpleasant moods and emotions" (p. 200).

Positive and negative emotions are separate components of well-being (Bradburn, 1969). The multidimensional nature of affect is well-established (Watson and Tellegen, 1985; Watson et al., 1988), and positive and negative affects, which constitute "distinct dimensions, rather than opposite ends of the same continuum" (Dodge et al., 2012: 223), are only moderately correlated (Watson and Clark, 1997). Affective well-being comprises both frequent positive emotions and comparably infrequent negative emotions (Diener and Larsen, 1993). Much like a "see-saw," well-being involves tilts and shifts based on the dynamic nature of an individual's experiences—including his or her psychological, social, and physical resources and the challenges he or she faces (Dodge et al., 2012). If positive and negative affect indeed represent distinct dimensions in the context of social media use, research requires attention to both the positive and negative aspects of individuals' social media experiences.

The current study

To understand social media from adolescents' standpoints, I foreground youth voices. My two-part strategy draws on survey responses from 568 high school students to inform an in-depth interview study with a purposeful sub-sample of 26 teens. In Phase 1, I use survey data to explore teens' general portrayals of their SMP-related emotions and to assemble a sample of interviewees with varied reports. In Phase 2, I analyze interview data to identify functional dimensions of social media use implicated in adolescents' narrative descriptions of positive and negative SMP experiences. I then (a) examine patterns of experiences *across* functional dimensions at the individual and group levels and (b) describe how specific experiences *within* each functional dimension influence affect positively and/or negatively.

Phase 1: survey and interview sampling

Method

Data collection. In total, 588 teens ($M = 15.26$ years, standard deviation [SD] = 0.97; 50% male) completed an online survey via Qualtrics. Participants represent 90% of 9th grade, 86% of 10th grade, and 51% of 11th grade students[2] at a suburban public high school in the Northeastern United States. The responses included in the current study comprise teens who use one or more SMPs ($n = 568$ of 588 respondents). Study activities aligned with routine curricular foci at the school site, which cover students' digital media and digital citizenship experiences. The study employed a passive parental consent and two-step active student assent procedure approved by the governing university's Institutional Review Board and school district administrators. Working with school administrators, I sent parents a letter with study details and data collection plans along with information about how to opt students out of participation. Students then actively assented to both initial participation in the survey and to the use of their responses for the research study (study opt-out rate = 3.9%). During designated class periods convenient to the school and host teachers, students completed the study's online Qualtrics survey in their health (9th and 10th graders) and English (11th graders) classes. Table 1 summarizes students' self-reported demographic information.

Compared to nationally representative data on US 13- to 17-year-olds (AP-NORC, 2017b; Lenhart et al., 2015), teens in the current study are heavier users of the Internet and SMPs. I conducted the survey for the current study between November 2015 and March 2016. For the national surveys, data collection took place between September

Table 1. Self-reported participant characteristics for survey sample and interview sub-sample (gender, age, grade, ethnicity).

		Survey ($n = 560$[a])	Interviewees ($n = 26$)
Gender	Male	280 (50.0%)	10 (38.5%)
	Female	274 (48.9%)	16 (61.5%)
Age (years)		$M = 15.3$, $SD = 0.97$	$M = 15.8$, $SD = 1.2$
Grade	9	224 (40.0%)	5 (19.2%)
	10	212 (37.9%)	9 (34.6%)
	11	124 (22.1%)	12 (46.2%)
Ethnicity	White	485 (86.6%)	17 (65.4%)
	Asian	46 (8.2%)	7 (26.9%)
	Other	22 (3.9%)	1 (3.8%)
	African American	20 (3.6%)	1 (3.8%)
	Hispanic	13 (2.3%)	
	Prefer not to specify	8 (1.4%)	1 (3.8%)
	Native American	7 (1.3%)	
	Pacific Islander	6 (1.1%)	1 (3.8%)

SD: standard deviation.
[a]Eight students did not self-report demographic information.

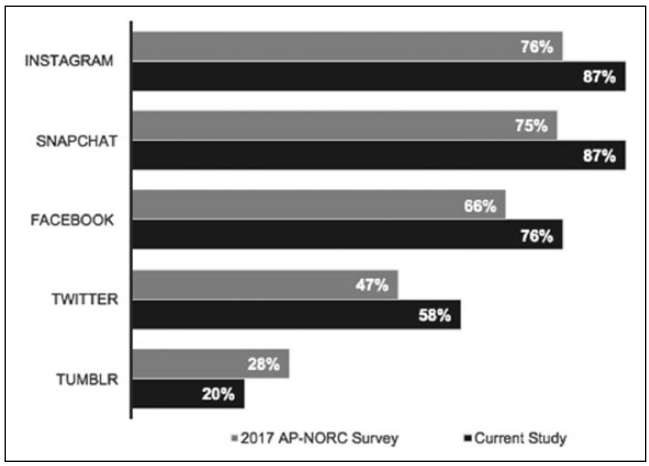

Figure 1. Percent of teens who use six popular social media platforms: current study versus nationally representative sample (AP-NORC, 2017b).

2014 and March 2015 (Lenhart et al., 2015) and in December 2016 (AP-NORC, 2017b). Overall, 98% of teens in the current sample report that they are online either "almost constantly" (49%) or "several times a day" (49%) compared to 80% who go online "almost constantly" (24%) or "several times a day (56%) in the 2015 national sample (Lenhart et al., 2015). Teens in the current study have full-time access to school-provided Chromebooks, and they can also access social apps from their school campus, which may contribute to comparably heavy use patterns.

Participants identified their actively used and most important SMPs. The survey prompted adolescents to report "Your social media accounts … (check ALL that apply)" and listed SMPs included in the 2015 Pew Survey: Facebook, Instagram, Snapchat, Twitter, GooglePlus, Vine, and Tumblr. Participants' selections then auto-populated as response items for the question, "Which social media site is MOST important to you right now?" Figure 1 presents side-by-side data on SMP use for the current study and the 2017 AP-NORC survey.

In total, 84% of survey participants use both Instagram and Snapchat, which are the two most popular SMPs among youth in the study sample. Teens additionally identified Snapchat (50%) and Instagram (33%) as their "MOST important" SMP; less than 7% of students chose each Facebook, Twitter, GooglePlus, Vine, and Tumblr. Teens also reported how they generally feel while using their most important SMP. The platform that each teen identified as "MOST important" was auto-populated into the question, "Generally, while you are using [most important SMP], how do you feel?" Participants were invited to "check ALL that apply" among 11 binary descriptor items compiled from the existing literature (e.g. boyd, 2014; Krasnova et al., 2013; Lenhart et al., 2015; Underwood and Faris, 2015; Weinstein and Selman, 2016) and prior fieldwork: *amused, anxious, bored, calm, closer to friends, happy, interested, irritated, jealous, left out, and upset*.

