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ORIGINAL PAPER

Information-Seeking Practices during the Sexual Development of Lesbian, Gay, and Bisexual Individuals: The Influence and Effects of Coming Out in a Mediated Environment

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Abstract Constructing a sexual identity is one of the major developmental tasks of adolescence. Applying the Media Practice Model, this study retrospectively examines how self-identifying lesbian, gay, and bisexual (LGB) individuals used media during the commencement of the coming-out process and the effects of media use during this pivotal time of development. Results indicate that the Internet plays a critical role in the development of LGB sexual identities. Heavy users of media during the coming-out process are significantly less likely to communicate openly with their families later in life. However, individuals' reports of loneliness and self-esteem are not affected. Conclusions suggest that mediated forms of communication can be beneficial for sexual exploration among LGB individuals.

Keywords Sexual orientation · Adolescent development · Media effects · Family communication

Understanding and appreciating one's own sexuality can be an arduous process creating grief and complications for many adolescents. The case is especially true for individuals who realize their sexuality may not fit societal norms. Although adolescents spend a significant amount of time talking about sex and exploring sex in the media (Savin-Williams and Diamond 2004), using the media during sexual exploration could have consequences on the family structure. Research has systematically explored the ways in which family communication is related to media use (Wilson 2004), and how lesbian, gay, or bisexual (LGB) adolescents utilize family communication when dealing with their sexuality (Feldman and Rosenthal 2002). Previous research has not, however, analyzed how each of these

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elements combines to form an interwoven pattern. The current study attempts to unravel how media consumption during the commencement of the coming-out process subsequently affects LGB individuals' patterns of family communication and psychological well-being (i.e., reports of loneliness and self esteem).

Adolescence and the Coming-Out Process

When individuals realize they primarily have sexual feelings for the same sex, they typically go through five stages known as the coming-out process: pre-coming out, coming out, exploration, first relationships, and integration (Coleman 1982). The first two stages of this process, the pre-coming out stage and the coming-out stage, can be vital to successful integration of sexuality into individuals' everyday lives. During the pre-coming out stage, individuals wrestle with the realization of their sexuality, struggle with the decision to tell others about it, and routinely seek information related to their sexuality. During the coming-out stage, they begin to tell others about their sexuality (Coleman 1982). It is common for the pre-coming out stage and the coming-out stage to occur during adolescence (Dank 1971; Ryan and Futterman 1998).

Adolescence is a critical time in a person's life when the process of cementing identity is most salient. As adolescents come to understand who they are, they incorporate notions of their sexuality into their identity. When an adolescent does not understand his or her identity, sexuality included, the individual has potential to enter a stage known as role confusion (Erikson 1968). In this stage, a young person enters a "moratorium," eventually leading to an identity crisis that can be detrimental to the overall development of the adolescent's identity. To avoid role confusion and eventual identity crisis, it becomes important for adolescents to develop strong relationships with peers (Hellenga 2002).

Instead of turning to doctors or parents, adolescents converse with their peers about sensitive topics like sexuality. Ackard and Neumark-Sztainer (2001) found that teens expressed more confidentiality within friendships than any other relationship. It is within the safety of friendships that adolescents are willing to self-disclose personal information about sensitive topics (Di Iorio Kelley and Hockenberry-Eaton 1999), helping to construct sexual identities and an understanding of sexual practices (Berndt and Savin-Williams 1993; Di Iorio et al. 1999; Kallen et al. 1983). In sum, research suggests adolescents may be able to safely and confidentially compare themselves and their sexual identities with like others. However, LGB adolescents' awareness of social norms vilifying their attraction to same-sex individuals may lead many to suppress their sexual identity from their established peer networks for fear of being ostracized (Pilkington and D'Augelli 1995). Gover (1994) reported that 95% of gay youth surveyed expressed feelings of isolation from peers. If LGB adolescents are not experiencing sexual identity formation with the assistance of face-to-face communication among peers, they may look elsewhere for support and information.

In early work on the coming-out process, Dank (1971) argued that a man questioning his sexual identity is facilitated by entering a new social setting that

allows him to become more knowledgeable about homosexuality and ultimately may lead to a greater understanding of his own sexual self. The author notes that such knowledge can be gained through media outlets. As early as the 1970s, research was concluding that books, magazines, and pamphlets were outlets for gay men to utilize in accepting their sexuality. Technology has changed the media landscape, but it has not diminished the importance of media during the sexual self-realization of LGB individuals.

