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Students' Self-Reported Preferences
for
Print and Online Newspapers

Kristin A. Williams

Paper Presented in Partial Fulfillment of the Master of Sciences Degree in
Communication & Media Technologies

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Students Self-Reported Preferences for
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This is dedicated to
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Abstract

The present study investigated the self-reported print and online newspaper reading habits of students at Rochester Institute of Technology (RIT). . A survey was distributed to a convenience sampling of 87 students in August 2003. Respondents were asked to self-report their ideas, attitudes and opinions about and towards online and printed news. . The results support previous research, including a 1999 study at RIT as well as those conducted at Pennsylvania State University and by the Pew Research Center, which revealed that college students were not reading newspapers with any regularity, but still thought that keeping up with news was important. A majority of students prefer to receive all types of news online, with the exception of local news. Academic major has some effect on where students go to get their news information. Most students reported that online news was just as credible as online news, and most report that they would not be willing to pay for an online newspaper. Unlike previous research, the present sample of college students appear to be more accepting of the Internet as a news medium for a variety of reasons. The respondents' reasons for acceptance include, but are not limited to, convenience, the number of media options available online (including archiving, streaming videos and images) and the ability to control the interaction with news.

Introduction and Statement of Topic

Before the newspaper, people spread news by word of mouth. The pre-literate society received news from the sources that were available; town criers walked through villages announcing various news events, messengers traveled and exchanged news information about battles, and people relied on the Church for news (Stephens, 1996). The earliest form of a newspaper as we think of it today appeared in 59 BC in Rome, and was called *Acta Diurna*, the Daily Events, which was posted throughout the city; the earliest printed newspaper appeared in Beijing in 748. The next advancement in newspapers came with Guttenburg's invention of the printing press in 1451. The printing press allowed for the mass production of printed information (*A Brief History of Newspapers*, 2003). With the introduction of the printed newspaper, people no longer had to rely solely on the word-of-mouth system, but as the mass production of books, magazines, and newspapers increased, so did the popularity of reading news information.

As newspapers developed during the 16th and 17th centuries, people became more comfortable with the printed word as a source of news information. As a result, newspaper growth was seen all around the world. In 1690 America developed its first newspaper and 100 years later, the first American daily newspaper was published. Newspapers printed not only domestic information, but also highlighted foreign affairs. Literacy rates steadily increased, and more people relied heavily on newspapers for news information (Stephens, 1996). The 1700's were marked by important developments in American newspapers. Literacy continued to increase, an evolving democratic

government rose, and technology improved the printing of newspapers, carrying newspapers into the era of the Penny Press and the invention of the telegraph. The telegraph profoundly impacted news information by transmitting news instantly and over long distances. Technology further impacted how people received news information with the development of radio and television news (*A Brief History of Newspapers*, 2003). By the 1970's newspaper chains were steadily expanding and in 1982, the modern newspaper as we think of it today was introduced when *USA Today* began using color and graphics (Dominick, 2001).

Today, newspapers are perceived by the reading public as a constant, reliable source of news information. And today, newspapers include not only traditional printed newspapers, but with the evolution and popularity of the Internet, electronic, "paperless" newspapers. The Internet has changed the way we think about and behave when acquiring news information. Where the printed newspaper and the television were once the primary sources of news and information, the Internet has slowly begun to usurp the place that older media occupied. The emergence of the Internet as a news medium has made many newspaper organizations uneasy about the future of print. These concerns include how people will retain information, from what sources people will prefer to receive news, and what the differences are between people who prefer to read online and those who prefer to read printed material. The present study investigates some of these topics to highlight the communication issues surrounding these concerns.

Research Questions

Many questions arise in light of the emergence of the Internet and online newspapers. One issue revolves around the differences between print and electronic

information and which medium people use to receive news information. The Pew Research Center has shown that newspaper readership in college-aged students is down from previous years. This leads to questions of how do college students report how they view importance of news on a daily basis, and where they prefer to receive their news. How important do Rochester Institute of Technology (RIT) students say it is to keep up with the news on a daily basis? What is the relationship between the quantity of news that RIT students read daily and their preferences for print or electronic media? What differences in credibility, reliability and accessibility do RIT students report between printed and online newspapers? For RIT students, does the news content area being sought depend upon whether the medium carrying the information is an online newspaper or a printed newspaper? What is the relationship between the type of medium and news content areas (i.e. local, national, entertainment) RIT students report as being important to them? How important do students feel streaming videos and embedded images are when reading an online newspaper? It is important to note that these questions ask students to self-report on their behaviors, habits and opinions when reading online and printed newspapers.

Rationale

With the vast amount of news media available to people today, it is important to look at how people develop relationships with each medium. Why do some people prefer to receive their news information from a printed, traditional newspaper rather than reading the same stories online? I am particularly interested in researching the reasons why people value one medium higher than another.

When technology presents society with a new medium, people evaluate that medium based on how well it replaces the previous media (Papacharissi & Rubin, 2000). When the television became a popular medium, people immediately compared it to the radio: in what ways was it different, better than the radio, and could the television replace the radio as a source of news information? A parallel case can be made today. The Internet has become an arena in which people can access news at anytime and from anyplace. It provides instant information, and poses the question, can this new medium take over as people's preferred source for receiving news information? The Internet has the potential to transform society as a whole, including people's news reading habits and what medium people use to receive news information.

In order to understand why people prefer one medium over another, we must first understand the gratifications derived from using a particular medium. This study seeks to understand some of the reasons why college students might prefer online over print for news information. One theory that is useful in determining this is the Uses and Gratifications Theory. It explores how people use media and the gratifications that are derived (Blumer & Katz, 1974). If the reasons for selecting one medium over another are clearly understood, improvements can be made in both online and printed newspapers.

The project, therefore, is not only of a particular interest to me, but it also has social as well as theoretical importance. The results of the current project will add to the previous research on newspaper reading habits, and makes a contribution to the Uses and Gratifications Theory.

Review of Literature

The Shift From Print to Online: An Overview

The growth of the Internet changed the way that people gather and think about information such as news, entertainment, and education resources. Tom Kemnitz, president of Royal Fireworks Press, "agrees that technology is changing the way information reaches the masses" cited in (Figliola, 1999, par. 3). This "information revolution" is changing the way that people think about text; electronic publishing is wiping out traditional forms of paper and altering the way in which publishers think about the printing process (Schultz, 1996). Some feel that putting information in an electronic format will ensure its longevity; 10 years ago, the New York Public Library estimated that it had some two million books that were too delicate to handle (Rutherford, 1999). With the emergence of electronic data-basing, many feel that preservation would not be an issue. Alex Garden (2000), director of NetInsites Ltd believes that, "the days of paper-based magazines and newspapers dominating the publishing world are numbered" (p.14). Garden believes that it makes much more sense to send information electronically in bits and bytes than to physically print information.

Any type of entertainment, news, and e-books can be downloaded onto an e-book reader, but the American public has not yet fully accepted electronic publishing. Publishers are still trying to figure out what people want from electronic text, and most of the growth has been seen in textbooks and reference material (Kohut, 2002). Part of the public's reluctance to embrace digital books and newspapers is due in part to the history of the printed text. The public is aware of the editorial and institutional teams behind a

printed text. We do not yet have the same confidence in the digital medium as with the printed text, yet the digital medium is still growing in popularity. Kohut (2002) states that, "This is not just a change in reading modes; it is at the same time a major alteration of our cognitive environment" (p. 263). With the growth of reliance on the digital medium, language and thought processes must and will change because the Internet introduces its own communication habits, including language and interaction with the Internet. Drucker (1998) states that, "The next information revolution asks, what is the meaning of information, and what is its purpose?" (p. 46). Communication with and on the Internet is different from any previous medium; interaction between text and the individual has to change with the digital medium (Tosta, 1995).