On a separate survey screen, participants responded to the SMP affect question from the perspective of peers (i.e. how do others generally feel when checking sites like [most important SMP]?). The second question provides a comparison to the personal reports with reduced likelihood of social desirability response bias. At the end of the survey, participants indicated interest in interview participation; 200 students indicated openness to participating in an interview.

Analysis. I analyzed the affect items descriptively to obtain an overall pattern of responses. I conducted independent-sample *t*-tests to compare means by gender and to explore differences between responses about oneself versus those for peers. To facilitate dimensionality reduction of the binary affective experience data, I used exploratory logistic principal component analysis (PCA). By transforming the data into a set of uncorrelated principal components, PCA reduces dimensionality while retaining maximal variation in the dataset. I ran PCA for the current study using the *Stata* statistical software package. I examined PCA results for components that met both Kaiser's eigenvalue >1 criterion and the scree criterion (Jolliffe, 2002). I also used independent-sample *t*-tests to compare component differences by platform (i.e. most important SMP) for Snapchat versus Instagram.

Findings

Affective experiences: descriptive reports from survey data. Table 2 presents frequencies of reported social media affect descriptors. Participants identified multiple descriptors to characterize their social media experiences ($M=3.9$, $SD=1.9$). Portrayals are predominantly

Table 2. Frequencies of SNS affect descriptors about oneself and others, by gender and overall.

Emotion	About oneself			About others		
	Overall ($n=568$)	Female[a] ($n=273$)	Male ($n=280$)	Overall ($n=568$)	Female ($n=274$)	Male ($n=280$)
Happy	.720*	.798	.661	.657	.690	.643
Amused	.685*	.729	.650	.644	.679	.614
Closer	.593*	.645	.554	.627	.661	.604
Interested	.578*	.637	.532	.606*	.661	.564
Calm	.445	.432	.468	.259	.245	.282
Bored	.289*	.319	.261	.231	.252	.211
Anxious	.102*	.136	.068	.201	.182	.214
Irritated	.079*	.125	.032	.213	.208	.218
Upset	.067*	.103	.029	.174	.186	.157
Jealous	.169*	.227	.107	.375*	.412	.332
Left out	.153*	.209	.093	.398*	.453	.343

SNS: social networking site.
[a]554 participants in the SNS-user group self-reported gender.
*Gender difference is significant ($p<.05$).

Table 3. Social media affect experiences (principal component analysis).

	1*	2*	3*	Frequencies ($n = 568$)
Happy	.191	**.474**	−.079	1: 72.01%; 0: 27.99%
Amused	.059	**.470**	−.010	1: 68.49%; 0: 31.51%
Closer to friends	.030	**.424**	−.064	1: 59.33%; 0: 40.67%
Interested	.141	**.456**	−.027	1: 57.75%; 0: 42.25%
Calm	−.032	.324	**.640**	1: 44.54%; 0: 55.46%
Bored	.145	−.181	**.751**	1: 28.87%; 0: 71.13%
Anxious	**.392**	−.084	−.002	1: 10.21%; 0: 89.79%
Irritated	**.428**	−.071	−.098	1: 7.92%; 0: 92.08%
Upset	**.448**	−.092	−.042	1: 6.69%; 0: 93.31%
Jealous	**.424**	−.040	−.077	1: 16.90%; 0: 83.10%
Left out	**.448**	−.084	.040	1: 15.32%; 0: 84.68%
Variance explained (%)	23.64%	16.35%	9.67%	

Loadings from principal component analysis. Total variance explained is 49.7%.
1*: negative emotions; 2*: positive emotions; 3*: neutral emotions.

positive: a majority of participants report generally feeling happy (72.0%), amused (68.5%), closer to friends (59.3%), or interested (57.8%) while using SMPs. A minority of youth indicate generally feeling upset (6.7%), irritated (7.9%), anxious (10.2%), jealous (16.9%), or left out (15.3%). Almost 70% of participants describe their general SMP experience using only positive descriptors. On average, female students select more descriptors than male students ($M_{female} = 4.4$, $SD = 1.8$; $M_{male} = 3.5$, $SD = 1.9$); female students are more likely to report all emotions except "calm," for which there is no significant gender difference ($p < .05$ for all other descriptors). Participants are more likely to report negative emotions for others ($p < .001$), although their responses reflect the same positively skewed portrayal: a majority (>60%) select each happy, amused, closer to friends, and interested, and a minority (<40%) select each jealous, left out, upset, anxious, or irritated.

PCA. PCA with the 11 affect items listed above resulted in three components that met Kaiser's eigenvalue >1 criterion. Visual examination of the scree plot supported the three-component solution, which explained 49.7% of the variance. The Kaiser-Meyer-Olkin measure of sampling adequacy was 0.76. The first component, "Negative Emotions," accounted for 23.6% of variance. Four items—upset, left out, jealous, irritated—loaded >.40 on Negative Emotions (a fifth item, anxious, loaded 0.39). The second component, "Positive Emotions," accounted for 16.3% of variance and comprised four items that loaded >.40: happy, amused, interested, and closer to friends. An apparent third component, "Neutral Emotions" (eigenvalue = 1.06), explained 9.7% of variance and included two items—calm and bored—loaded >.40. Table 3 presents loadings for the three-component solution. For teens who identify Snapchat versus Instagram as their favorite platform, the difference in "Negative Emotions" is not significant. However, those who identify Snapchat as their most important SMP report more corresponding "Positive Emotions" on average than those who prefer Instagram ($M_{Snapchat} = 0.21$, $SD = 1.27$; $M_{Instagram} = -0.05$, $SD = 1.30$; $p < .05$).

Phase 2: qualitative (interviews)

Method

Data collection. Following the survey phase, a co-Interviewer and I conducted interviews with 26 teens (16 females). I assembled a maximum variation sub-sample based on examination of the PCA results alongside demographic data. *Maximum variation sampling* involves identifying cases or individuals with diverse patterns of experience (Miles et al., 2014). In this study, variation pertained specifically to teens' reports of their general social media affect experiences.

I used a progressive approach: I selected interviewees from among the interested participants based on primary consideration of PC scores and secondary consideration of demographic descriptors (gender, grade, and ethnicity). After each interview, I tracked the composition of the interviewee group and sent additional invitations, repeating this process until compilation of the full interview sample. As Figure 2 depicts, interviewees' survey responses distribute them across the affect dimensions. While none of the 11 students who selected only negative descriptors was interested in interview participation (i.e. 1.9% of students who reported the most extremely negative SMP experiences), interview-interested students did not otherwise systematically limit sampling for affect variation. To keep researchers blind to participants' previous affect reports, interviewees were randomly re-ordered after selection and assigned new study ID numbers.

