CLOSE ONLINE RELATIONSHIPS
IN A NATIONAL SAMPLE OF ADOLESCENTS

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ABSTRACT

This paper uses data from a national survey of adolescent Internet users (*N* = 1,501) to describe online relationships. Fourteen percent of the youths interviewed reported close online friendships during the past year, 7% reported face-to-face meetings with online friends, and 2% reported online romances. Two hundred forty-six youths provided details about one close online relationship. Most of these relationships were with same-age peers (70%) and crossed gender lines (71%). Many intersected with face-to-face social networks because they were initiated by introductions from friends or family (32%), involved people who lived in the vicinity (26%), were known to parents (74%), included offline contact by mail or telephone (70%), or involved face-to-face meetings (41%). Few youths reported bad experiences with online friends.

Surveys indicate that large numbers of youths use the Internet to communicate with others (Roberts et al., 1999; Rosenbaum et al., 2000). As Internet use has expanded among young people, there has been much speculation and some anxiety about the impact of its increasing prevalence. One area of concern has been the ease with which online communications like e-mail, instant messages, and chat rooms permit young people to converse with and form relationships with people they have never met face-to-face. There is a small but growing body of research about online relationships, which focuses largely on how the anonymity of Internet communications affects the quality of social ties that are developed online (Lea & Spears, 1995; Turkle, 1995) and how online relationships may affect offline social ties (Kraut et al., 1998). Further, media stories about manipulative adults who use the Internet to lure teenagers into meetings for illicit sexual purposes have raised fears that the anonymity of online relationships makes them

rife with deception and dangerous, especially for adolescents (Armagh, 1998). In the midst of the discussion, there is little empirical information about the extent to which populations of Internet users are forming online relationships with people they have never met face-to-face and the extent to which these relationships spill over into face-to-face social networks. Some researchers have gathered data on this topic from small online samples (Katz & Aspden, 1997; Parks & Floyd, 1996), but these data are not generalizable to a larger population of Internet users.

This paper uses data from the Youth Internet Safety Survey, a national telephone survey of youths ages 10 through 17, to describe the incidence and kinds of online relationships formed by adolescents, and to provide details about close online friendships, romances, and face-to-face meetings with online friends.

METHOD

The Youth Internet Safety Survey used telephone interviews to gather information from a national sample of 1,501 young people, ages 10 through 17, who were regular Internet users. "Regular" Internet use was defined as using the Internet at least once a month for the past six months on a computer at home, a school, a library, someone else's home, or some other place. This definition was chosen so that the sample would include a range of both heavy and light Internet users. Telephone numbers of households with children in the target age group were identified through another large national survey with which these researchers were involved. (This was the Second National Incidence Study of Missing, Abducted, Runaway and Thrownaway Children, a survey of over 16,000 households with children, which was conducted between February and December 1999.)

The interviews for the Youth Internet Safety Survey were conducted between August 1999 and February 2000 by experienced interviewers. Upon reaching a household, an interviewer speaking with an adult screened for regular Internet use by a 10- to 17-year-old youth in the household. When an eligible youth was identified, the interviewer conducted a short interview with the parent or caretaker who knew the most about the youth's Internet use and then asked for permission to speak with the youth. When parental consent was given, the interviewer described the survey to the youth and obtained his or her consent. Youth interviews lasted from about fifteen to thirty minutes.

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They were scheduled at the convenience of youth participants and arranged for times when they could talk freely and confidentially. Youth respondents received brochures about Internet safety and $10.

Participation Rate

Seventy-five percent of the households approached completed the screening necessary to determine their eligibility for participation in the survey. The completion rate among households with eligible respondents was 82%. Five percent of parents in eligible households refused the adult interview. Another 11% of parents completed the adult interview but refused permission for their children to participate in the youth interview. In 2% of eligible households, parents consented to the youth interview, but youths refused to participate.