Newspaper Growth

More people are turning to the Internet, and many researchers have found that online audiences go to the Internet to find more information about general news interests (Kohut, 2002).

Numerous recent polls have shown that the public's appetite for Internet news and information is growing exponentially. As the year ends, half of the American public has access to the Internet, up from about 40% a year ago and 23% just three years ago. Almost two in three of those people (or 30% of the public at large) say they go online for news at least once a week, with 12% saying they read the news online every day. Only 6% reported doing so in April 1998 (Kohut, 2002, p. 68).

Internet news sites have increased in popularity because people are able to customize (self-select) the news that they receive. Kohut (2002) notes that although the Internet is growing as a source of news information, traditional news sources remain popular. Going to the Internet for news is not like turning on a television set; the Internet is harder to use and requires more knowledge and practice, and therefore online news habits are harder to form, but nonetheless are growing rapidly.

Newspapers were one of the first media to put information on the Web. Shyman S. Sundar's 1999 study explored people's perceptions of print versus online news. His research question asked what requirements people put on viewing both online and printed news material. The study was conducted in two stages: Participants rated print news stories and, secondly, rated online news stories. The results showed that "the more disturbing content of a news story, the more newsworthy it is in print medium; in the online medium; however, the disturbing nature of the story not only contributes to its newsworthiness but also detracts from its credibility" (Sundar, 1999, p. 378). The study found that people were more likely to believe a news story in print rather than online if the news story was disturbing or in some way perceived to have even a minor element of untruth to it.

Web Page design and graphic use in print and online newspapers have been used to measure people's perceptions of print and online news. Xigen Li (1998) quoted George Gilder on his opinion about the relationship between computers and newspapers:

The computer is a perfect complement to the newspaper...[It] enables the existing news industry to deliver its product in real time. It hugely increases the quantity of information that can be made available.

It opens the way to upgrading the news with full screen photography and videos, while hugely enhancing the richness and timelessness of the news. The computer empowers readers to use the "paper" in the same way they do today—to browse and select stories and advertisements at their time and pace (1998, p. 355).

Li (1998) analyzed 10 days of Web pages of *The New York Times*, the *Washington Post*, and *USA Today*, in October, 1996. The study looked at graphic usage on home pages (or front pages) and major news stories. The results showed that while all three newspapers limited the use of large graphics and models, each had its own approach to using the Web. Li (1998) noted that the *Times* used a simple design, making it easy for people to print news stories. The *Post* used more hyperlinks on the home page, letting users easily see their options when opening the page, while *USA Today* appeared to have a much more graphical front page.

Other results in Li's study (1998) showed that the Web gave more textual information than graphical; eye-catching graphics were more likely to be found on home pages rather than in news articles. In addition, Internet newspapers were less likely to use large pictures and graphs than printed papers, and the links provided a much more detailed history than printed newspapers. Schultz (1996) also noted that online newspapers created a sense of interconnectedness.

Steve Outing (1998), a freelance journalist and consultant, surveyed Internet users and found that 16% of regular Internet users reported not reading the newspaper frequently, and 35% of regular Internet users watched less television than non-users. Since 1995, the number of people who read news online has increased steadily. Stempel,

Hargrove and Bernt (2000) suggest three factors for the growth of online news reading: the growth of importance of the Internet in people's daily lives, the number of people who read printed newspapers and watch television for the news was decreasing, and the credibility of news media was shown to be on the decline. The authors (2000) found that people use newspapers and television for different kinds of news. Their research revealed that the Internet was used primarily to learn more about a specific subject matter, whereas newspapers and television were used for general news information (a finding that contradicted other studies). The researchers found that the Internet as a primary source of news information had not grown with the same intensity as television did in the 1950's.

Stempel et al (2000) conducted a national survey for the Scripps Howard News Service and the E.W. Scripps School of Journalism. Daily media exposure was measured by asking respondents to report how many days in the week they read, watched or listened to some kind of news program. A variety of news sources were included: television viewing, the Internet, daily newspapers and magazines. Adult Internet usage increased, while the other media usage declined, more than one third of the participants in the survey reported that they were regular users of the Internet. In addition, the researchers found that online service rose from 3.4% in 1995 to 19.3% in 1999. They concluded that the Internet was "taking people away from other media" (p. 73). Other findings showed that people who were users of the Internet were more likely to read newspapers on a daily basis, and that Internet usage and newspaper reading were positively correlated. As expected, older people were more likely than younger people to watch television news programs and read the newspaper, while the majority of people who used online and Internet services were under the age of 35. The authors reported that

many television programs were starting to refer people to a Web site, effectively encouraging people to use the Internet as a supplement to traditional media.

Flanagin and Metzger's (2000) study measured people's perceptions of credibility regarding online information. Participants who were mostly regular Internet users and well educated were surveyed. Respondents were questioned about Internet news accuracy, trustworthiness, bias, and completeness of information. The questionnaire asked about news and current events, entertainment information, commercial or product information, and reference or factual information. Printed newspapers had the highest for credibility ratings. Results showed that reference, news and entertainment held the most credibility on the Internet, while in printed newspapers, news and reference were considered more credible than entertainment news. Respondents reported that only "rarely" or "occasionally" did they check the source of online information; the study revealed that few people were actually checking where Web information came from and that they hardly ever cross-referenced material. Less experienced users of the Internet were even less likely to verify information. If any information was checked, it was mainly if the source was being used as reference material.

Before the Internet, people relied on radio, broadcast television and printed newspapers for their news information. The Internet has changed the way that people think about getting news. In part, this was due to the fact that the World Wide Web is a culmination of previously existing news sources. Online news allowed people a wider selection of news sources. For those who are still wary of the Internet as a source of news, online news can be used to supplement but not replace traditional news media. Although people have not fully accepted the Internet as the primarily source of news

information, readership of online news is increasing dramatically, securing Internet news as a valid medium for news information.

Pew Research

Between 1998 and 2000, the Pew Research Center conducted surveys to find how Americans were using various news sources available to them (*Internet News Takes Off*, 1998). In 1998, the Research Center surveyed 3,002 adults by phone and asked about their news habits. The number of people who reported using the Internet as a news source was growing exponentially: the number of people getting news from the Internet tripled between 1996-1998 (*Internet News Takes Off*, 1998). Young people were the most accepting of Internet news; 38% of people under the age of 30 reported going online the previous day. The study found that of those people who went online for their news, science, health, finance and technology were among the top choices. In 1998, the Center reported that printed newspaper readership appeared to be stable, and noted that 68% of adults read a printed daily newspaper regularly (*Internet News Takes Off*, 1998). The research showed that there was a large difference between people under the age of 30 who read a printed newspaper and people 50 years and older who read a newspaper; only 29% of people under the age of 30 reported that they read a daily, printed newspaper while 69% of people 50 and older reported reading a daily newspaper. The Center also found that, "only 33% of Americans 18-29 say they enjoy keeping up with the news a lot..." (*Internet News Takes Off*, 1998, p. 1). Research about news habits revealed that in 1998, the average American reported spending more than one hour daily on the news: "Overwhelmingly, Americans place a premium on accuracy and timeliness and, to a somewhat lesser degree, information that is helpful and hard to find" (*Internet News*

Takes Off, 1998, p.17). For the people who reported reading the news, 90% said that it was important the news was accurate, 88% said it was important that the news was timely and up-to-date, and 78% wanted the news to provide information that was not available elsewhere.