I designed the interview to understand the experience of each participant (Willig, 2013) and, specifically, how social media use intersects with positive and negative emotions. The semi-structured protocol therefore included open-ended prompts (Miles et al., 2014) and prioritized *descriptive* and *evaluative* questions (Spradley, 1979). Participants were asked to provide general accounts of their experiences (descriptive) and insights into their positive and negative feelings (evaluative). The interview included (a) general biographical questions about SMP use and overall experiences, (b) directed questions related to each survey affect descriptor (e.g. "Do ever feel or have you ever felt [happy,

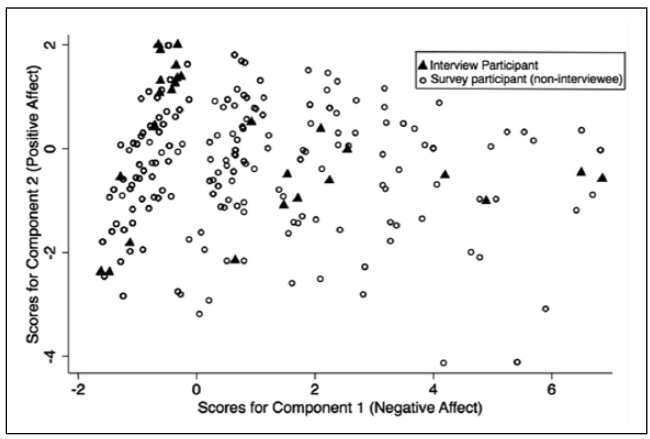

Figure 2. PCA scores for interview and survey participants.

upset, anxious, etc.] when using social media?"), and (c) walkthroughs (as in Duguay, 2014) of Instagram and, time permitting, Snapchat, in which participants narrated content and their corresponding responses.

Participants were asked to choose a private location for the interview. We conducted interviews via Google Hangouts, which meant teens could arrange their interviews without reliance on others for transportation. Parents/guardians provided signed consent and teens provided signed assent. Interviews averaged 1 hour 15 minutes. Audio recordings were transcribed verbatim, de-identified, and uploaded to *Dedoose* (a web-based application for qualitative analysis). Within 24 hours, we also prepared and uploaded interview profiles with background information, discussion threads, and procedural notes.

Analysis. Interview data were coded and analyzed using inductive thematic analysis (TA; Boyatzis, 1998). I began with a line-by-line reading of transcripts and interview notes. During this process, I kept "jottings" to capture emerging trends and potential codes (Emerson et al., 2011) and then used the jottings to compile a comprehensive list of nascent code concepts. I next conducted a more focused round of in vivo coding, using words from the participant's own language as codes, with three transcripts. In vivo, coding allows researchers to honor the participant's voice, stay close to the data, and highlight key language (Saldaña, 2015). I focused on social media experiences reported by teens as influential to positive and/or negative affects. My analysis included, for example, "I think sometimes [Instagram] can make me feel sad. Like seeing what other people are doing and I feel like I'm not doing something as fun." I did not focus on background information, such as "I learned about Facebook 'cause my mom had one."

To generate overarching codes for functional dimensions of social media use that influence adolescents' emotions, I next considered patterns and groupings among the in vivo codes. This process resulted in six emic codes with corresponding positive/negative valence sub-codes to differentiate experiences teens describe in relation to positive versus negative emotions: identity expression, peer feedback, relational interactions, discovery and exploration, valence of content, and social positioning. I developed a codebook that included for each code a name/label, operational definition with inclusion criteria, illustrative examples, and exclusions.

Achieving inter-rater reliability is a defining aspect of Boyatzis' (1998) TA approach. Boyatzis rejects the notion of reliability as verification. Rather, reliability indicates consistency of observation, application, and interpretation; training also sharpens code definitions. I worked with a TA-trained research assistant. We independently coded two transcripts, met to examine areas of disagreement, and made corresponding codebook revisions. Most notably, we dissolved the original "peer feedback" code and integrated its components into either "identity expression" or "relational interactions" based on the context and consequence of the feedback. Table 4 outlines the final code categories and their relations to positive and negative emotions. We repeated the reliability process three times with fresh sub-sets of transcripts until we achieved Krippendorff's alpha reliability estimates >.75 for each of the 10 sub-codes (Hayes and Krippendorff, 2007). Each researcher then served as the primary coder for 50% of the transcripts and shadow-coded the remaining transcripts to review ambiguous cases and monitor for omissions and definitional drift.

Table 4. Code categories.

Code	Inclusion criteria	Example	K-alpha
Sources of positive emotions			
Self-expression (SE+)	SMPs contribute to positive emotions by providing an opportunity for self-expression and impression management, including via (a) creating/curating an online identity, (b) sharing personal interests (who I am, what I care about), and (c) evoking nostalgia related to digital footprints.	"I post on that [account] a couple times a week … I don't know how to explain it! I just got it and I think I'm funny, so I like mine a lot. And a lot of people think mine's funny."	.89
Relational interactions (RI+)	SMPs contribute to positive emotions related to relational connection and feelings of closeness. Includes interactions with friends, family members, and romantic interests, via (a) direct communication and disclosure, (b) metrics that support/ substantiate relationship development, and (c) following others posts, which facilitates keeping in touch, feeling generally connected, and learning about others' interests and lives.	"I feel happy a lot when I'm on social media, with every social media I would say. 'Cause I could be chatting with friends, I could be seeing snaps that my friends sent me on Snapchat and they could be doing something really cool or fun or something really funny."	.79
Exploration (EX+)	SMPs contribute to positive emotions related to exploration of existing interests and/or new areas of learning, such as (a) specific topics (e.g. cooking, sports, car mechanics), (b) learning about the world (e.g. other countries, news), and (c) exposure to inspiration and new ideas.	(on seeking out artistic inspiration on SM) "I feel as though I'm more of an artistic person, so I enjoy seeing images like the golden hour of the sunset. So I enjoy photography and maybe a little drawing … and see what inspires me because I've had a few inspirations."	.84
Browsing (content-focused; CB+)	SMPs contribute to positive emotions related to entertainment and amusement via browsing that is lighthearted and/or uplifting.	"I always get amused on Tumblr, because I follow things that make me laugh because I like to laugh."	.88
Browsing (social; SB+)	SMPs contribute to positive emotions related specifically to browsing other people's accounts. Includes (a) general prosocial cognition, (b) feeling good for/happy for others (enjoying seeing others happy), and (c) non-judgmental interest in general social learning and/or others' lives.	"Yeah, it [looking through SM] makes me feel happy. Seeing someone else happy kind of makes me happy."	.86