The Influence of Mass Media

Media, particularly the Internet, may now be serving as the primary information source for LGB adolescents. Ryan and Futterman (1998) argued the Internet plays an important role in early adolescents' declaration of sexuality because it provides information that allows teens to label feelings and figure out who they are. Egan 2000) found young males in the pre-coming out stage used Internet pornography to understand and develop their same-sex feelings. Furthermore, participation in Internet newsgroups during sexual identity formation has led to greater self-acceptance and disclosure of hidden sexual identity to family and friends (McKenna and Bargh 1998). These examples illustrate how the Internet may serve as a catalyst to push individuals from the pre-coming out stage to the coming-out stage.

After LGB individuals are able to express their sexual identities to themselves, the next developmental task to tackle is coming out to others. If individuals can integrate their sexual identities into their lives successfully, they will experience a level of acceptance. However, if their sexual identities are rejected by their support networks, a stage similar to the pre-coming out stage may be entered. The Internet may play a large role in assisting LGB adolescents so that their sexual identities are not outright rejected. A vast majority of LGB personal websites and blogs contain stories about coming out (Alexander 2002). Huffaker and Calvert (2005) found that 17% of adolescents who were blogging about their personal lives identified as lesbian or gay. The stories communicated through computer-mediated means could serve as information sources for the LGB adolescent browser, in essence, constructing a virtual community that gives these adolescents a sense they are not alone.

As adolescents navigate their sexuality online, they are in control of what they want to read, who they want to speak with, and how much personal information they wish to disclose. The anonymity provided by computer-mediated communication is one of the reasons that individuals participate in virtual communities (Cooper 1998). Eventually as adolescents become more secure in their non-heterosexual identity, they begin to disclose other aspects of their lives with their newly formed online social ties (Egan 2000). As LGB adolescents begin to come out online, they are essentially strengthening their real life sexual identity. Consequently, "the Internet might have an impact on the coming-out process; that is to say one can come-out in the safe and anonymous virtual world before disclosing one's sexual identity in real life" (Tikkanen and Ross 2000, p. 606).

Although previous research points to the importance of understanding the Internet as a tool during the coming-out process, other media could also be used for information-seeking purposes. Research suggests that gay men and lesbians are generally high media consumers (Shaw 1997). The contemporary content of television, for example, is replete with growing representations of LGB characters (Fouts and Inch 2005; Hart 2000). Raley and Lucas (2006) conducted a content analysis of prime-time television programs and found that lesbian and gay characters are no longer missing from television; of the 80 television shows listed in the fall television lineup of 2001, 7.5% of the shows had a reoccurring lesbian or gay character. Lesbian and gay characters were shown as no different from their heterosexual counterparts. For example, lesbian and gay characters were shown with children and in romantic relationships, two variables the authors argue create a level of respect for non-heterosexual characters in primetime. A changing television landscape that includes positive portrayals of lesbians and gay males makes it plausible that LGB adolescents might turn to television as a major source of information as well.

Adolescent Media Practice Model

The Media Practice Model (Steele and Brown 1995) was developed as a theoretical model to understand how adolescents consume media. Teens "build on and transform the shared sociocultural knowledge available through the media" (Steele and Brown 1995, p. 577) as a way to understand their identity. Adolescents are seen as active media users in the media practice model: selecting media, evaluating the significance of the mediated messages in their own lives, and applying those meanings to their everyday lives. The model explains media use through a construct referred to as "lived experience." One's lived experience is a sociogenetic construct that considers demographic characteristics, culture, lifestyle, developmental progress, and countless other variables that differentiate one individual from another. Understanding one's lived experience helps to explain how media consumption may influence adolescents. Using the Media Practice Model, Steele (1999) found that identity affects teenagers' interactions with media and how they apply media matters to their everyday lives. Given that many LGB adolescents are creating, questioning, and sometimes even fighting their sexual identity, the Adolescent Media Practice Model is an insightful framework in which to study the impact of media on the coming-out process for these youth.

Since discovering information about LGB sexualities may seem stigmatized and frightening to adolescents, turning to the seemingly anonymous nature of media may prove to be the best alternative to face-to-face interpersonal communication. Due to the sensitive nature of the coming-out process, the high level of anonymity that media affords users, and the capacity for media to serve as an escape, the following is hypothesized:

H1 Participants will self-report using media more than face-to-face interpersonal means as a research tool during the coming-out process.

The Internet offers the potential for complete anonymity, creating a sense of safety that many feel when engaging in online communication (Munt et al. 2005). The anonymity afforded by the Internet makes integrating Internet information about sexuality into adolescents' lived experience easier. Hence, the following is hypothesized:

H2 Participants will self-report using the Internet more than other forms of mass media as a research tool during the coming-out process.