Another report by the Pew Research Center (1999) looked more closely at the Internet news audience. The Center again conducted a telephone survey, this time of 3,184 adults (*Internet News Audience Goes Ordinary*, 1999). Results showed that 41% of adults were using the Internet, with weather being the most popular news content area. This varied from the previous year when science, health, finance and technology were the leading news content areas accessed when going online. It was noted that the general subject areas online were growing, including weather and entertainment news, but not more specified information, such as politics and international news. In 1999, the Research Center results showed that Internet news produced mixed results in relation to other news sources such as printed newspapers, magazines, television and radio, as 75% reported receiving more of their news from traditional media, with only 11% reported using print and broadcast outlets less often (*The Internet New Audience Goes Ordinary*, 1999, p.2). Furthermore, it appeared that people were going online for information initially featured in television news reports; these included such news content areas as stock quotes, weather, movies and other general information. In addition, it was reported that, "...41% of those who go online say they turn to the Internet to get more information on stories first seen in the traditional media. Relatively few (21%) said they read stories online instead of getting them in newspapers or on TV" (*The Internet New Audience*

Goes Ordinary, 1999, p. 3). The Pew Center could not conclusively demonstrate whether or not the Internet was drawing people away from other traditional news sources.

Further results showed that people reported going online for news for three main reasons: to retrieve information unavailable anywhere else, for convenience, and because online news sites provided an arena in which it was possible to search particular areas of news interest. Findings showed that for the majority of people, going online for news was used as a supplement to traditional news outlets and not necessarily as a replacement. Furthermore, the people who used the Internet for news often went to the Web sites of traditional news outlets and bookmarked the site, making it a place that they regularly visited for news information. Internet users were also found to be more likely to read printed newspapers, listen to radio broadcast news, and watch television news more regularly. For those people who both went online and turned to traditional outlets for their news, the majority appeared to have a vested interest in political news as compared to non-users of the Internet. The Center also reported that in 1999, those people who sought news online were more likely to read a printed daily newspaper than the offline public; simply put, regular Internet users had a tendency to be more interested in the news than non-users of the Internet.

Other studies pointed to the fact that people who view online news sources find Internet sites no more or less accurate than the information found in traditional news outlets. People also reported they received customized news reports and had news information sent to their e-mail accounts. Of those people who did turn to the Internet for news in 1999, the Center found that 37% were considered, "heavy online news consumers"- meaning that they went online for news at least once a week (*The Internet*

News Audience Goes Ordinary, 1999, p. 6). Those people who were heavy viewers were more likely men than women (64% v. 36%), and that the people who went online were generally better educated and included those who had previous experience with the Internet.

The research did show that for some people who used the Internet as a source of news information, news Web sites did cause a decline in other more traditional news outlets (*The Internet News Audience Goes Ordinary*, 1999). One fifth of the people reported reading news stories online instead of using a printed newspaper or watching television. Sixteen percent said that they received more of their news information from the Internet than other outlets, and 11% reported that since they started using the Internet for news, the use of other news outlets had decreased. In 1999, the most compelling reason for turning to the Internet for news was reported as convenience.

When asked what other factors prompted use of the Internet for news, people said that customized news was a determinant (*Internet News Audience Goes Ordinary*, 1999). The study found that people reported they wanted specific information online, not just general news--a change from previous years. In response, some news organizations began to personalize news sites by allowing people to create and decide the news information that they received. The Center reported that in 1999, one in five Internet users had news stories emailed to them, and an equal number had customized sites that were updated daily. The majority of people who reported having customized news were those who had been using the Internet for a year or more. In addition, 49% of those people who used the Internet as a news source believed that online news was more accurate than news found in other outlets, while only 28% of non-users agreed.

In 2000, the Pew Research once again reported the attitudes, beliefs and habits of people regarding both traditional news outlets and the Internet. "Internet news has not only arrived, it is attracting key segments of the national audience. At the same time, growing numbers of Americans are losing the news habit. Fewer people say they enjoy following the news..." (*Internet Sapping Broadcast News Audience*, 2000, p.1). While the number of people turning to the Internet for news increased, the popularity of other news sources had been decreasing, a contrasting pattern from previous studies. Like the previous studies, younger, better-educated people appeared to be using the Internet and the people who did go online for their news reported watching less network television news. The Pew Research Center stressed that in 2000, this was a possibility not because the Internet was replacing other news media, but that overall interest in keeping up with the news was on a decline. Only 45% of people reported that keeping up with the news was enjoyable, and just 48% said that they kept up with the national news on a regular basis. Again, the generation gap between those who kept with the news and those who reportedly did not was noted: 31% of young adults reported that they enjoyed keeping up with the news regularly, while 57% of those aged 50 and older said that they enjoyed keeping up with the news. The Internet was attracting younger people who only had a "marginal" interest in news and who liked having a wide variety of information sources, but the Center also reported that the Internet attracted those who only required a small variety of information sources. Results showed that customized news information was up from previous years, as 58% of people reported having personalized news information online. Like the year before, more people reported that online news sources, such as ABC or CNN news, were just as credible as their traditional outlets. People said that they

would believe information that came from a well-known source, but not necessarily news that appeared on sites like YAHOO!, Netscape, and American Online News Channel (*Internet Sapping Broadcast News Audience*, 2000). The results showed that older people, including those aged 50 and older, were much more likely than their younger counterparts to say that they watched television news or read a newspaper daily. People under the age of 30 were more likely to report going online regularly. Those who admitted that reading news was not important said that they would follow the news if they had more time. As in previous studies, it was also found that men and women had different news interests; for men, technology was an attraction, while women sought news about science and health (*Internet Sapping Broadcast News Audience*, 2000). Although overall readership of news was down from previous years, people continued to place a high priority on the news. Seventy three percent reported that they thought keeping up with the news was still important, and 62% appreciated having a variety of news sources to choose from.

The Internet has arrived as a news source and has changed the way in which people think about getting various kinds of news information. New technologies have made people aware of varying opportunities in which news information can be accessed. As more people go online, the Pew Research Center reported that the World Wide Web would start to not only supplement, but could potentially begin to replace other, more traditional new outlets of the past. One in five Internet users reported getting news online everyday and most reported visiting a site specifically to see what was new in the news. Research shows that for those people who are moving away from watching nightly

network news, many were turning towards online news (*Internet Sapping Broadcast News Audience*, 2000).

College Students at the Pennsylvania State Study

Many studies have shown that college students rarely read newspapers. The studies reported below illustrate the need for, and the consequences, of integrating newspapers into students' daily lives: "The average scene on TV changes every three seconds. These people like it quick, they like it flashy, they tend towards a newspaper with quick cuts. They don't want to hunt for information. And they like to be entertained while they are informed" (Hartman, 1999, p. 50).