Sample

The final sample consisted of 1,501 youths (boys = 790, girls = 708). The mean age was 14.14 years (SD = 1.96). Table 1 further describes the demographic characteristics of the sample.

Instrumentation

The primary purpose of the Youth Internet Safety Survey was to assess how often young people encounter unwanted sexual solicitations, pornography, and harassment online. The interview included questions about the existence of online relationships because some youth Internet users have been sexually solicited in the context of these relationships. Youths were asked a series of questions about those with whom they communicated online, distinguishing between communications with people the youth knew "in person" (or "face-to-face") and people they first met online (i.e., "In the past year, have you been online with people you don't know in person, but you met online through friends or family? For example, a friend introduced you to someone through e-mail?").

All youths were asked, "In the past year, has there been anyone you met on the Internet who you have chatted with or exchanged e-mail with more than once?" Youths who answered yes were asked about *casual friendships*: "Sometimes when you chat or e-mail with someone several times, they start to feel like friends. I mean you get to know them some and to like them. In the past year, have you started to feel like you were friends with anyone you met on the Internet but didn't know in person?"

Also, all youths were asked three questions about *close online relationships*. First, "Have you had a *close friendship* with someone you

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Table 1
Youth and Household Characteristics

Characteristic	All youths (N = 1,501)	Youths with close online relationships (n = 258)
Age of youth		
10	4%	2%
11	8%	3%
12	11%	5%
13	15%	14%
14	16%	15%
15	18%	24%
16	17%	19%
17	13%	18%
Mean age	14.14	14.75
Sex of youth		
Male	53%	48%
Female	47%	51%
Race of youth		
Non-Hispanic White	73%	79%
African-American	10%	7%
American Indian or Alaska Native	3%	1%
Asian	3%	2%
Hispanic White	2%	3%
Other	7%	6%
Don't know/refused to answer	2%	1%
Marital status of parent/guardian		
Married	79%	76%
Divorced	10%	13%
Single/never married	5%	6%
Living with partner	1%	1%
Separated	2%	2%
Widowed	2%	2%
Youth lives with both biological parents	64%	61%
Highest level of completed education in household		
Not a high school graduate	2%	2%
High school graduate	21%	22%
Some college education	22%	24%
College graduate	31%	32%
Postcollege degree	22%	20%
Annual household income		
Less than $20,000	8%	8%
$20,000 to $50,000	38%	39%
$50,001 to $75,000	23%	25%
More than $75,000	23%	22%
Type of community		
Small town	28%	33%
Suburb of large city	21%	18%
Rural area	20%	16%
Large town (25,000 to 100,000)	15%	16%
Large city	14%	15%

Note. Primary caretakers provided demographic information, except for race which was provided by the youths. Some categories do not add to 100% because of rounding and/or missing data.

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met on the Internet who you didn't know in person? I mean someone you could talk online with about things that were real important to you." Second, "Have you had a *romantic online relationship* with someone you met on the Internet? I mean someone who felt like a boyfriend or girlfriend." And third, "Has there been anyone you met on the Internet who you later *met in person?*" Youths who answered yes to one or more of these three questions about close online relationships were asked a series of follow-up questions about "the person you've known online who you've had the most contact with in the past year."

Analysis

Frequencies were run on variables describing characteristics of close online relationships. In some cases, Pearson chi-square tests and odds ratios were used to compare characteristics of groups.

RESULTS

Frequency and Types of Online Communications with Strangers

Most of the youths (55%) used chat rooms, instant messages, e-mail or other forms of online communications in the past year to converse online with people they did not know face-to-face. This 55% included youths who were introduced to online friends by face-to-face friends or family members (38% of youths), youths who met people online through chat rooms, instant messages, and similar forums (33%), and youths who met people online when they were using the Internet to get information for things like school projects (20%). (Some youths were in more than one category.) Thirty-nine percent of youths reported chatting or exchanging e-mail more than once with someone they met online, and 25% reported *casual online friendships*. Fourteen percent of youths reported a *close online friendship*, 7% a *face-to-face meeting* with someone they met online, and 2% an *online romantic relationship*. Overall, 17% of youths had formed at least one *close online relationship* in the past year (a close relationship, face-to-face meeting, or romance). Five percent reported more than one type of close online relationship (i.e., a close friendship and a romance or a meeting).