(Continued)

Table 4. (Continued)

Code	Inclusion criteria	Example	K-alpha
Sources of negative emotions			
Self-expression (SE−)	SMPs contribute to negative emotions because self-expression is restrictive, limiting, and/or stressful. Includes (a) worrying about what to express or share, (b) anxiety about social feedback or judgment (including "likes"), (c) stress about what others share about you, and (d) concern about negative current/future implications of digital footprints.	"I do feel anxious when I'm posting photos [about] whether or not people will like it or not. I guess I'm afraid of judgment."	.92
Relational interactions (RI−)	SMPs contribute to negative emotions by disrupting relational connection and/or enhancing stress or insecurity about relationships, including via (a) misinterpretations, uncomfortable interactions, and/or feeling ignored during direct SM communication; (b) learning about exclusion and FoMO; and (c) metrics that de-value the friendship (e.g. dropping streaks; unfollowing).	"[If] your group of friends is all hanging out and you're not included and you see a picture of them on Instagram or Snapchat, it is hurtful to see that and be very excluded. It has happened to me before and it's just an awful feeling."	.87
Exploration (EX−)	SMPs contribute to negative emotions related to exploration of heavy, distressing, irritating, and/or upsetting topics.	"There are people who make Instagram pages for the sole purpose of expressing how depressed they are, or something like that, which can get graphic. So, that's the only risk I have with going on Instagram Explore and finding other random pages … I did come across some pages dedicated to self-harm. That was bad."	.95
Browsing (content-focused; CB−)	SMPs contribute to negative emotions and/or undesirable feelings of boredom and disengagement, including via (a) repetitive content and reaching the "end" of the feed; (b) frustration when browsing displaces time to pursue "meaningful" interests and/or learning.	"… I hit rock bottom. And you can't scroll anymore … so like if I scroll through it too long then I'm just gonna get even more bored. And like I get a headache sometimes, it just bothers me."	1.00
Browsing (Social; SB−)	SMPs contributes to negative emotions related to social comparisons, including (a) feeling like others' lives are better and (b) jealousy/envy.	"On Instagram, people will post pictures of them at the beach and it will make me a little self-conscious of the way I look. Because I don't look like them."	1.00

SMP: social media platform; FoMO: fear of missing out.

Table 5. Positive and negative affects, by dimensions of SM experience, for interview group.

	Positive			Negative		
	Present		Absent	Present		Absent
	★	⊙	○	★	⊙	○
Relational interactions	14	12	0	10	14	2
Content browsing	6	18	2	2	18	6
Interest-driven exploration	11	12	3	6	12	8
Self-expression	12	9	5	16	7	3
Social browsing	3	11	12	5	18	3

SM: social media

Key: ★, defining element; ⊙, present/active element; ○, absent.

Subsequently, I reviewed excerpts by code category to examine category scope and contours. I revisited excerpts by participant, alongside interview profiles, to consider how coded excerpts fit into interviewees' narratives. Both coders met to re-review excerpts and notes to co-construct code profiles that summarize SMP experiences by interviewee. Broadly, we considered experiences "defining" when described by participants as routine and recurrent and/or as prominent experiences with lasting affective influence; "active" elements are occasional and ostensibly less influential though still present; and "absent" elements are either entirely absent from teens' narratives or described as not personally relevant (e.g. "I don't have an issue with that.").

Findings

Participants' narratives highlight affect experiences across four functional dimensions of social media use: self-expression, relational interactions, exploration, and browsing (including both general content browsing and social browsing). I examined positive and negative experiences for each of the dimensions and both types of browsing, resulting in a total of 10 assessed sub-dimensions for each interviewee. Table 5 summarizes positive and negative sub-dimension frequencies for the group of interviewees; Table 6 presents dimension patterns at the individual-level (by interviewee). Every interviewee's social media experience is characterized by both positive and negative affects across multiple dimensions. In total, 20 interviewees describe eight or more of the sub-dimensions (range = 6–10).

Across the group of interviewees, relational interactions are the most common positive defining affect experience: all interviewees describe social media interactions that support closeness. For 24 of the 26 interviewees, relational interactions also contribute to negative emotions related to feeling disconnected and/or left out. Stress related to how others judge self-expression is the most common negative defining experience. Yet, self-expression on SMPs also presents as a source of positive affect for 21 of 26 interviewees. Both types of browsing contribute to positive and negative affect for a majority of

Table 6. Components of SM affect experience, by interviewee.

Pseudonym, age (years)/gender	Positive (+)					Negative (−)				
	SE	RI	EX	CB	SB	SE	RI	EX	CB	SB
1. Elizabeth, 17/F	★	★	⊙	⊙	⊙	○	⊙	○	⊙	★
2. Julia, 15/F	⊙	⊙	⊙	★	★	★	★	○	○	★
3. Selena, 17/F	★	⊙	⊙	⊙	⊙	★	⊙	⊙	○	⊙
4. Tony, 16/M	★	★	★	⊙	⊙	★	⊙	⊙	⊙	○
5. Thomas, 17/M	★	★	★	⊙	⊙	⊙	⊙	★	○	⊙
6. Ron, 18/M	★	⊙	⊙	⊙	★	⊙	⊙	⊙	⊙	⊙
7. Ben, 17/M	★	★	⊙	⊙	★	⊙	⊙	★	⊙	⊙
8. Lily, 15/F	★	★	⊙	★	⊙	★	★	○	⊙	⊙
9. Josephine, 16/F	⊙	⊙	★	⊙	⊙	★	★	★	⊙	⊙
10. Valerie, 14/F	★	★	★	★	⊙	★	★	⊙	⊙	★
11. Carl, 17/M	★	★	★	⊙	○	⊙	○	⊙	○	⊙
12. Hanna, 17/F	★	⊙	★	⊙	○	★	★	○	⊙	○
13. West, 14/M	⊙	★	⊙	⊙	○	⊙	⊙	⊙	○	⊙
14. April, 15/F	⊙	★	★	⊙	○	○	⊙	★	⊙	⊙
15. Tim, 17/M	⊙	★	⊙	⊙	○	⊙	★	⊙	○	⊙
16. Paola, 16/F	★	★	⊙	⊙	○	★	⊙	○	⊙	⊙
17. John, 15/M	○	⊙	⊙	⊙	⊙	★	★	⊙	⊙	○
18. Alex, 15/F	○	★	★	⊙	⊙	★	○	★	★	★
19. Elliot, 17/M	⊙	★	★	⊙	★	○	⊙	⊙	⊙	⊙
20. Claire, 14/F	★	⊙	⊙	○	⊙	★	★	⊙	⊙	⊙
21. Joseph, 16/M	⊙	⊙	★	★	○	★	★	★	⊙	⊙
22. Snoopy, 16/F	⊙	★	○	⊙	○	★	⊙	○	⊙	⊙
23. Rose, 14/F	○	⊙	⊙	★	○	○	⊙	⊙	⊙	★
24. Betsy, 15/F	○	⊙	○	★	⊙	★	⊙	○	⊙	⊙
25. Alice, 15/F	○	⊙	★	⊙	○	★	⊙	⊙	⊙	⊙
26. Marie, 15/F	⊙	⊙	○	○	○	⊙	★	○	★	⊙