Koch's (1994) study investigated how the *New York Times* affected the amount of political information that undergraduate students were exposed to, and how that information affected the behaviors of those students. The sample was divided into two sections: The experimental class was required to read the *New York Times* for one semester, while the control group did not have to read any type of news. Both groups were given pretests and posttests to measure the amount of influence reading the newspaper had. At the completion of the study the experimental group was more critical of news than the control group. Koch (1994) concluded that students who are exposed to newspapers on a daily basis benefit from reading the newspaper.

Although many people are going online to read papers, and newspapers are beneficial for college students, many students are still not reading. Bressers & Bergen, (2002) note that, "Where newspapers were once threatened by the explosion of television screen, today they face newer obstacles: the Internet and a general lack of interest among the country's youth" (p. 32). In response, Pennsylvania State University's president

Graham Spanier provided three newspapers, at a slight increase in student fees, to students who lived in the dormitories. Hartman (1999) quotes Spanier as saying, "It is critical that college students have an understanding of the world, both local and international, where they will soon go out to live, have jobs and raise families. Reading a daily newspaper is a great way to gain a better understanding of that world" (p. 50). Students were given the *New York Times*, *USA Today*, and *Centre Daily Times*, a local paper. Before the program began, pretests showed that 15% of students had a habit of reading one of the three papers on a daily basis. When the program was completed, a follow-up survey was distributed and results showed that 73% of the students reported reading the paper on a daily basis. The post-survey also revealed that college students actually liked reading papers, "In substantial numbers, students told researchers that they are getting more out of their college education because they are reading papers, that newspaper reading prepares them better for classroom discussion, and that they understand and can discuss current events better than ever" (Fitzgerald, 1999, p. 20). After completing the study, researchers also found that easy accessibility to newspapers boosted the number of student readers. In 1999, 68% of the students at Pennsylvania State said they preferred to receive the printed form of a newspaper, rather than read it online. Lou Heldman, publisher of the *Centre Daily Times*, believes that making newspapers available to college students would increase the likelihood that students would read newspapers after graduating, cited in (Hartman, 1999). It was speculated that if students were provided with the printed version of a newspaper, after graduation, they would be more likely to read the news on a daily basis.

College Students at RIT

In 1999, RIT, with the Quality Data Systems Company, distributed a survey to undergraduate college students. The survey asked students not only how they felt about reading news, but also about their news reading habits. Of the 142 students who participated, 80% were freshman (*RIT Newspaper Readership Survey*, 1999). Only a minority of students, 5%, reported that they were not reading a newspaper at all, and the news content areas read, regardless of the medium, included national news, international news, local news, sports news and entertainment news. However, of those students who reported reading a newspaper on a regular basis, over half believed that their amount of reading had decreased since coming to college. Nearly two thirds of students reported, "seldom" to "never" reading a newspaper on the Internet. Students who read newspapers reported reading for a variety of reasons. Among the leading reasons for reading printed newspapers were increased knowledge of local events, increased knowledge of national/international news, and enriched knowledge of current events and issues (*RIT Newspaper Readership Survey*, 1999). Furthermore, a majority of students said that newspapers were either, "very important" or "important" to their overall education, and 90% believed that the availability of newspapers in residence halls would increase their newspaper reading habits. Overall, RIT students said that reading a newspaper was important for both personal knowledge and for educational purposes, but in 1999, they had not readily accepted Internet newspapers as a primary source of news information.

About 140 colleges in the United States and Canada are experimenting with providing newspapers to college students. Pennsylvania State gained publicity because it surveyed students about their reading habits and preferences both before and after providing newspapers to students. Reisberg (1999) claimed that students need to get into

the habit of reading newspapers in the formative stages of their lives, otherwise it would never occur later in life. In short, it has been argued that providing a printed newspaper for college students will increase the likelihood that students will read later in life.

Uses and Gratifications Theory

The Uses and Gratifications Theory, according to Perse and Dunn (1998), states that, "in order to understand how media affect people, we must first understand how people use media" (p. 436). This theory asserts that people are active, goal-oriented participants when using a particular medium,. Blumer & Katz (1974) emphasized that with this theory, each person can use the same medium in a slightly different way. People's expected gratifications for using a medium are based on what they believe a particular medium can do for them. This theory illustrates the importance of understanding how people interact with media, and the effects of developing a relationship with the various news outlets available to people today. Uses and Gratifications also seeks to explain and understand the consequential gratifications that arise from using any type of media.

Advances in the Electronic Age

Internet-based educational products are being driven by the technological improvements that the Internet can provide. An estimated 95% of schools are hooked up to the Internet, and as a result, there is significant testing measuring online reading ability. The Internet can be used as a source to receive and view news stories, both locally and internationally. The goal is that, from kindergarten on, children will use the Internet as a way of further pursuing interest in news, increasing overall education (*Education publishers expand*, 2001). This is also another attempt to get young people to read

newspapers on a regular basis. Khermouch & Weber (2002) note that online newspapers can be beneficial in education because they offer moving graphics and links that can provide further detail about a story. Maps, pictures and other sources become available to students that in the past could not always be found in printed texts. Reading the newspaper is now made easier because many sites allow viewing through a portable data file (PDF), making the news downloadable on e-book readers (Noack, 2001). Poftak (2001) notes that in addition to newspapers, textbooks will also become an electronic source. According to Forrester Research, by 2005, 25% of all textbooks will be available electronically (*Education publishers expand*, 2001).

Today, the Internet is a medium used for a variety of reasons, including entertainment, news and communication. The Internet has effected the acquisition of information; where people once had to listen to the radio, watch television or read a printed newspaper for news information, the Internet encompasses all aspects of previous, traditional media. Traditional news outlets encourage the use of the Internet as a source of information, and younger people, who are more accepting of new media, are using the Internet more everyday. Publishers of newspapers are utilizing the Web by offering customized news sources, developing news information that can be delivered to e-mail accounts, and employing a variety of techniques including video and audio attachments to newspaper sites. The idea is that young adults will use the Internet as a replacement to a printed newspaper or television broadcast allowing Internet to become the primary medium for news. In 2001, the Pew Research Center reported that online newspaper readership was on the rise, and that if that trend continued, the Internet would become the first choice of all people as the source for news information.

Method

Sources of Data and Procedures for Collecting Data

In order to better understand what college students at RIT think about both printed and online newspapers, a survey was created and distributed. A convenience sample of 87 undergraduate students at RIT was selected; 17% were fifth year undergraduates, 56% were seniors, 24% were juniors, 2% were sophomores and no freshman participated. Questionnaires were administered to students from various disciplines enrolled in one or more liberal arts classes in the Summer 2003 Quarter. Seven classes were selected to participate. Students came from the Colleges of Applied Science Technology, Business, Engineering, Imaging Arts and Sciences, Information Sciences and from the College of Liberal Arts. Each student was either given a short presentation about the survey in person, or received a cover letter explaining the project and survey (see Appendix A).

Pretests were administered to two sets of graduate students to ensure clarity and unbiased survey questions. The statements and questions in the survey pertained only to each student's attitudes, opinions and beliefs. To encourage open and unreserved self-reported data, the surveys were anonymous. Students were invited to receive a summary of results by entering an e-mail address.