Gender and age of youths with close online friendships. Girls were more likely than boys (29% vs. 23%, $p < .01$, $OR = 1.4$, $CI = 1.1$ to 1.8) to report casual online friendships. Nineteen percent of girls and 16% of boys had formed at least one *close online relationship* in the past year (a close friendship, romance or face-to-face meeting). Girls

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were somewhat more likely to report a close friendship than were boys (16% vs. 12%, $OR = 1.4$, $CI = 1.0$ to 1.9), but girls (6%) and boys (7%) were equally likely to report meeting online friends in person and forming romantic relationships (2% for both). Seventy-six percent of the close online relationships occurred among youths who were age 14 and older.

Characteristics of Close Online Relationships

Type of relationship. The majority (95%, $n = 246$) of the youths who reported close online relationships provided details about one online relationship from the past year (see Table 2). Of these, 75% were identified as close friendships, 41% included face-to-face meetings, and 7% were described as romantic relationships. (Some relationships were in more than one category.) Twenty-three percent of the close friendships involved face-to-face meetings, as did 28% of the romances.

Initial encounters. Fifty-nine percent of close online relationships originated in chat rooms, 30% through instant messages or e-mail, 5% in gaming sites, and 6% some other way. Thirty-two percent of youths were introduced to their online friend by a face-to-face friend or family member. For example, an 11-year-old boy said his grandfather suggested he get in touch with an 11-year-old cousin. Also, several youths mentioned meetings through instant messages based on profiles posted online.

Gender of online friends. Two-thirds of the relationships reported by girls were with boys, and 79% of those reported by boys were with girls. Girls were less likely than boys to report cross-gender relationships ($p < .05$, $OR = 0.5$, $CI = 0.3$ to 0.9). Few of these cross-gender relationships were described as romantic or sexual. Teens who were age 14 through 17 were much more likely to report cross-gender relationships than were the younger youths (79% vs. 50%, $p < .001$, $OR = 3.7$, $CI = 2.0$ to 6.7).

The nature of the relationships. Sixty-four percent of youths stated that common interests drew them to their online friends. Mutual interests specified during interviews included ballet, skiing, skating, paganism, role-playing games, acting, musical theater, Star Trek, scary movies, and comic strips. Several youths mentioned books and reading. Some of the youths volunteered additional details. A 14-year-old girl said she became friends with a 14-year-old boy because they were both "against the porno stuff." An 11-year-old girl said of her friendship with a 16-year-old girl, "I taught her how to pitch a softball over the web." A 14-year-old girl said of her relationship with a 15-year-old boy, "He is a pretty good friend, a close friend, someone I can talk to about personal things."

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Table 2
Characteristics of Close Online Relationships with Face-to-Face Meetings Compared
to Those with No Face-to-Face Meetings