SM: social media; SE: self-expression; RI: relational interactions; EX: exploration; CB: content browsing; SB: social browsing.

Key: ★, defining element; ⊙, present/active element; ○, absent.

interviewees, although the emotional effects of browsing are comparably less pronounced in teens' narratives.

Self-expression: both affirmation and concern about others' judgments

The opportunity for self-expression is realized as a chance to "write yourself into being" (boyd, 2008: 129). Contemporary SMPs provide opportunities for both intentionally ephemeral and enduring self-expression to audiences of varied sizes and compositions. Teens[3] attribute positive emotions to sharing their lives, interests, and humor and receiving positive feedback on their posts, as well as to curating and revisiting their digital footprints.

Ron (aged 18) regularly uses Snapchat stories for self-expression to his friends and peers. Snapchat stories are by default shared with Friends for a 24-hour period during which they can be viewed an unlimited number of times (Snapchat, 2017). He explains, "I feel good when I post something. I feel kinda happy … Every time I have an idea, I get really excited about it, I wanna put it out there." Ron and his peers view intentionally ephemeral posts (e.g. via Snapchat) as requiring less deliberation than enduring posts, which facilitates casual and often playful expression. Yet, youth also describe benefits of self-expression on SMPs with archival functions. Paola's (aged 16) Instagram footprint serves as a valued record of development:

> You can look back at all your old photos … and you can just see how you've developed over all of that [time]. And that's cool … I think it's cool to see how you progress over [time], like how your personality changes, if it does.

Thomas (aged 17) similarly portrays Instagram as "nostalgic" and Tony (aged 16) finds happiness reminiscing with "memorable photos" on Facebook. These networked expression experiences contribute to positive emotions related to a sense of identity affirmation.

At the same time, teens worry about how others judge their self-expressions. Negative emotions arise related to immediate concerns about peer judgments and lack of acceptance (particularly when sharing is broadcasted through accounts with large peer audiences) and, when content endures, long-term concerns about unknown future consequences. Paola admits feeling "hesitant" "every time I post [on Instagram]" "I worry a lot"; Paola explains, about the possibility that peers "don't like something about [my post] or they do like something about it and they'll screenshot it and … it could go anywhere." Paola manages her concern about peer feedback by seeking approval from friends before she posts anything on social media. Tony also worries about the possibility that someone will "screenshot" one of his Instagram or Snapchat posts; he sees every expression as a potential "virus" that is "never gone." And Thomas generally feels "self-conscious when I'm posting a photo because … you're being judged."

For some teens, the stress of social judgment seems at first to color their entire experience of networked expression. As Selena (aged 17) explains,

> If I post something [on Instagram] … I'll keep checking to see what people are saying or liking or doing. I wouldn't say it's a feel-good app, like you'd be happy when you're posting. More like … [you feel] anxious to see what people are gonna say for your posts.

Selena is one of several interviewees who routinely deletes photos that do not reach a threshold number of likes (her minimum is "at least 200"). In describing unpleasant social media affect experiences, Lily (aged 15) also repeatedly references concern about others' judgments. "I hate posting on my personal account," Lily explains, "'Cause I feel like everyone judges that so hard."

However, Selena and Lily's expression anxieties are restricted to particular contexts. Both teens also have established spaces on SMPs where positive expression is accessible

and valued. VSCO is a social app for editing and sharing photography; for Selena, her VSCO page is a space where she can be carefree and authentic:

> I'm happy with [my VSCO] 'cause it's me. So I'll look at myself and I'll be like, "That's *exactly* who I am." Even though I can't post it on some other social media … you can scroll through [my VSCO] and be like, "That's Selena, That's Selena."

Selena feels free to express herself on VSCO because she has a considerably smaller audience of followers. She also likes that VSCO lacks common feedback functions.

Other teens, like Lily, use duplicate Instagram accounts—called "finsta" or "spam" accounts—for similarly differentiated and positive expression experiences. Finstas are intentionally limited to private follower audiences of "close friends." Lily describes her spam as "a safe place to rant about life 'cause it's all your friends." Lily "hates" posting on her main Instagram account but enjoys posting on her spam account, where she feels as though she can "express myself more" because there is "definitely less judging." Valerie (aged 14), who similarly worries about judgment on her "real" account, also finds an opportunity for authentic and affirming expression on her finsta. She explains,

> [On my finsta,] I just kind of post whatever I want, any of the time. I don't have to worry about how it looks … it's kind of like a little community, I guess … [It's] not perfect. We talk about school, like, "oh I just had this test, it was really hard."

Valerie also echoes the positive experience of curating an enduring digital footprint, though related specifically to her finsta. Teens are selective about what they express on different accounts based on their assessments of both platform features and anticipated audience responses.

Individually and as a group, teens describe *both* positive *and* negative emotions related to self-expression on SMPs. As outlined in Table 6, teens who highlight rewarding, affirming expression experiences also tend to describe concerns about judgment and vice versa. Positive and negative affect experiences can take shape on the same platform, on different platforms (positive on one platform, negative on another), and/or on different accounts on the same platform.

Relational interactions: both closeness and disconnection

When teens describe their affective experiences with SMPs, they also attribute positive and negative emotions to the ways social media use intersects with and influences their relationships and feelings of connectedness to other people in their lives. SMPs facilitate (a) the potential for constant, direct communication; (b) friendship displays and metrics; and (c) an opportunity to follow others' posts. In each case, interactions can both support closeness and contribute feelings of disconnection.