The Survey Instrument

The survey instrument (*see Appendix A*) asked students to report on their beliefs, ideas and opinions about both printed and online newspapers. The survey was comprised of five sections. Students responded using six answering options: an open-ended response, an eight-point response scale ranging from strongly agree to strongly disagree,

simple yes or no responses, multiple answer choices, a ranking procedure that asked participants to rate first, second and third most important news content areas, and a "check-list." The first section asked general questions about newspaper reading habits, including daily reading conduct. The second section focused on comparing printed newspapers with online newspapers, while the third concentrated specifically on online newspapers. Questions about interaction with the Internet and newspapers constituted section four. The final section sought demographic information and contained an area in which students were invited to write their thoughts about the survey subject. The results are presented below, and whenever a test of comparison is made, a Mann-Whitney Test was performed.

Analysis and Summary of Data

Research Question 1

The first research question asked students to report how important it is to keep up with the news on a daily basis. Using a scale ranging from strongly agree (coded as a 1) to strongly disagree (coded as an 8), the median response was 3 (somewhat agree). When asked about the importance of national news on a daily basis, the median was also 3. But when asked about the importance of local news, the median was 4 (more agree than disagree). Comparing the median response for national news to the median response for local news, the conclusion is that national news is significantly more important than local news ($W = 6224.5$, $p = .0000$).

Over half of the participants also reported having a favorite Web site from which they regularly receive their news. Table 1 provides a more detailed summary of the percentage responses for national and local news, and supports the conclusion that

students believe that keeping up with the national news on a daily basis is more important than keeping up with the local news on a daily basis.

Table 1

Importance of national vs. the local news by percent (n = 87)

| Response choices | National | Local |
|--------------------------|----------|-------|
| Strongly Agree | 16 | 2 |
| Agree | 26 | 10 |
| Somewhat Agree | 28 | 32 |
| More Agree than Disagree | 7 | 20 |
| More Disagree than Agree | 13 | 10 |
| Somewhat Disagree | 5 | 11 |
| Disagree | 6 | 13 |
| Strongly Disagree | 0 | 1 |

Research Question 2

The second research question involved determining whether there is any relationship between the quantity of news that students read daily and their preferences for print or electronic media. Of the respondents, 31% reported that they do not read an online newspaper at all, and 62% reported not reading a printed newspaper at all. Of those who read either an online or printed newspaper, 41% said that they read an online newspaper 1-3 times per week, but less than 16% said that they read an online newspaper daily or more than twice daily. Only 1% reported that they read a printed newspaper either daily or more than twice daily. There is a significant difference in the frequency of reading: students read online newspapers more often than they read printed newspapers ($W = 9015.5$, $p = .0000$).

Overall, students receive their news information more often from an online source than a printed newspaper. A large majority of participants reported they are, in fact, reading newspapers, mostly online. This, however, is overshadowed by the fact that students may be reading newspapers, but not on a regular basis. Although students feel that keeping up with the news on a daily basis is important, they are not reading either an online or a printed newspaper with any regularity. Furthermore, most students reported not having a subscription to either an online or printed newspaper. Less than 24% of students reported having a subscription to either an online or a printed newspaper and only 20% reported having a subscription to both an online and a printed newspaper. Those students who said they have subscriptions to online or printed newspapers are also the ones who reported reading newspapers 1-3 times per week or more.

There was no significant difference between the number of respondents with subscriptions to online newspapers as compared to those who subscribe to printed newspapers ($W = 7525.5$, $p = .7946$). For those students who said they had subscriptions, *The New York Times* was the primary source of subscriptions for online newspapers, and for printed sources, the local Rochester, New York paper, *The Democrat and Chronicle* was the leading source of subscriptions.

Although the majority of students do not have subscriptions to online or printed newspapers, over three fifths still thought that keeping up with the news on a daily basis was important. This could suggest that students are going somewhere else (television, radio, magazines, etc.) for their news information, are seeking their news from an online newspaper that does not require a subscription, or are getting a printed newspaper from a news stand.

Research Question 3

Research question 3 investigated differences in credibility, reliability, and accessibility between printed and online newspapers. Overall, students rated online newspapers to be just as trustworthy and reliable as printed newspapers. Seventy one percent of students agreed that reading an online newspaper was different from reading a printed newspaper, and over half of the students reported that reading a printed newspaper was easier than reading an online newspaper. But, over 70% of students did not believe that printed newspapers had more stories than online newspapers. In addition, 79% did not think that the printed version of a newspaper like *The New York Times* was more credible than its online counterpart. Over half of the participants did not think that printed newspapers were more comprehensive than online newspapers and a similar

percentage did not believe that online newspapers had more advertisements than printed newspapers.

When asked if printed newspapers are easier to read than online newspapers, the median response was 3 (somewhat agree). But, even though most students believed that printed newspapers were easier to read than online newspapers, when given the choice of which medium to use, students only preferred to use a printed newspaper for local news (*see Table 2*).

Table 2

Preferences for online versus printed newspapers by percent.

| News Content Areas | Online | Printed |
|---------------------------|--------|---------|
| Local | 26 | 74 |
| Business/Financial | 74 | 26 |
| Relationship/Family | 52 | 48 |
| Entertainment | 78 | 22 |
| National | 67 | 33 |
| Lifestyles/Fashion/Health | 72 | 28 |
| Sports | 68 | 32 |
| International | 68 | 31 |
| Weather | 78 | 22 |
| Music | 81 | 19 |
| Movie | 71 | 29 |

Research Question 4

Research question 4 investigated whether the news content area being sought depends upon whether the medium carrying the information is an online newspaper or a printed newspaper. Students were asked to report which medium (online or printed) they prefer to get a variety of news content areas from. Table 3 reports the sample proportion for each news content area and the p value associated with a one binomial proportion test of significance. With the exception of the relationship/family news content area, each sample proportion is significantly different at the .05 level. Moreover, the results show a significant preference for the online medium, except for local news.

Table 3

Proportion who prefer to use a printed newspaper by news content areas

| News Content Area | Proportion | <i>p value</i> |
|---------------------------|------------|----------------|
| Local | .74 | 0.000 |
| Business/Financial | .26 | 0.000 |
| Relationship/Family | .48 | 0.747 |
| Entertainment | .22 | 0.000 |
| National | .33 | 0.002 |
| Lifestyles/Fashion/Health | .28 | 0.000 |
| Sports | .32 | 0.001 |
| International | .31 | 0.001 |
| Weather | .22 | 0.000 |
| Music | .19 | 0.000 |
| Movie | .29 | 0.000 |

When selecting where to get news information from, a student's major has some effect, and people who are enrolled in the same Colleges at RIT tend to get their news information from the same sources. When broken down by major, students from the Colleges of Business, Engineering, Imaging Arts and Sciences, and Information Sciences prefer to receive all of their news information online. In contrast, students from the Colleges of Applied Science Technology and Liberal Arts report that they prefer to receive some news content areas, such as international and national news, from a printed source. This could suggest that students from different majors, or in this case Colleges, view news sources differently.

Research Question 5

The research question considered in this section involves the relationship between the type of medium and news content areas students report as being important to them. Respondents were asked to choose their first, second and third most important news content areas when reading either a printed or online newspaper. In addition, respondents were also asked to choose their first, second and third most important news content areas when reading a printed newspaper and when reading an online newspaper. When reading either a printed or online newspaper, a printed newspaper, or an online newspaper, the response was the same. Students overwhelmingly reported that their first and second choices were national, international or local news, while the third most important news content areas were either business/financial or entertainment (see Table 4). Students who reported the most important news content areas as either national news, local news, or international news in every case chose the same news content areas for their second most important choice. Those who reported national news as being most important selected

international or local news as second most important, those who chose local news as most important selected national news as second most important, and those who picked international as most important chose national news as their second most important news content area.