Characteristic	All (n = 246)	No face-to-face meeting (n = 145)	Face-to-face meetings (n = 101)
Gender of youth			
Male	47%	42%	55%
Female	52%	58%	45%*
Age of youth			
10	2%	3%	1%
11	4%	1%	7%
12	5%	6%	3%
13	14%	14%	14%
14	15%	18%	12%
15	24%	24%	25%
16	18%	16%	21%
17	18%	18%	18%
Mean age	14.71	14.75	14.68
Age range of online friends			
10 through 13	16%	15%	18%
14 through 17	67%	66%	70%
18 through 24	13%	16%	10%
25 through 44	2%	3%	2%
Age difference of youth and online friend			
Friend 2 or 3 years younger	4%	4%	3%
Same or within 1 year in age	70%	63%	81%**
Friend 2, 3 or 4 years older	18%	23%	11%*
Friend 5 or more years older	8%	10%	5%
Boy-girl or girl-boy relationship	71%	73%	71%
Types of relationships			
Close friendship	75%	98%	43%***
Romantic	7%	9%	5%
Face-to-face meeting	41%	--	all
Parties met online			
In a chat room	59%	68%	47%
Using instant messages	22%	17%	30%
Through e-mail	8%	5%	12%
In a gaming site	5%	5%	3%
Other	6%	5%	7%
What brought them together			
Same interest	64%	70%	55%*
Through family/friend	32%	21%	49%***
Getting information	4%	3%	11%*
Online friend lived within one-hour drive (n =210)	31%	9%	71%***
Offline contact (multiple answers possible)			
Online friend sent mail	58%	57%	58%
Online friend called on telephone	38%	18%	66%***
No offline contact by mail or telephone	30%	40%	16%***
Parent knew about relationship	74%	69%	81%*
Relationship was sexual in any way	2%	1%	3%
Online friend did something to make youth feel uncomfortable	2%	1%	3%

Note. 246 youths answered a series of questions about a close online relationship.
*$p \leq .05$, **$p \leq .01$, ***$p \leq .001$.

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Several of the youths had established online friendships with adults. A 15-year-old boy said he became close friends with a 24-year-old man when the 15-year-old made a web page for the man's music group. A 17-year-old girl reported a close friendship with a woman in her forties which sprang from encounters in a chat room run by a well-known self-help group. One youth described meeting his 40-year-old uncle online before they ever met face-to-face.

Vicinity of online friends. Eighty-four percent of youths knew where their online friend lived. Few youths reported relationships with people from other countries. Twenty-six percent of the relationships were with people who lived within a one-hour drive of the youths.

Offline contact. Seventy percent of close online relationships included offline contact by mail or telephone after the initial online encounter. Over one-third of youths received telephone calls. Further, 41% of the youths who answered follow-up questions about an online relationship reported face-to-face meetings with their online friends.

Parents' knowledge. Seventy-four percent of youths said a parent knew about their close online relationship.

Romantic and sexual relationships. Seven percent of youths who answered follow-up questions about a close online relationship called their relationships romantic ($n = 18$). Most of these youths (61%) were age 14 through 17. Fifty-six percent of these relationships were reported by girls. None involved same-sex partners. Most (72%) were described as both romances and close friendships. About one-quarter (28%) involved face-to-face meetings. Almost all (83%) involved youths who were within one year in age of each other and only one involved an adult who was more than 5 years older. (That instance was a relationship between a 17-year-old boy and a 29-year-old woman. The boy told the interviewer he ended the relationship when he learned the woman was married.)

All youths were asked if their online relationship was "sexual in any way." Only four, all boys ages 14 to 16, said "yes" to this question. The girls with whom they were involved were ages 15 through 17. Three of the four relationships included face-to-face meetings, all three of which were known to the youths' parents. In two instances the girls lived near the boys. The third girl, who did not live nearby, had been introduced to the boy through a friend or family member. The fourth relationship involved two 15-year-olds who had exchanged mail, but there were no phone calls or face-to-face meetings.

Looking at the romantic and sexual relationships together, 22% were initiated by introductions from face-to-face friends or relatives. There was offline contact by mail or telephone in most cases (78%), and parents knew about two-thirds of the relationships.

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Characteristics of Relationships Involving Face-to-Face Meetings

Connections with social networks. The close online relationships that resulted in face-to-face meetings were different from other close online friendships in several ways (see Table 2). Significantly higher numbers were initiated through introductions by friends or family, and higher numbers involved online friends who lived within an hour of the youths. There was more offline contact by telephone, and more of these relationships were known to parents.