However, the Internet does not have the history that radio, print, and traditional screen media have in American culture. Consequently, the following is hypothesized:

H3 Younger participants will be more likely to self-report using the Internet during the coming-out process than will older participants.

The Internet is closely tied to interaction (McMillan 2002). Using the Internet, one can quickly locate people with compatible interests, find partners for collaboration, and exchange goods at a high speed (Lievrouw and Livingstone 2002). The extreme level of interactivity that the Internet offers is lacking in more traditional media. Combining the concept of interactivity with the assumptions of the Media Practice Model, it can be argued that individuals have more control over the information presented to them online than they would in radio, print, or traditional screen media resources. For example, if an LGB adolescent was specifically interested in finding out more information about sexual intercourse, the Internet allows the adolescent to search and find the information relevant to his or her concern. This is not the case with more passive media, such as television or film. Hence, it is hypothesized that:

H4 When participants discuss the role of media, they will speak more positively of Internet experiences than they will speak of traditional screen media experiences.

Adolescence and Family Communication

Research has pointed to the importance of family communication regarding teen sexuality, particularly when teens are exploring alternative sexualities (Feldman and Rosenthal 2002). These conversations can be difficult, especially if the family atmosphere is homophobic or aversive to intimate conversation (Baker 2002). D'Augelli Grossman and Starks (2005) interviewed 293 LGB youth about their family communication and parental awareness relating to their sexual identity. Findings revealed that those teens who had disclosed their non-heterosexuality to parents tended to have less internalized homophobia and more current family support. However, these same teens also reported that they had received past verbal victimization from their parents because of their sexual orientation. These findings suggest that LGB adolescents may have to undergo periods of verbal victimization from parents in order to reach a point where the family is supportive. As previously noted, if verbal victimization leads to the rejection of sexual identity, an individual can enter a period of identity crisis (Erikson 1968). Even for those teens that choose not to follow this disclosure process, family communication might be strained and

limited, underscoring the importance of family communication during the coming-out process of LGBT youth.

Although it provides adolescents with a safe and anonymous space to initially disclose their feelings, the Internet can be detrimental to family communication because of mere displacement. Kayany and Yelsma (2000) reported that time spent online significantly affects time spent engaging in family conversations, suggesting that adolescents who spend a lot of time on the Internet discussing their sexuality with peers are potentially missing out on family communication opportunities. For example, Ben-Ari (1995) interviewed adult lesbians and gay men and reported that disclosure to family members only occurred when the desire for openness and closeness developed, typically well after their sexual self-realization. The need to preserve control of their sexuality overshadowed the desire to disclose it. For adolescents who are discovering their sexuality in a technologically saturated society, the media might help them quell the need to disclose sexuality to family members. Such containment of personal information during adolescents could continue to affect the openness that LGB adolescents perceive with their families. In line with the concept of displacement, the following is hypothesized:

H5 Self-reported heavier users of media during the coming-out process will report less family openness in their current lives than will light users of media during the coming-out process.

Effects on Psychological Well-Being

It becomes even more vital to understand the relationship between media and the coming-out process because individuals often seek out particular types of media when they are feeling unhappy or lonely (Bhatia and Desmond 1993). Previous research has reported that single gay men report high levels of loneliness and tend to talk to members of their social support network more so than do gay men who are in committed relationships (Berger and Mallon 1993). It is safe to assume that most LGB adolescents who are developing an awareness of their sexual desires are not in committed relationships, therefore emphasizing the importance of establishing social support networks. Furthermore, during the pre-coming out stage, many "are often depressed because they are not being accepted for their true sexual identity, which is a major part of themselves" (Coleman 1982, p. 471). Conversely, gay men who turn to online news groups and discussion forums have been shown to have greater self-esteem and disclose hidden sexualities to family and friends with more positive expectations than those who do not have access to Internet groups (McKenna and Bargh 1998). The current study asks the following research questions to help understand these seemingly contradictory findings by identifying any relationships between media use, loneliness, self-esteem and LGB identities:

RQ1: What is the relationship between media use during the coming out process and self-reports of loneliness?
RQ2: What is the relationship between media use during the coming out process and self-reports of self-esteem?

Method

Participants

A convenience sample of self-identifying LGB individuals completed the questionnaire at regularly scheduled meetings of LGBT-oriented registered student organizations at a large, Midwestern university or through an online version of the questionnaire ($N = 56$). Because the Internet offers an anonymous space for self-disclosure, one may infer that there would be qualitatively different responses between those who filled out the paper form of the questionnaire and those who filled out the online version. However, there was no significant difference in length of response or level of self-disclosure between those who filled out the paper form and those who filled out the online version. This could be due to the meetings where data was collected. Those who filled out the paper form were at a meeting of an LGBT group on their own college campus. Individuals who attend such meetings are presumably comfortable with their sexuality and can self-disclose information about themselves more easily than LGBT individuals who are not at ease in such a situation.