"Mundane" direct conversations through SMPs are described as more "casual" than texting. For Tim (aged 17), Snapchatting with his friends and girlfriend provides a daily source of positive emotions. Tim attributes to Snapchat the development of intimacy with his current girlfriend—Snapchatting "led me to become comfortable with her." On

one hand, the perception that friends are always accessible through SMPs contributes to positive emotions related to a sense of connection. For Elliot (aged 17) and his peers, social media provides a valued "presence of having other people with you at the same time when they're not actually physically near you."

On the other hand, teens describe drawbacks of communicating through social media. Tim can become overwhelmed by the volume of Snapchats he receives, which "gets annoying, especially when so many people—like 10, 12 people are snapchatting you at the same time, constantly." Tim echoes a repeated sentiment that it is "impolite to have someone send you something and not to respond." Concerns about being impolite lead to pressure related to "that compulsive need to respond." The volume of content, related time demands, and perceived social obligations contribute to challenges as teens interact with friends and peers through SMPs. Across platforms, interviewees also describe anxiety about miscommunication-based conflicts and ongoing concerns about how others interpret networked interactions.

Teens affirm closeness on social media through public displays of friendship and SMP metrics. Effusive comments (text and/or emoji) are a typical response to friends' Instagram posts, which contribute to reported happiness and sense of belonging. Yet, posts can also be a source of conflict if they are not judged as sufficiently flattering. In addition, when public displays of warmth are directed at one friend or group, other friends often feel marginalized.

Snapchat streaks—the most commonly discussed "metric" at the time of data collection—similarly contribute to both positive and negative affects. Streaks individually track consecutive days of Snapchat communication. They provide an excuse for interaction, both confirming and facilitating closeness. As Paola explains,

> With the streaks, you see the number getting higher and higher. There's plenty of kids that I never thought I would speak to and now they're my best friends … Through Snapchat we'll talk and be like, "oh let's hang out there," and then that one hangout will lead to multiple hangouts eventually. Yeah, social media helps a lot with that.

Thomas similarly underscores the validation of a long streak: "You feel like, 'Wow, I've been talking to this person a lot. I guess it's like we're really close, we really enjoy talking to each other'. Cause if you talk to someone for 200 days straight, that's something, right?"

Yet, streaks can also become a burdensome "chore." Claire (aged 14) not only values the sense of connection that streaks provide but also describes their maintenance "really stressful" because "you have to constantly be on your phone and making sure that you don't lose a streak with someone." For fear of "dropping" (i.e. losing/ending) streaks, several interviewees, including Paola and Ben, enlisted friends to manage their streaks while they were traveling without regular Internet access. Because peers often go to great lengths to avoid losing streaks, interviewees describe streak "dropping" as an ambiguous and anxiety-provoking signal that can reflect either an unintentional oversight or a potent way to communicate anger.

Another source of disconnection stems from a similarly difficult to interpret social media experience: seeing friends post together. Claire explains,

> [If] your group of friends is all hanging out and you're not included and you see a picture of them on Instagram or Snapchat, it is hurtful to see that and be very excluded. It has happened to me before and it's just an awful feeling.

Almost all of the interviewees (23 of 26) experienced feeling left out because of social media posts, which is a common reason for feeling "hurt" and "upset" as a function of SMP use. Joseph first learned that several friends were distancing themselves when he saw a picture of the group at an amusement park and realized he had not been invited. These teens report struggling to determine whether a post is intentionally shared to hurt them or whether they are being overly sensitive about friends spending time with other people.

Yet while seeing others' posts contributes to disconnection, it also bolsters closeness and connection. Following others on social media provides a valued way to keep in touch with distant friends and family, which is an oft-cited source of positive emotions. In addition, social apps allow friends to "share interests," which "adds a different dimension to what you can talk about." Learning about classmates' interests makes Snoopy (aged 16) feel more connected to her school community and facilitates in-person conversations. Ben (aged 17) similarly explains, "There's a lot of people that have these secret skills that they don't show in school … And I think it's really cool." It's like, "Wow. They're *so good* at dancing. I never would've thought!"

Exploration: both inspiration and distress

Teens also use SMPs for exploration—a term used in this study in reference to active, interest-driven pursuits. Youth find inspiration on social media as they pursue existing interests and new areas of learning. Carl describes interest-driven exploration as a key component of his positive online experiences: "What you follow and what you read and stuff on social media, those are your interests. You're never going on social media typically without being interested in something." Carl uses SMPs daily to explore sports and politics. Other teens describe inspiration and engagement from exploration for wide-ranging interests, including cooking recipes, sports and conditioning exercises, religious scriptures, and "DIY" (Do It Yourself) projects.

April (aged 15) finds inspiration from several social media sources, including her favorite accounts: "theorists" who "explain the science behind certain [video] games." April also follows accounts related to her interest in makeup application. But April's exploration is not limited to these "light-hearted" topics; her exploration also comprises "heavier topics or sad things." For example, April uses SMPs to learn more about #BlackLivesMatter marches. "It really hits me hard," April explains, "cause some of these things are just so unthinkable."

Thomas (aged 17) similarly describes both inspiration and distress related to exploration. Thomas uses Instagram and Tumblr to support his passion for the arts. Thomas explains, "Social media … opened my eyes to new parts of the world. And I enjoy using social media … [it's] as if it's opening another door." When Thomas browses his Instagram during our interview, he quickly encounters a post that illustrates this inspiration. The image is a "beautiful" drawing of a girl who is wearing a rose crown. Thomas remarks,

> I love drawing; seeing other people draw … [This drawing] looks like something straight out of a photograph. And the way people make this, draw like this—it's inspired and it's incredible. The attention to detail—every stroke counts. I like this photo.

Yet Thomas, like April, finds that the new "door" opened by his social media exploration also leads to upsetting encounters with current events: "Sometimes the news is really disturbing or really sickening that how [*sic*] us as humans have developed. Because there have been murders and so much destruction. And it's just horrible to see. I'm upset at us as humans …"

Exploration is also distressing when teens encounter accounts that actively discourage positivity. Joseph (aged 16) is a musician who is regularly inspired by the "music-y" accounts he follows. Yet, he also describes the "risk" of encountering depression-related content during his exploration:

> There are people who make Instagram pages for the sole purpose of expressing how depressed they are, or something like that, which can get graphic. So, that's the only risk I have with going on Instagram Explore and finding other random pages … I did come across some pages dedicated to self-harm. That was bad.

Finding depression accounts has not been a challenge for Joseph recently but was particularly distressing during a challenging period in middle school. Josephine (aged 16) describes similar upsetting encounters:

> There was one [account] that I looked at a couple of times that—they must have changed their name, but it was an Instagram account … of a girl who had depression and anorexia. And she would post like, "This was such a terrible day, it sucked. It was terrible. It was awful. I didn't eat anything. I ate one chip and I felt like throwing up."