Table 4

Percent of most important news content areas for general news, printed newspapers and online newspapers (n = 87)

| News | General Printed | | Online |
|-----------------------|-----------------|----|--------|
| Most Important | | | |
| Local | 20 | 22 | 14 |
| National | 38 | 34 | 38 |
| International | 14 | 12 | 17 |
| Second Most Important | | | |
| Local | 21 | 18 | 16 |
| National | 24 | 31 | 26 |
| International | 18 | 13 | 21 |
| Third Most Important | | | |
| Local | 15 | 16 | 13 |
| International | 16 | 17 | 17 |
| Business/Financial | 24 | 21 | 28 |
| Entertainment | 14 | 14 | 17 |

Regardless of the medium (either online or printed), students overwhelmingly reported the same news content areas as being important to them. Despite whether the medium was online or printed, and regardless of order of importance, students continually selected the same news content areas as being important every time.

Research Question 6

Research question 6 involves determining how important students think streaming videos and embedded images are when reading online newspapers. Students were asked to indicate the importance of having images accompany news stories. The median response was 3 (somewhat agree). The median score for the importance that there is an optional video attachment was 4 (more agree than disagree). Although both images and video attachments are important, there is significant evidence that embedded images are more important than video attachments ($W = 5977.0, p = .0000$).

Students strongly disagree that people should pay for the news that they read online (median response of 7). In fact, when asked if they would pay a fee to subscribe to an online newspaper, the median response was 7 (disagree). When asked to indicate whether "pop-up" advertisements decrease the credibility of a news site, the median response was 3 (somewhat agree). Students are not willing to pay for news online, and generally believe that "pop-up" advertisements decrease the credibility of a news site.

Students may prefer an online newspaper because online sites provide more options than printed newspapers. These include not only embedded images, but also video attachments and the ability to archive the history of a story. In response to the survey's open-ended question, students reported their reasons for going to an online

newspaper or a printed newspaper. A number of participants preferred printed newspapers stating that, "there is something unique about holding a paper in your hand- you can take it anywhere with you," and that, "Printed newspapers are more trustworthy than online news." Students who preferred printed newspapers thought that printed news was more reliable and credible than its online counterpart.

One student who preferred online newspapers stated that, "The online version has better navigation tools for what's important to me. It also has related stories attached to the articles as well." Another wrote that, "Online can be more in depth and have more articles and pictures." One participant said, "Online is better because it's faster, more organized, and there is more media available." Other comments included: "With online news, you can read about a subject and get more than one point of view by going to various sites," and "I read online newspapers from other countries such as Japan and England. It could potentially be very expensive if I were to buy the printed version here in the U.S." Overall, students prefer using the Internet as a source of news because it provides information that is up-to-date, easy to access and because the Internet allows the ability to look at a variety of news subjects from anyplace at any time.

Discussion

The results of this project can be compared to the previous research concerning both printed and online newspaper reading habits. The current project adds to previous research by looking at what college students say is important to them when reading newspapers, and can be compared to similar studies such as the Pennsylvania State Study, the RIT study and three studies done by the Pew Research Center. By looking at

the Uses and Gratifications Theory, it is also possible understand why students pick one medium over another.

Although the samples differ, many of the results of the present research contradicted the Pew Research. In 1998, the Center reported that printed newspaper readership appeared to be stable and that 68% of people were reading a printed daily newspaper regularly. The results of the present study found that college students are not reading printed newspapers on a regular basis and that most students do not have a subscription to either a printed or an online newspaper. The students in this project reported that they are turning to the Internet for their news information and, in fact, would rather read the news online rather than from a printed newspaper. In 1999, the Center also reported that their participants did not report going online for specific news content areas, such as politics or international news, but the biggest attractions were general information such as weather and music news. Kohut (2002) reported that online audiences went online for general news interests. This is in contrast to the current project which showed that college students are going online for very specific news content areas, including, international, national, business/financial news and entertainment news.

Although some of the results of this project are inconsistent with what the Pew Research Center found, other results were similar. The Center reported that people use the Internet for news because online sites have the ability to offer information that cannot be found anywhere else. This is in part due to convenience and because online news provides a means to search archives. This was also the case with the students at RIT. One student wrote that, "Online newspapers are quick to scan and search, are easier to archive and physically easier to jump from section to section." The majority of students agreed

that reading the news online was more convenient. The results the present research also support the Center's finding that people who read both the printed newspaper and went online for news were also the ones who reported reading the news on a regular basis.

In 2000, the Pew center found that growing numbers of people were losing the news habit, and this is supported by reviewing the data analysis from this project. The college students who participated in the current study report that although they may think that keeping up with the news is important, many are not reading a printed or an online newspaper with any regularity. This also supports the Pew findings that although people are not reading, they still place a high importance on keeping up with the news. Less than half of the participants in the Pew survey, however, reported that they thought it was important to keep up with the national news on a daily basis; the current study shows a majority of students think that important to keep up with the national news on a daily basis.

The Pennsylvania State study claimed that college newspaper readership is down. This was also the case in the current study, which showed that most students do not read the news regularly, and that less than a quarter of students have subscriptions to both an online and a printed newspaper. The Pennsylvania State students also reported that the majority of people would prefer to read the printed newspaper if it was available to them. Kohut (2002) also reported that traditional news sources were still a large consumer item. The RIT students reported they would much rather read all types of news online with the exception of local news. This suggests that students are more accepting of online news for a variety of content reasons, and supports that claim that younger people are the ones that are most accepting of online news sources. Most students said that they preferred

online news because it was fast, up-to-date, convenient and because one can archive and access the information from almost anywhere. As the online technology improves, online news will become more accepted as a news source.

In 1999, RIT distributed a survey and found that, overall, only 5% of students reported reading a newspaper at all and that 60%, "seldom" to "never" read an online newspaper. These students felt that reading the news was important, but had not accepted online news as a source of news information. In 2003, more RIT students reported reading a newspaper and students have become more accepting of online news as a source of information. In almost every case, students in the current project reported that they would, in fact, prefer an online newspaper to a printed one. One similarity between the 1999 survey and the 2003 project revealed that students at RIT are still interested in reading the same things, including international news, local news, national and business/financial news and entertainment information. Overall, students say that they are reading the same news categories because the news menu has stayed the same, but in 2003 have become much more accepting of a new medium in which to view this news information.

The research in the current study also found that students overwhelmingly reported that online news was just as credible and accessible as printed news. In 2000, Flanagin and Metzger reported that people rated printed newspapers as having higher credibility than online newspapers. This could suggest that in the past three years, people have become more accepting of online news as a credible and reliable source. What has stayed the same in every study is that people like to customize the news they receive; the students who participated in the current study showed that same interest. Students wrote

that, "Online news is more up-to-date and is easily accessible," "Online is instant, I can get it when I feel like it; " and that, "Online is easier to access at my convenience and easier to find stories and pictures that I want to see and read about." Overall, students like to ability to get information that only they are interested in. Online news allows people to access the news information they want to read without looking at other news information or flipping a page, something that printed newspapers do not allow.

This project also adds to the Uses and Gratifications literature. The Internet is an interactive medium; this survey showed that students like having the ability to choose what to read and what visuals they want to see with a story, or the particular gratifications that come from reading news online or in print. The students also reported that they like being able to view what they want where they want it. This supports that Uses and Gratifications Theory; when people read the news online, they are active participants with specific goals and they know what they want and how to go about getting it. There is something unique about choosing what order to view news information in, and what stories are of particular interest to an individual.