The participants (mean age = 24) predominantly identified as male (69%) and gay (64%). Females (24%) who identified as lesbian (20%) made up a much smaller portion of the sample. Bisexuals accounted for 9% of the sample, with 7% of participants not reporting their sex or sexual identity.

Procedure

During regularly scheduled meetings of LGBT-oriented registered student organizations, the researcher asked those who were in attendance that self-identified as either lesbian, gay, or bisexual to fill out a questionnaire inquiring about the individual's coming out process and communication patterns. The survey took approximately 20 min to complete. No incentive was given for participation.

The online version of the questionnaire was identical to the questionnaire filled out in hard copy by participants at student organization meetings. The consent process for the paper survey and the virtual survey were identical with one exception. The online survey had the ability to match names with responses. To assure anonymity, no name was collected on the online version of the consent form. By clicking on the "Next" button at the bottom of the online consent form, individuals were made aware that they were giving consent to participate without providing an online signature.

Measures

Previous research on LGB individuals and media has directly asked participants to report on their media consumption (Ross et al. 2004). By asking individuals to report on their specific media use, the researchers prime the participants to talk about the importance of the media in the coming-out process. This study takes a different approach, asking participants to first report on the coming out process

through narrative without any priming to mention the media and to then report on the importance of the media. Such an approach makes any mention of media in the first question that much more salient to understanding how LGB individuals navigate information during the sexual self-realization process. These questions can be found in the Appendix. Both of the questions were open-ended with hopes of collecting unique data that could be missed through close-ended measures.

Information-Seeking Practices

The questionnaire first asked participants to think retrospectively, back to the time in their lives when they were realizing that they might have alternative sexualities. Participants were asked the importance of different forms of communication (i.e. magazines, family, television, friends) in providing them with information about "the coming out process," "sexual health," and "the LGBT community, culture, and lifestyle" through rank-order questions and Likert-type scales. Reliability may be a concern with retrospective reporting. However, a study testing the reliability of self-reported sexual behavior among LGB adolescents found that LGB youth are capable of remembering very detailed information about their lifetime sexual past in several interviews conducted weeks apart (Schrimshaw et al. 2006). If adolescents are able to reliably repeat details about their sexual history to interviewers, it can be assumed that recalling simple narratives about the coming-out process should be a reliable means of gathering anecdotal data.

Family Openness

Caughlin (2003) suggests 10 distinct underlying dimensions that describe an individual's family communication standards. One of these standards is family openness. Caughlin's factor analysis of items measuring family communication standards created a set of six Likert scale questions measuring the "openness" dimension of family communication. The mean score of responses to these six questions were utilized as a measure of family openness in the current study.

Loneliness

The mean of responses to the Three-Item Loneliness Scale, a previously validated short version of the R-UCLA Loneliness Scale (Hughes et al. 2004), was used as a score of participant's self-reported loneliness. The Three-Item Loneliness Scale is a unidimensional measure of loneliness due to lack of social interaction; items are rated on a 4-point scale ($\alpha = .94$).

Self-Esteem

Self-esteem was measured using the Rosenberg Self-Esteem Scale. This 10-item scale measures an individuals' general self-worth (Rosenberg 1963). Silbert and Tippett (1965) found an acceptable level of test-retest reliability ($r = .85$), and Demo (1985) noted adequate validity ($\alpha = .86$).

Reliability

The open-ended, essay-style responses of the participants were coded by 2 undergraduate coders trained using a codebook of definitions. Both of the coders self-identified as gay males. Having coders who self-identified as gay, lesbian, or bisexual was important to the validity of the coding procedure. This safeguard stems from recommendations by Neuendorf (2002), who argues that coders must have a common cultural understanding for internal reliability purposes. Many co-cultures in American society have their own slang or verbiage that is primarily recognizable to the in-group but would have little meaning to those outside of the community. Because terminology exists among LGB individuals that is specific to those identifying as LGB, having coders who could easily decipher the context of the responses was imperative. The responses were coded for primary source of information during the coming-out process, secondary sources of information, and tone of the statement. The full sample of 108 responses was double coded to measure inter-coder reliability. Cohen's kappa was used to measure inter-coder reliability (*kappa* = .96).