More than half of the face-to-face meetings involved relationships that were *not* described as close friendships or romances. Virtually all of the youths in this category (89%) lived within an hour's drive of their online friend. (These face-to-face meetings may have been casual events where a youth encountered an online acquaintance at a group event like a high school game or in the presence of a mutual friend.)

Safety concerns about meetings. Sixty percent of the youths who attended a face-to-face meeting told a parent prior to the meeting. Of those who did not tell a parent, most did tell a friend about the meeting. However, 10% told no one. Also, almost one-quarter of the youths (23%) were alone when they met their online friend. (See Table 3.)

Expectations about online friends. We asked youths who attended face-to-face meetings, "When you first met this person, did she (he) look the way you expected she (he) would look?" About four-fifths of youths said yes. Of the 21% who said the individual looked different, personal appearance was the main source of discrepancy. In 4% of meetings, the person's age was different than the youths expected. (The online friends in these cases were all teenagers, with one exception, and that was the uncle, described above, who met his teenage nephew online before they ever met face-to-face.)

Bad Experiences with Online Friends

We asked youths whether their online friends did anything to make them "even a little uncomfortable," or whether anything frightening happened at face-to-face meetings, and we also asked them to rate any discomfort or fright on a scale of one to five and to describe what happened. Two percent of youths ($n = 4$) reported that their online friend did something to make them uncomfortable and one youth reported being frightened. A 10-year-old girl was a little uncomfortable (1 on a scale of 1 to 5) because a 12-year-old boy told her he loved her. A 15-year-old girl felt a little uncomfortable (1 on a scale of 1 to 5) because her online friend, a 16-year-old boy, "kept talking about death." These instances did not involve face-to-face meetings.

Two youths reported discomfort after face-to-face meetings. A 16-year-old boy who described a meeting with an 18-year-old girl was very

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Table 3
Characteristics of Face-to-Face Meetings

Characteristics	Face-to-face meetings (n = 101)
Youth told parent about first face-to-face meeting	60%
Youth told friend about first face-to-face meeting, but not parent	29%
Youth told no one about first face-to-face meeting	10%
Someone accompanied youth to first face-to-face meeting	77%
Youth was accompanied by (n = 78)	
Friend	71%
Parent	13%
Sibling or other relative	13%
Other	4%
Meeting was within one-hour drive of where youth lived	82%
Meeting occurred at	
Public place, like mall, park, sports event	71%
Youth's home	5%
Someone else's home	10%
Other	12%
Online friend did *not* look the way youth expected	21%
What was different than youth expected	
Age	4%
Height or weight	12%
How face looked	15%
The way they dressed	8%
Online friend did something to make youth afraid at meeting	1%
Youth was physically or sexually assaulted by online friend	0%

uncomfortable (4 on a scale of 1 to 5) because she smoked marijuana. Another instance was potentially exploitative. A 16-year-old girl reported a close online friendship with a man in his thirties followed by a face-to-face meeting in a public place. She was a little uncomfortable (1 on a scale of 1 to 5), because he asked her to spend the night in his hotel room. She declined his request. One 16-year-old girl was frightened after a face-to-face meeting with a 17-year-old boy at a public place. She became afraid (3 on a scale of 1 to 5) when the boy followed her and a friend who had accompanied her from the meeting place.

We also asked whether youths were harmed, saw others harmed, or were exposed to illegal activity at face-to-face meetings. No one reported being harmed or witnessing harm. Except for the marijuana incident described above, no one reported witnessing illegal activity.

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Limitations

This is exploratory data. Because online relationships were not the main focus of this survey, we did not attempt to determine the number of online relationships these youths developed or to measure the duration or quality of the relationships. Thus, the relationships that youths described may not typify the full range of close online relationships of youths in general. Moreover, research about youth Internet use is a new undertaking. Procedures for inquiring about this realm have not been standardized or validated, and this study did not use measures that had been evaluated or validated in other research. In terms of the sample, some youths declined or were barred by their parents from participating, and we do not know whether their inclusion would have changed the results. Also, we cannot be sure the youths who participated were fully candid.