The current study supports the previous research that college students are not reading newspapers, either online or in print, with any regularity. The people who do read newspapers, however, do prefer to read the news online because it is fast, up-to-date and convenient. This project shows that students reported going to the Internet for specific news interests, a change from previous years. Instead of looking only a general news interests, such as weather, move or music news, students reported using the Internet to access specific kinds of information, such as national, international and business/financial

news. It appears that what students look at online (international, national, local, etc.) has stayed the same.

Limitations

This project is not a random sampling of students, but a convenience sampling, allowing the results to reflect only those students who participated in the survey. Students at only one institution were surveyed, and thus cannot be representative of all college students. Furthermore, RIT is a private, technological institution with highly specialized programs, which is not characteristic of all colleges, universities and institutions. Because the method for collecting data was a pencil and paper survey, a limitation is self-reported data on the perceived behaviors, opinions, and attitudes of the participants. It should be noted that this is a convenience sampling and it is, "impossible to evaluate the goodness of the sample in terms of its representativeness of the population. A convenience sample may provide good results or it may not; no statistically justified procedure allows a probability analysis and inference about the quality of the sample results" (Anderson, Sweeney, & Williams, 2002, p. 276). The following results and statistical analysis show only how those undergraduate RIT students who participated in the study answered the survey questions and cannot be representative of all undergraduate students at RIT. Frequency response data are presented in Appendix B; some percentages may not total to 100 because of rounding.

Further Research

Further research on this subject can be conducted using the data collected from this project, which evaluates how students at RIT think about the news, both online and printed. The conclusions and discussions derived from this project can be used to

implement ways of getting college students to read more newspapers, either online or printed. The answers to the research questions presented in this project, combined with previous research that shows a positive affect of newspaper reading on college students, could allow for the development of a model that college professors could incorporate into the classroom to encourage newspaper reading.

More extensive research could also investigate how students at liberal arts colleges feel about the news, as compared to students from a technical institution. Furthermore, similar research could be conducted in order to find out how students feel about other traditional media, such as television and radio broadcast, in addition to printed newspapers. Research could also be conducted in order to develop a system that could predict what types of news people are interested in receiving to further promote personalized news online. A study could be conducted in order to determine people's specific gratifications when using any type of medium. Research investigating how people use different media, and what they get out of using media, would support and add to the Uses and Gratifications theory.

Summary and Conclusions

Before the printed newspaper, people had to rely on word of mouth to receive news information. As the written word evolved and the printing press was invented, and literacy spread, people began to slowly rely on paper to read about events occurring around the world. In the past, the radio, television and printed newspaper were the primary source of news, but as the Internet has improved, more people are turning to the Internet for news information.

This project asked college students to record their beliefs and ideas about printed and online newspapers, and about their news reading habits. Because much of the previous research has shown that a majority of students do not read newspapers, the research completed in this project adds to literature regarding what students think about the news on a general level. The results of this project revealed that a majority of students report that keeping up with the news on a daily basis is important, but students are not reading newspapers on a regular basis. Further, students overwhelmingly prefer the online medium to the printed newspaper. Students felt that using the Internet for news allowed them to research a news story or a particular subject, and to address their particular need and interests through customized sites. Students are also more concerned with national news than local news, and when reading the news online, place a high value on images that accompany the text.

Although the results of this particular study show that students are not reading newspapers as often as older generations, students do feel that keeping up with the news is important. As digital media grow, and as technology improves, students who are reluctant to receive news from other traditional news outlets will likely have adopted alternative methods for keeping up with the news. In addition, the number of sites that are available to people, especially college-aged students, encourages them to seek out news stories and information that relate to all aspects of the news. As we move further into the technological age, people will begin to replace older media, such as television news, radio broadcasts and print newspapers with digital media--one that provides many more outlets of personalization. This will cater to students news interests, whether they are large or minimal.

Appendix A: Survey Instrument

Thank you for taking the time to fill out this survey. There are five sections, and the survey should take less than 10 minutes to complete. The questions on this survey ask about your *opinions* and there are no right or wrong answers. Please think over each question or statement carefully before answering.

Section I: General Questions

Section I asks general information about your newspaper reading habits.

Questions 1-3 ask to what extent you agree or disagree with the following statements about the news (Please respond by circling your answer):

1. It is important to me to keep up with the news on a daily basis.
 - a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

2. It is important to me to keep up with the national news on a daily basis.
 - a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

3. Regardless of where I read the news, it is important to me to read the local news on a daily basis.
 - a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

Questions 4-7 ask specifically about your daily and weekly newspaper reading habits. (Please respond by circling your answer and providing an answer when it applies):

4. In the past 7 days, how often have you read an online newspaper?.

- a. Not at all
- b. 1-3 times per week
- c. 4-6 times per week
- d. Daily
- e. More than twice daily

5. In the past 7 days, how often have you read a printed newspaper?

- a. Not at all
- b. 1-3 times per week
- c. 4-6 times per week
- d. Daily
- e. More than twice daily

6. Currently, I have a subscription to an online newspaper.

- a. YES (*please specify which newspaper* _____)
- b. NO

7. Currently, I have a subscription to a printed newspaper.

- a. YES (*please specify which newspaper* _____)
- b. NO

8. When reading the news, **either online or in print**, what are the first, second and third most important sections of the newspaper to you? (*Put appropriate letter in box*):

- a. Local News
- b. Business/Financial News
- c. Relationship/Family News
- d. Entertainment News
- e. National News
- f. Lifestyles/Fashion/Health News
- g. Sports News
- h. International News
- i. Other (_____)

Most Important

Second Most
Important

Third Most
Important

Section II: Printed Newspapers

Section II asks about your opinions when comparing printed newspapers with online newspapers.

Questions 9-12 ask to what extent you agree or disagree with the following statements (Please circle your answer):

9. I believe that printed newspapers are easier to read the online newspapers.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
10. I believe that there are more stories in printed newspapers than in online newspapers.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
11. I believe that the printed version of a newspaper like the *New York Times* is more credible than the *New York Times* online version.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
12. I believe that printed newspapers are more comprehensive than online newspapers.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

13. When getting the news from a **printed newspaper**, what are the first, second and third most important sections of the newspaper to you? (*Put appropriate letter in box*):

- a. Local News
- b. Business/Financial News
- c. Relationship/Family News
- d. Entertainment News
- e. National News
- f. Lifestyles/Fashion/Health News
- g. Sports News
- h. International News
- i. Other (_____)

Most Important

Second Most Important

Third Most Important

Section III: Online Newspapers

Section III asks about your opinions regarding only online newspapers.