Results

The first hypothesis posited that participants would report using media more than face-to-face interpersonal relationships as a means to gather information during the coming-out process. The first hypothesis was supported. Without being prompted to discuss the media, almost three quarters (72%) of the sample reported using some kind of media as their primary means of gathering information during the coming-out process. A chi-square analysis of frequency of mediated communication versus face-to-face communication as a means of gathering information was significant, χ^2 $(1, N = 53) = 53.00, p < .05$.

Upon further examination, the medium used most commonly for information-seeking purposes during the coming-out process was the Internet; 70% of participants report using the Internet a resource for information. Almost half of the sample (49%) reported not just using the Internet as a resource, but using the Internet as their *primary* source of information during the coming-out process. A chi-square analysis was also performed on the frequency of using the Internet as a function of primary media use. This was significant χ^2 $(1, N = 53) = 20.15$, $p < .05$. The second hypothesis, claiming that participants will report using the Internet more than other forms of mass media as a research tool during the coming-out process, was also supported.

The third hypothesis predicted that younger participants would be more likely to claim use of the Internet as an information-gathering tool than would older participants. This was supported. Age was dichotomized via a median split so that all participants aged 18–23 were in one group while participants 24 and older were in another group. An ANOVA revealed a statistically significant effect of age on Internet use $F(1,53) = 7.39, p < .05$. Naturally, the younger participants were more likely to seek information from the Internet than the older participants. Given that

older participants would likely not have access to the Internet when realizing their sexuality, it is evident that younger participants would use the Internet more than older participants for information-seeking when beginning the coming-out process. Intrinsically this begs the question, where did the older participants seek information? Although this was outside the scope of the proposed hypotheses, the data reveal that there was a significant effect of age on the propensity to seek information from a counselor $F(1, 53) = 6.50$, $p < .05$.

The fourth hypothesis examined the tone participants used to describe their information-seeking experiences with regards to specific media. Most (92%) media resources discussed in the narratives about the coming-out process were coded as neutral. A very limited number of responses (8%) prescribed a hedonic tone to the types of resources described as useful during the coming-out process. Such a low number of responses with a hedonic tone make statistical analyses of significance difficult to validate. However, a more qualitative exploration of the data reveals interesting results. Typically, when participants were speaking positively about a medium they noted the medium's safety or anonymity. A 21-year-old lesbian stated, "I used the internet A LOT. I think because it seemed [the] safest, most anonymous way to find information." Frequently, participants noted how they positively identified with media characters. An 18-year-old gay male participant stated, "I guess it was good to see characters such as Will from *Will & Grace* or Marco from *Degrass* because they showed other gay people were out there…" However, when participants spoke negatively about media, it was based primarily in mediated stereotypes. "Since I lived in rural areas, most LGBT role models for me came from movies and television. These sources showed more extreme stereotypes which warped my initial view of LGBT people" (22-year-old gay male). The results are best exemplified by a 24 year-old gay male participant who wasn't quite sure how to assign a tone to media. Feelings were clearly mixed when he responded:

> I saw myself trying to relate to the few very stereotyped representations I saw in books and on TV. I also bought magazines (*Out, The Advocate*) to try and learn more about gay people and gay culture. Some of it was just confusing; too few representations which were all too stereotypical to really relate to. But it was better than nothing. I also remember Ellen DeGeneres coming out on TV shortly after I came out (maybe 1 or 2 years later) and found that I could really relate to her character and the issues she faced before her show was cancelled. This was one of the few media representations I can remember that I felt I could really identify with that was not just a stereotype.

The inability for participants to assign a hedonic tone to their mediated experiences, coupled with an overwhelming use of the Internet as an information source, serve as support for the Media Practice Model. As participants teetered between negative and positive interpretations of media, they were actively engaged in whether or not the representations and information available to them were meeting needs and were reflective of their lived experience. Becker (1998) examined the ambiguous relationship LGB individuals have with the media. Whereas primetime has embraced openly gay characters in programs such as *Friends*, *Will & Grace,* and *The O.C.*, there remains the capacity for LGB youth

who do not identify with the characters available to them to "feel increasingly excluded from the mainstream's understanding of what it means to be gay or lesbian" (Becker 1998, p. 43).

The Media Practice Model also informs the unique differences in the open-ended responses of participants who identified as bisexual. Although no statistical differences existed between media consumption and identifying as lesbian, gay, or bisexual, there were more consistent patterns about the role of media in the open-ended responses of participants identifying as bisexual. Bisexual participants were very critical of the media, identifying very little with media characters. A 22-year-old bisexual female noted that "the media gave me a lot of misinformation. It was like a what-not-to-do guide. I hated the misrepresentation of bisexuals as loose…" Another participant identifying as bisexual stated that "there aren't really that many characters that identified as bi, so no, the media did nothing to help me better understand my identity. If anything, it probably hindered the process because the few times bisexuality is mentioned, we are always portrayed as either indecisive or oversexed" (27 year-old bisexual female). Bisexual participants were keen to the absence of individuals they could identify with in the media.