DISCUSSION

This survey found that, in the past year, most youth Internet users between the ages of 10 and 17 used the Internet to converse with people they had never met face-to-face. However, most of these online conversations did not lead to close relationships or face-to-face meetings. Some were one-time encounters, and others were short-lived exchanges or casual friendships. Nonetheless, a significant number of youths developed close friendships online (14%), had face-to-face meetings with people they met online (7%) and developed romantic relationships via the Internet (2%). Given the extent of Internet use among young people in the age categories covered by this survey, and given adolescents' natural interest in forming close relationships, the number of youths involved in close online friendships, romantic relationships, and face-to-face meetings with online friends is quite large and likely to increase as Internet use grows.

Age-related characteristics. With a few exceptions, youths were using the Internet to pursue relationships with peers. Most of the close online relationships occurred between youths who were close enough in age that they might attend school together or be together in other environments where teenagers and young adults would commonly meet.

A few of the youths had close friendships with adults who were significantly older. Cases where adults have used online relationships to manipulate and exploit adolescents have been a focus of concern by law enforcement, and we did find one relationship that looked exploitative. However, most of the relationships between adolescents and

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adults seemed benign. This is probably one of the areas where the Internet reflects "real life." Young people who go online can meet helpful and interesting adults who can offer valuable companionship and advice, but they can also run into people who would cause them harm.

Gender differences. The stereotype that girls, but not boys, use the Internet to form relationships is not bolstered by the data. The boys were as likely as the girls to converse online with people they did not know face-to-face and to report face-to-face meetings and online romances. Girls were somewhat more likely to report both casual and close online friendships, but the differences were not large.

Cross-gender relationships. Interestingly, we found that most close online relationships crossed gender lines. This is in contrast to face-to-face relationships where same-sex relationships predominate (Hartup, 1993). Among youths, the Internet may be serving as an important vehicle for communication between the genders, especially for teenage boys, who reported higher rates of cross-gender relationships than did girls. The unique qualities of Internet communication may facilitate contact between teenage girls and boys in a number of ways. The Internet may provide adolescents with a means of getting acquainted that is free of the distraction and awkwardness generated by the physical presence of someone of the opposite sex. Youths may feel less self-conscious online and more likely to be judged on their "inner" self than on their physical characteristics. For some, communication may be easier because they can compose what they are going to say. Also, teens may feel freed from adolescent social networks where face-to-face friends and acquaintances can gossip and judge their behavior. The Internet may provide an appreciated level of privacy.

Few of the cross-gender relationships reported on were described as romantic or sexual. Of course, there is considerable anecdotal evidence that youths use the Internet to explore sexual topics. It is possible that youths were not entirely frank about the sexual aspects of the online relationships they reported, or they may not have picked relationships with sexual aspects when they chose a relationship about which to answer follow-up questions. On the other hand, nervousness about adolescent sexual activity may cause adults to have an exaggerated sense of how often young people are using the Internet to pursue sexual interests. In fact, the Internet may be providing a venue for adolescent boys and girls to get to know each other outside of the teen dating context.

Social context of close online relationships. Most of the close online relationships formed by youths intersected with face-to-face social networks, especially in relationships where face-to-face meetings ensued.

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These intersections came about in three ways. First, many relationships with online friends were initiated through social networks, when online contact was arranged or suggested by face-to-face friends or family members. Many of these online introductions may have been sparked when mutual friends brought together youths who shared interests, since most close online relationships sprang from mutual interests. The Internet makes communication easy and inexpensive for youths. Outgoing teens may enjoy extending their social networks and pursuing their interests via the Internet, and shy teens may be comfortable approaching other youths by e-mail or instant message or in a chat room, especially when they can claim a mutual acquaintance.