At the same time, social media exploration can also lead teens to individuals who use SMPs to spread messages of positivity. Tony, for example, seeks out accounts of people who "do all these positive things" and inspire him to "try to live every day to the fullest. Those are the people that I like, and those are the people that I follow."

Browsing: both admiration and envy, both entertainment and boredom

While exploration refers to teens' directed pursuits—aimed at extending their knowledge of particular interests and topics—youth also describe more "passive" browsing. Browsing includes both content browsing (generally for the purpose of entertainment) and social browsing (perusing others' posts and portrayals of their lives)—although these two activities are often intertwined. Browsing is often the backbone of teens' daily social media experiences and it is characterized by an interplay of entertainment, boredom, admiration, and envy. Alex (aged 15) summarizes her mixed emotions as she browses social media:

> You'll definitely feel self-conscious about the way you look and the things you do because all these other accounts that are nothing like you that are so popular [and] everyone loves [them].

> You feel kind of insecure that you're not like that. But then there's other times when it just keeps you entertained. Oh, like Vine! [Vine] always makes me laugh. No matter how often I go on, it I'm constantly smiling about the videos. I think it's *so* funny. It's just the different extremes, I guess. You're always feeling different emotions while you're just looking through.

Feeling envious of others' wealth—and, in particular, of posts shared from interesting and beautiful places—is a shared browsing-related experience across interviewees. Male and female teens both also report feeling envious of others' bodies (e.g. someone who is "in great shape" or "thin and pretty"). Elizabeth (aged 17), for example, describes casual envy of physical appearance as a routine element of her social browsing. She also evinces this appearance envy while browsing her Instagram feed during our interview ("I'm kinda jealous that [the people featured] look really good in it").

For teens with more pronounced experiences of envy, social browsing highlights personal insecurities, circumstances, or desires. Valerie's experience of seeing others' sibling relationships is illustrative:

> I can get jealous of sibling relationships, if that makes sense. Cause my siblings are autistic, so it's like, I don't have as close a relationship as I would want to. But it's not their fault. It's no one's fault, of course. But sometimes I can get jealous of that. Like, on Snapchat where people are [sharing] what their siblings are doing, I don't think I could do that … That kind of like, *hits*.

Julia (aged 15) is away for the summer and working full-time to help her family. She explains, "Just seeing people traveling with their friends, at a pool and I'm just here working, not doing anything … that's a little hard." On social media (particularly Instagram and Snapchat), "It's harder to see that someone has a lot of money and you know that's just their life. So it's easier to just be jealous of them … 'Cause it could have just came [*sic*] to them easily." At the same time, Julia describes a collection of positive experiences related to her browsing, including posts from bloggers, Internet memes, and comedy accounts that consistently make her "laugh and smile."

Teens also describe directed content browsing for the specific purpose of lifting their spirits. Rose (aged 14) "always" browses Tumblr if she wants to laugh, "especially if I'm having a stressful day or something—it'll help me laugh and help me unwind a bit." Funny and cute animal posts are a repeatedly cited source of amusement, as are memes. But when content is no longer novel, teens get bored with browsing. As Paola explains, "[I get] bored a lot … Once I remember I was on it for like an hour straight and I just kept scrolling through and I hit rock bottom."

Discussion

This investigation comprises a holistic study of adolescents' social media affect experiences. Previous research points to facets of social media interactions, such as envy (Tandoc et al., 2015) and unfavorable peer feedback (Valkenburg et al., 2006) that can detract from well-being. At the same time, other studies highlight potential benefits of social media use, including supports for close relationships (boyd, 2014; Davis, 2012), identity expression (boyd, 2008; Stern, 2008), and interest-driven learning (Ito et al., 2009). Yet, an essential question remained largely unanswered: How do positive and

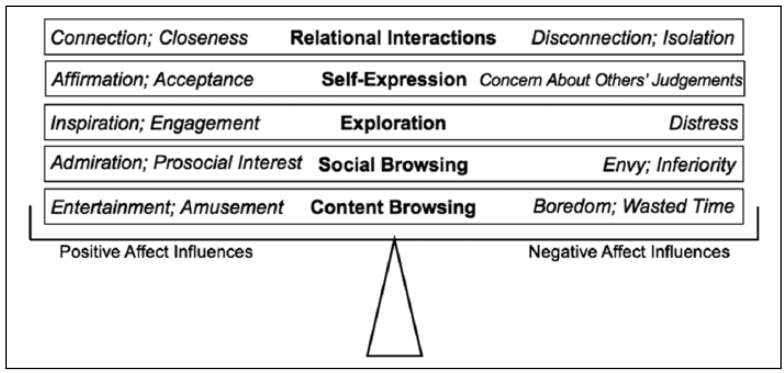

Figure 3. Social media see-saw: positive and negative affect influences.

negative social media experiences fit together in the lives of networked youth? Do teens tend to describe social media as either positive or negative for their affective well-being—or do the same individuals report both positive and negative influences of SMPs?

Overall, adolescents' survey responses portray social media use as a generally positive affect experience, which corroborates previous research (AP-NORC, 2017a; Underwood et al., 2015). As the interviews reveal, adolescents neither avoid nor deny negative emotions related to SMPs. Their narratives illustrate how positive and negative affect experiences take shape related to four dimensions of social media use: self-expression, relational interactions, interest-driven exploration, and browsing. These dominant dimensions of SMPs emerged inductively in the current study; all have been examined in previous research, although the current investigation is among the first to explore them jointly and in relation to affective well-being.

Although the current sample was selected for maximum variation, every interviewee described both positive and negative affect influences across multiple functional dimensions of social media use. As depicted in Table 6, the vast majority of teens also have stars (representing "defining" SMP experiences described in their interviews) in both positive and negative categories.

Yet, interviewees also report different constellations of influential SMP experiences. Individuals' practices influence the nature of their social media experiences and outcomes (Krasnova et al., 2013). To understand a teen's total experience, we therefore must attend to her positive *and* negative experiences related to expression, relational interactions, exploration, and browsing within and across SMP accounts. Developmental psychologists will likely be unsurprised by themes that cross-cut and underlie youths' descriptions of how positive and negative emotions related to these aspects of social media use. Self-disclosure, validation, and concerns about acceptance and belonging are core components of adolescent development and friendship that predate and are present in youths' digital interactions (Yau and Reich, 2017).