The fifth hypothesis posited that individuals who self-reported higher consumption of media during the coming-out process would self-report less family openness in their present lives. Regression analyses were performed to explore how well media variables at Time 1 (the coming-out process) predicted family openness at Time 2 (the time of participation in the study). Because magazines and newspapers were highly correlated ($r = .75$, $p < .01$), only magazines were put into the model. Similarly, movies and television were also highly correlated ($r = .71$, $p < .01$), so only television was included in the model. These decisions were made to prevent problems resulting from multicolinearity. Results of the regression analysis reveal that the model is a significant predictor of family openness, $R^2 = .22$; F (1, 50) = 3.37, $p < .05$. See Table 1. Even when controlling for family as a source of information at Time 1, results reveal that media exposure at Time 1 predicts family openness at Time 2. H5 was supported.

The research questions asked about the relationship between media use and reports of loneliness and self-esteem for LGB individuals. Results of a regression analysis reveal there are no significant relationships between these variables. This suggests that reliance on media for information during the coming-out process, as well as current media use, do not impact reports of loneliness or self-esteem.

Table 1 Regression analyses for sources of information at time 1 predicting family openness at time 2

Variable	*B*	*SE*	*β*	ΔR^2
Block 1				.11*
Family	.193	.079	.328*	
Block 2				.22*
Television	−.183	.097	−.188	
Internet	−.046	.082	−.557	
Magazines	.169	.088	.258	

Note: $N = 52$, $*p < .05$

Discussion

All participants in the current study were able to find sources of information during the coming-out process. No participant ever felt so isolated during this tender process as to report no sources of information available to him or her. Most of the participants reported media as a primary source of information. Overwhelming amounts of participants reported use of the Internet during this process. This study also explored the subsequent effects of media use during the coming-out process on family openness, loneliness, and self-esteem. Results indicate the same participants who are heavy users of the Internet during the coming-out process are significantly less likely to communicate openly with their families later in life. Although heavy media users during the coming-out process may be less open with their families now, the individuals' reports of loneliness and self-esteem were not affected.

In terms of specific predictions, the first hypothesis posited that media would be used more frequently than any face-to-face interpersonal relationships as a source of information during the coming-out process. Participants were asked to identify where they turned to for information about their sexuality. The answers to these open-ended questions fully supported this hypothesis. For example, a 22-year-old gay male participant noted, "I would watch television shows or movies that I rented that had gay characters in them. I would also use the Internet and looked up AOL profiles…to talk to other gay people." Some responses were quite simple and yet media-saturated: "books, the Internet, movies" (24-year-old gay male). Additional participants named specific television shows such as *Will & Grace* or movies like *In & Out*. One 50-year-old gay male participant explained his preference for media outlets over face-to-face interpersonal communication by stating, "Almost all I knew about being gay came from books, movies, plays, and magazines as opposed to other people."

An overwhelming majority of participants noted using the Internet for information during the coming-out process. For example, one 23-year-old gay male participant noted how the Internet offered a level of security that was not found with friends, "I used the Internet to find information about being LGBT. I was not comfortable for many years with myself to talk to my friends." Others noted use of Internet chat, "Originally, I was an AOL member. I searched other people's profiles for 'gay teen' and chatted with a few of them online" (22-year-old gay male). This particular individual goes on to explain how other aspects of the Internet were helpful sources of information, "Otherwise, the majority of my information came from Internet websites and forums devoted to the subject."

A majority of participants who reported the Internet as a research tool were younger in age. This directly supports the third hypothesis that predicted younger participants were more likely to turn to the Internet as a source of information than older participants. Whereas younger participants noted the ease with which they navigated the Internet, older participants painted a different story regarding information seeking. For example, one 21-year-old gay male participant noted, "I think the Internet was a safe and discreet way of finding information and meeting friends."

Older participants presumably came to realize their LGB identity at the same age as most individuals, during adolescence, and therefore did not have the Internet at their discretion during their sexual self-realization. These individuals reported more use of counseling services and peers. One 45-year-old lesbian participant reports, "When I was 16 I called a suicide hotline and told them I thought I was a lesbian. This was 1978 and I was told that I was certainly not – that all teenagers go through a phase." Another 47-year-old gay male participant remembers, "In 1977, I heard from co-workers where the gay people hang out in SF…I started parking my car above The Castro to do my homework and watch the men walk by." Not having access to the anonymity and security of the Internet forced these individuals through a very different process than the younger participants experienced.