A second way close online relationships intersected with face-to-face social networks is that many involved online friends who lived in the vicinity. The teens in these relationships may have been congregating at local web sites that sometimes act as community Internet "hangouts." Visiting these web sites is the cyberspace equivalent of cruising the local hamburger stand or hanging out at the mall. Youths can also meet other local youths by putting their schools or towns in profiles that are posted online. Many teens who are conversing with online friends who live in their vicinity may be using the Internet to expand their local social circles by meeting youths from neighboring high schools or towns.

Third, close online relationships intersected with social networks because most were known to parents. This means youths are probably talking about their online relationships, and their families and friends are probably commenting, questioning and helping teens to make judgments about these relationships. These sorts of conversations allow for some degree of scrutiny of online relationships within face-to-face social networks and some oversight about whether they fit into the larger social networks to which youths belong.

Offline contact. Close online relationships were not confined to cyberspace. Most of the youths had received mail from their online friends and many had talked on the telephone with them. Face-to-face meetings happened in 41% of the relationships which youths described. We did not ask questions about the sequence of different kinds of contact, but our data suggest that online friendships are pursued similarly to face-to-face friendships, with people desiring more contact and more forms of contact as they get to know and like one another. The Internet may be providing new meeting places for adolescents, but relationships that are initiated in cyberspace do not appear to be isolated from other kinds of contact and communication.

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Expectations about online friends. The idea that online friends may disguise their true identities and motives is a recurring theme in discussions of online relationships. However, while the reports about face-to-face meetings of parties to online relationships in the data may not precisely represent online relationships as a whole, they do suggest that many online relationships are what they seem.

Safety. Initial face-to-face meetings between online friends are the first point where there is physical contact between them and where misconceptions and deceptions about identity become apparent. These meetings are considered the primary source of danger in online relationships. This survey suggests that while most young people follow basic safety rules about face-to-face meetings, informing parents and bringing friends or family members to meetings, some youths did not take these precautions. This finding is certainly a matter of concern.

In some of these cases, the intersections between close online relationships and face-to-face social networks discussed above probably help to minimize the possibility of deceit and, thus, danger. Mutual acquaintances can vouch for the identities of online friends. Local social networks can provide contacts to verify online identities. Discussions with friends and family members can be "reality checks" for online relationships. It may be that the more ways an online friendship intersects with face-to-face networks, the safer it is. Law enforcement reports indicate that online relationships can be dangerous, and the more dangerous ones may be those that are isolated from the family and friends that youths interact with in daily life. Offline contact by mail and telephone in these relationships may cut both ways. If mail and telephone calls are exchanged in relationships that intersect with networks of friends and family members, they may provide additional means of verifying identity and of determining the compatibility of the relationship. But if these types of contact occur in secret, they may allow for greater manipulation by an exploiter.

CONCLUSION

Given the interest adolescents naturally have in forming close relationships and the amount of time and emotional energy they put into their relationships, it is not surprising that the Internet has become another means by which young people expand their social networks and form close relationships with others. Moreover, in many respects, these online relationships appear to be similar to and to intersect with the face-to-face relationships created and maintained by adolescents.

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This is not the first survey to note that Internet friendships are relatively common and that they tend to spill over into real life. Katz (1997) and Parks (1996) reported similar but less detailed results using online samples.

The Internet is a medium with unique qualities. Some of these qualities, like anonymity, may make cyberspace a particularly intriguing place for young people, who tend to be both socially awkward and eager to connect with others. But the Internet is just one of many technological advances to which adults are adjusting and youths are growing up with. It is important to understand the role of close online relationships in the context of adolescent relationships in general and to study their impact on adolescent development. We need to gauge what is safe and healthy about online relationships and what is hazardous, so that their dangerous aspects can be avoided. But it also seems that online relationships are best viewed as integral parts of adolescent life rather than isolated from other aspects of it.

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