To adopt a modified version of Dodge et al.'s (2012) see-saw metaphor, the current findings establish component parts of a "social media see-saw" (Figure 3. As the see-saw illustrates, the presence of one negative element is not indicative of a wholly negative

experience, nor is the absence of one negative element confirmation that social media use is positive or benign. Teens may have negative affect experiences related to one functional dimension (e.g. relational interactions) and positive affect experience in other dimensions (e.g. linked to interest-driven exploration). They can also have positive and negative experiences related to a single dimension, as in the case of an adolescent whose relational interactions support closeness and contribute to feelings of disconnection.

The see-saw facilitates integrative assessment of social media experiences across multiple accounts and platforms, although it could also be applied to examine a teen's experiences with a single account. While in-depth analysis of platform differences is beyond the bounds of the current study, adolescents' reports suggest that affect experiences indeed vary by site, as well as within and across their multiple accounts. Interviewees implicate audience composition (e.g. for "finstas" vs "reals") and platform features (e.g. post duration, social metrics) as contributors to different experiences across their SMP accounts. Teens' narratives reflect the influential role of time related not only to post duration but also to the time required to manage digital life and in bearing witness to one's personal development over time.

In addition to presence or absence, whether the see-saw tips positively or negatively depends on the weight of each element. What, then, determines weight? In this study, teens' descriptions of both prevalence and prominence contributed to my identification of "defining" experiences. A low level of envy might be influential because it consistently characterizes a teen's browsing, which is a daily practice (prevalent). Elizabeth, for example, described appearance envy as a routine element of her social browsing. Envy may alternatively be infrequent but influential if it is memorable and considerably upsetting (prominent). Valerie's description of coming across certain portrayals of "sibling relationships" illustrates a prominent experience. In Valerie's words, seeing others' sibling posts "hits" her.

However, the frequency of different social media interactions and the duration of their impacts may well lead to different consequences for affective well-being. For example, affective well-being typically comprises both frequent positive emotions and comparably infrequent negative emotions (Diener and Larsen, 1993). SMPs may therefore be a source of generally positive emotions but still "tip" toward a negative total influence depending on the nature of an individual's negative affect experiences and their relations to positive experiences.

Importantly, well-being involves not only the presence of positive and/or challenging experiences but also the ways individuals manage their experiences (Dodge et al., 2012). Previous research indicates that adolescents' online experiences can mirror their offline strengths and struggles (George and Odgers, 2015). Teens' narratives indeed suggest SMPs reflect and amplify positive and challenging aspects of their lives. Individual differences (e.g. appearance and body esteem) and social-contextual factors (e.g. family circumstances) appear fundamentally intertwined with SMP affect experiences. However, it is not the case that some teens in the sample describe only positive social media experiences while others describe only negative experiences.

Future research can build on this work with differentiated examinations of frequency and impact, as well as with robust assessments of risk and protective factors. For example, prior studies indicate that envy (Tandoc et al., 2015) and FoMO (Beyens

et al., 2016) may negatively weight the see-saw. How do online experiences of envy (a negative experience related to browsing) and FoMO (a negative experience ostensibly related to relational interactions) reflect or diverge from their offline equivalents? How and why do these experiences differ for teens on different types of SMPs? And how do teens with pronounced envy and/or FoMO fare in other dimensions of social media use? Situating particular responses within the context of a multifaceted see-saw can contribute to the identification of influential experiences. Developmental analyses will also extend our understanding of youths' experiences and trajectories. In addition, examining the see-saw composition for youth with poor overall well-being can clarify when and how social media use is associated with ill-being (e.g. Kross et al., 2013; Primack et al., 2017).

Limitations and future directions

This study foregrounds youth's perspectives on their own experiences. As Stern (2008) notes related to her own work, "critical scholars might fault this approach for overemphasizing youth authors' agency"; however, we cannot understand the "full story" (p. 99) of adolescents' experiences without their voices. At the same time, youth may not be fully aware of how social media impacts their emotions or how their emotions and motivations prior to social media use contribute to varied experiences. Studies with experimental approaches and standardized measures can further existing knowledge of SMPs and well-being, including related to causality.

The study's exploratory PCA indicates that positive and negative emotions cohere to form orthogonal response components. This finding aligns with previous research, which establishes positive and negative affect as distinct dimensions of subjective well-being (Watson and Tellegen, 1985; Watson et al., 1988). Structurally, this finding suggests one teen's social media experience may involve high positive and high negative affects, another teen may have high positive and low negative affects or vice versa, and yet another teen may experience low affect overall related to SMP use. However, this study draws from reports with a coarse measure of affect (binary descriptors) and component loadings for the corresponding PCA are somewhat low, which underscores the need for additional research with more precise measures.

Issues of generalizability are pressing: this study is limited by its concentration on the experiences of students in a relatively homogeneous, affluent suburb. Focusing on teens who attend a single school enabled a contextualized examination. Yet, the composition of the study population raises questions about whether the findings pertain for youth whose demographic characteristics differ, as well as for those who live in more diverse communities. To be sure, community context powerfully influences adolescents' experiences across functional dimensions. For example, when youth are surrounded by high levels of community violence, networked self-expression and peer interactions can hold potentially fatal consequences (Patton et al., 2013). This investigation is additionally limited by the omission of narrative data from teens who were uninterested in interview participation, including those youths with the most extremely negative reported experiences. The current study provides a springboard for research on SMPs and affective well-being; building on this work requires more attention to diversity in its many forms.

Conclusion

Social technologies, like most prior disruptive innovations, are both heralded and demonized. Amid debates about the societal impact of SMPs, adolescents of the "App Generation" continue to develop with and through social media (Gardner and Davis, 2013). For the parent who is attempting to weigh the benefits and consequences of limiting a child's social media use, for the clinician whose treatment plan requires effective assessment of a patient's SMP experiences, and for the researcher committed to advancing scholarship on digital well-being, what is the architecture of adolescents' emotional lives with social media?

The principal contribution of this work is an initial blueprint of networked teens' emotional experiences related to their uses of SMPs. Rather than an "either/or" model (i.e. social media either support or detract from affective well-being), findings instead support a "both/and" model: teens experience different constellations of *both* positive *and* negative influences of social media. Cutting a teen off from social media might therefore spare him from seeing photo-evidence of exclusion while simultaneously blocking a valuable source of supportive friendship interactions. The see-saw is also dynamic: SMP use may tip toward negative affect one day and positive affect the next day. Understanding contemporary adolescents' experiences requires ongoing, deliberate attention to multiple components of the social media see-saw.

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Notes

1. Pseudonyms are used in lieu of participants' given names.
2. Surveying of the 11th grade was limited by teachers' scheduling constraints; according to school administration, surveyed classes were representative of the broader swath of grade 11 students.
3. Use of the term "teens" in this section (findings) refers to teens in the interview study.

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