The younger portion of the current sample had a wide variety of media available to them during the coming-out stage. They had the ability to pick and choose what media fulfilled particular needs. In following the psychological and practical foundations of the Media Practice Model, the participants of this study were actively engaging in their mediated environments and using their personal values and motivations to pick and choose which media they were going to obtain information from during the coming-out process. The consistently changing landscape of primetime television and the Internet may serve to drive these motivations and values. For example, many participants positively noted the coming out of Ellen DeGeneres as a very large step forward in helping them come to terms with their own sexual identity. Yet after Ellen's public outing, other shows seemed to oversimplify and stereotype the "mesh-and-rollerblades-wearing notion of a gay man," as a 19-year-old gay male participant labeled it. The propensity of traditional screen media to stereotype LGB individuals actually drove many of the participants in this study away from seeking information about LGB lifestyles from television outlets. One 18-year-old gay male participant aptly explains his process of choosing one medium over another by stating, "There wasn't a TV show called, like, 'How To Be Gay 101' but on the Internet, there is endless information for teens just discovering this." This participant exemplifies the assumptions of the Media Practice Model. The participant's lived experiences dictated that television was not affording him the information he needed, so he chose to use another mass medium and had better results for doing so.

The lived experiences of bisexual participants clearly influenced the way they interpreted media messages about sexuality. Bisexual individuals were unable to identify with the gay and lesbian characters that media depicted. Consequently, they reported less positive experiences with mass media. Bisexuals face unique obstacles to social development, as they are seen as out-group members to heterosexuals, lesbians, and gay men (Paul 1984). Given the ambivalent and complex relationship bisexuals have with their lesbian and gay peers (McLean 2008) and the absence of bisexual characters in the media landscape (Raley and Lucas 2006), future research should continue to explore the influence of media on the maintenance of a bisexual identity.

The results of this study show that, overwhelmingly, participants reported the use of the Internet during the pivotal time of sexual self-realization. Whereas their heterosexual counterparts are turning to their peers first and foremost (Di Iorio et al.

1999), participants in the current study turned primarily to the media. The reversal of source importance for LGB individuals brings questions about effects to light. Research has yet to explore possible effects on face-to-face communication or on an individual's self-perception if he or she relies heavily on mediated forms of communication during such a pivotal time of development.

The interactivity of the Internet could explain why participants who were heavier users of mass media during the coming-out process reported less open communication with their families in the present. Relationships thrive in the virtual world of the Internet. Turkle (1995) explains in her ethnographic examination of online identity how real and vivid virtual relationships can become for those parties involved. Two individuals who have only communicated with one another through computer-mediated means are typically very comfortable disclosing personal information, seeking and providing social support for one another, and revealing intimate details about their respective lives. Shaw (1997) claims the Internet is the new gay bar, a communication space where gay relationship formation thrives. Consequently, if fear and intimidation are preventing adolescents from disclosing their alternative sexualities to their families during the coming-out process, the Internet affords them anonymous safe spaces to discuss these issues. The virtual relationships that LGB youth are forming online may be displacing the relationships that LGB adolescents would have formed with their families had they turned to their families for information and support during the coming-out process. In other words, media use may now be their relational proxy. The displacement of family communication with virtual relationships could be a very positive means of managing communication complications for LGB youth attempting to deal with their alternative sexuality, as reports of loneliness and self-esteem were not affected by an individual's reliance on the media.

Loneliness was not significantly related to any other variable in this study. This could be explained by the realness of the virtual relationships that can be created by use of the Internet. As previously discussed, many individuals find online relationships to be as valid and real as their real life relationships (Turkle 1995). If LGB youth are turning to the Internet for information about the coming-out process and, in turn, form relationships with other individuals in the virtual realm, it is not surprising that participants did not report higher levels of loneliness. These individuals are not lonely because they have satisfied the need for relational development through computer-mediated means. Self-esteem was also not significantly related to any other variable in this study. Several studies have found that individuals who participate in self-interest Internet groups improve their self-esteem (Bremer and Rauch 1998; McKenna and Baugh 1998). Being part of an online community of individuals who are like-minded and experiencing the same difficulties may help LGB adolescents come to terms with their sexuality and, in turn, safeguard their self-esteem.

The findings of the current study are fruitful in furthering our understanding of how media are utilized by LGB individuals as an information-seeking tool and how such utilization could affect the user. On a macro scale, the findings are significant when examining the role of virtual communities in society. Putnam (2000) claims that the formation and continual increase in popularity of virtual communities is

harming society. Society is no longer strengthened by the loyalties and comradery that was once experienced because of membership to societal groups. However, there are stigmatized individuals fearful of forming real life groups. The findings from this study show that using the Internet to find information from a community that exists in the virtual world but would be nonexistent in real life could be beneficial.

Although insightful, this study is not without limitations. One possible limitation to the study is the sampling procedure. In order to alleviate any IRB concerns, the individuals who participated in the study had to be openly LGB with no possibility of participation "outing" them in any way. Precautions had to be taken to ensure anonymity of participation. Hence, only individuals who were attending an LGBT advocacy student group were asked to participate, as it was assumed that these individuals were comfortable with others knowing their sexual orientation. Students who participate in these groups are typically individuals who are fighting for fairer treatment and less stigma and are primed to be thinking in such a manner during their regular weekly meeting. Because of this, social desirability must be addressed. Reading questions about their loneliness and self-esteem may trigger participants to answer positively in an attempt to show that they are no different from society's norm. The researchers attempted to minimize the possibility of social desirability by placing the questionnaire online to increase the sample size and bring forth participants who were not in attendance at an LGBT advocacy meeting. A second limitation is the demographic makeup of the participants. A majority of participants reported to be gay males. The findings of this study are presented in a fashion that generalizes the results to lesbian, gay, and bisexual individuals, which may not be valid.

Individuals who identify as transgendered were not included in the current study. As societal views of LGB lifestyles shift with time, the stigma attached to being a gay male seems to becoming less intense than that attached to a transgender individual. The anonymity of the Internet may make it an even more important medium of communication for those who are being left out of the changing tides, such as the transgendered. Future research should examine the relationship between media consumption and the communication patterns of transgendered individuals.

A final limitation is the lack of control for socioeconomical status. The Internet, although becoming quite saturated, is not yet available to the masses. The findings of this study show overwhelming support for the Internet as a tool during the coming-out process. However, individuals who do not have access to the Internet are more than likely left out of a college student sample. Future research should consider examining the information-seeking practices of those individuals who do not have the means to access the Internet. It may also be insightful to examine each sexual orientation as its own respective entity. This study assumes that gay men and lesbians will have the same experience, which is most definitely an assumption whose validity could be further explored by future research.

Including a measure of family satisfaction could also further the findings of this study. In much previous research, family openness is highly correlated with family satisfaction (Caughlin 2003). However, when dealing with such taboo topics as homosexuality, family openness may not have the same effect on family

satisfaction. If LGB adolescents are displacing family communication with computer-mediated communication during the coming-out process and it is having no effect on their self-esteem or reports of loneliness, then LGB individuals may be perfectly satisfied with their family without having to be open about sensitive issues like sexuality. Such a finding could call into question the direct link between family openness and family satisfaction found in previous research.

Future research endeavors should continue to examine the way that socially stigmatized individuals use the Internet and other forms of mass media to construct identity. Although the current study shows the importance of the Internet as a medium for seeking information, the general public continues to receive messages provoking fear of the Internet. Focus on the Family, a non-profit American evangelical organization, offers family cassette tapes explaining the dangers of the Internet. Investigative reporter Kurt Eichenwald of *The New York Times* has reached fame for his investigative reporting on Internet child pornography, making appearances on national talk shows and before the United States Congress to alarm Americans of the harms and pitfalls of the Internet (France 2007). Instilling moral panics into parents could be damaging and problematic for all youth, especially LGB adolescents who may utilize mediated communication as a way to find information needed to develop their sexual identities. We do not know what specific websites, chat domains, or discussion boards LGB adolescents are turning to for information. Researching the web domains most useful to LGB individuals during the coming-out process and then content analyzing the respective web spaces could greatly expand current knowledge on what information is salient for LGB youth during the coming-out process. Future research on the content of mediated communication most used by adolescents could help families better understand the utility of the Internet for adolescent development and calm justifications for parental gatekeeping.

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Appendix

Open-ended questions used to collect essay-style data from participants.

1. Think back to the time in your life when you came to the realization that you were lesbian, gay, bisexual, or transgendered (referred to from here on out as LGBT). Describe your information seeking practices and how you went about dealing with your curiosity. How did you come to the realization you were LGBT? Where did you turn to for information on your sexuality or on LGBT culture? Who did you talk to about being LGBT? In as much detail as possible, explain where you turned to for information on your sexuality. If you are currently coming to this realization, please use the present tense when describing your information seeking experiences.

2. Still thinking about when you realized you were LGBT, please explain the role that the media had in providing you with information. Were there any specific portrayals or characters in the media (on television, in movies, on the internet, in magazines or books) that assisted you in coming to terms with your own sexuality? If so, please explain in details what role the media had in helping you understand your own sexuality.

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