Questions 14-19 ask to what extent you agree or disagree with the statements about online newspapers (*Please circle your answer*):

14. I would prefer to read the news online, even if some details are missing.

- a. Strongly Agree
- b. Agree
- c. Somewhat Agree
- d. More Agree than Disagree
- e. More Disagree than Agree
- f. Somewhat Disagree
- g. Disagree
- h. Strongly Disagree

15. I have a favorite Web site that I regularly get news from.

- a. Strongly Agree
- b. Agree
- c. Somewhat Agree
- d. More Agree than Disagree
- e. More Disagree than Agree
- f. Somewhat Disagree
- g. Disagree
- h. Strongly Disagree

16. When reading the news online, "pop-up" advertisements decrease the credibility of a site.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
17. Online newspapers have more advertisements than printed newspapers.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
18. When reading the news online, it is important to me that there are images that accompany the news story that I am reading.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
19. When reading the news online, it is important to me that there is an optional video attachment.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

20. When reading the news **online**, what are the first, second and third most important sections of the newspaper to you? (*Put appropriate letter in box*):

- a. Local News
- b. Business/Financial News
- c. Relationship/Family News
- d. Entertainment News
- e. National News
- f. Lifestyles/Fashion/Health News
- g. Sports News
- h. International News
- i. Other (_____)

| | |
|-----------------------|----------------------|
| Most Important | <input type="text"/> |
| Second Most Important | <input type="text"/> |
| Third Most Important | <input type="text"/> |

21. For each of the eleven news content areas listed below, please specify which one of the two media you would prefer to get the following information from (*Please record your answer by printing an "x" under the appropriate media*):

| | Online Newspaper | Printed Newspaper |
|-------------------------------------|------------------|-------------------|
| a. Local News..... | _____ | _____ |
| b. Business/Financial News..... | _____ | _____ |
| c. Relationship/Family News..... | _____ | _____ |
| d. Entertainment News..... | _____ | _____ |
| e. National News..... | _____ | _____ |
| f. Lifestyles/Fashion/Health News.. | _____ | _____ |
| g. Sports News..... | _____ | _____ |
| h. International News..... | _____ | _____ |
| i. Weather News..... | _____ | _____ |
| j. Music News..... | _____ | _____ |
| k. Movie News..... | _____ | _____ |

Section IV: Internet Use

Section IV asks you about your interaction with the Internet and newspapers.

Questions 22-26 ask to what extent you agree or disagree with the following statements (please circle your response):

22. On average, I spend more than two hours on the Internet, daily.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
23. I would rather pay for the online version of the newspaper than the printed version.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
24. I would pay a fee to subscribe to a newspaper online.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree
25. People should pay for the news that they read online.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

26. I believe that reading a newspaper online is different than reading a printed newspaper.
- a. Strongly Agree
 - b. Agree
 - c. Somewhat Agree
 - d. More Agree than Disagree
 - e. More Disagree than Agree
 - f. Somewhat Disagree
 - g. Disagree
 - h. Strongly Disagree

Section V: Demographics

Section V. questions are asked for categorical and informational purposes. If you choose to provide your e-mail address, it will not appear in any results.

(Please print your answers):

27. What year were you born? _____

28. What is your major? _____

29. What is your academic year? *(Please circle your answer):*

- a. Freshman
- b. Sophomore
- c. Junior
- d. Senior
- e. Fifth year Undergraduate

30. Please write your thoughts and feelings about online versus printed newspapers.

Thank you for your time and cooperation in filling out this survey. You can request a summary of the results by printing your e-mail address on the line below.

Appendix B: Survey Instrument with Descriptive Statistics

Thank you for taking the time to fill out this survey. There are five sections, and the survey should take less than 10 minutes to complete. The questions on this survey ask about your *opinions* and there are no right or wrong answers. Please think over each question or statement carefully before answering.

Section I: General Questions

Section I asks general information about your newspaper reading habits.

Questions 1-3 ask to what extent you agree or disagree with the following statements about the news (Please respond by circling your answer):

1. It is important to me to keep up with the news on a daily basis. *
 - a. Strongly Agree - 18%
 - b. Agree - 25%
 - c. Somewhat Agree - 24%
 - d. More Agree than Disagree - 11%
 - e. More Disagree than Agree - 10%
 - f. Somewhat Disagree - 5%
 - g. Disagree - 6%
 - h. Strongly Disagree - 0%

2. It is important to me to keep up with the national news on a daily basis.
 - a. Strongly Agree - 16%
 - b. Agree - 26%
 - c. Somewhat Agree - 28%
 - d. More Agree than Disagree - 7%
 - e. More Disagree than Agree - 13%
 - f. Somewhat Disagree - 5%
 - g. Disagree - 6%
 - h. Strongly Disagree - 0%

3. Regardless of where I read the news, it is important to me to read the local news on a daily basis.
 - a. Strongly Agree - 2%
 - b. Agree - 10%
 - c. Somewhat Agree - 32%
 - d. More Agree than Disagree - 20%
 - e. More Disagree than Agree - 10%
 - f. Somewhat Disagree - 12%
 - g. Disagree - 13%
 - h. Strongly Disagree - 1%

* Percentages may not add up to 100 because of rounding and do not include non-responses.

Questions 4-7 ask specifically about your daily and weekly newspaper reading habits. (Please respond by circling your answer and providing an answer when it applies):

4. In the past 7 days, how often have you read an online newspaper?.
- a. Not at all - **31%**
 - b. 1-3 times per week - **41%**
 - c. 4-6 times per week - **13%**
 - d. Daily - **10%**
 - e. More than twice daily - **5%**
5. In the past 7 days, how often have you read a printed newspaper?
- a. Not at all - **62%**
 - b. 1-3 times per week - **31%**
 - c. 4-6 times per week - **5%**
 - d. Daily - **1%**
 - e. More than twice daily - **1%**
6. Currently, I have a subscription to an online newspaper.
- a. YES (*please specify which newspaper* _____) - **15%**
 - b. NO - **85%**
7. Currently, I have a subscription to a printed newspaper.
- a. YES (*please specify which newspaper* _____) - **13%**
 - b. NO - **87%**
8. When reading the news, **either online or in print**, what are the first, second and third most important sections of the newspaper to you? (*Put appropriate letter in box*):

| | <i>Most Important</i> | <i>Second</i> | <i>Third</i> |
|-------------------------------------|------------------------------|----------------------|---------------------|
| a. Local News - | 20% | 21% | 15% |
| b. Business/Financial News - | 6% | 10% | 24% |
| c. Relationship/Family News - | 2% | 1% | 5% |
| d. Entertainment News - | 6% | 5% | 14% |
| e. National News - | 38% | 24% | 7% |
| f. Lifestyles/Fashion/Health News - | 2% | 7% | 5% |
| g. Sports News - | 6% | 9% | 7% |
| h. International News- | 14% | 18% | 16% |
| i. Other (_____) - | 7% | 1% | 5% |

Most Important

Second Most
Important

Third Most
Important

Section II: Printed Newspapers

Section II asks about your opinions when comparing printed newspapers with online newspapers.

Questions 9-12 ask to what extent you agree or disagree with the following statements (Please circle your answer):

9. I believe that printed newspapers are easier to read the online newspapers.
 - a. Strongly Agree - **18%**
 - b. Agree - **15%**
 - c. Somewhat Agree - **21%**
 - d. More Agree than Disagree - **15%**
 - e. More Disagree than Agree - **9%**
 - f. Somewhat Disagree - **9%**
 - g. Disagree - **9%**
 - h. Strongly Disagree - **3%**

10. I believe that there are more stories in printed newspapers than in online newspapers.
 - a. Strongly Agree - **12%**
 - b. Agree - **21%**
 - c. Somewhat Agree - **8%**
 - d. More Agree than Disagree - **8%**
 - e. More Disagree than Agree - **20%**
 - f. Somewhat Disagree - **5%**
 - g. Disagree - **18%**
 - h. Strongly Disagree - **7%**

11. I believe that the printed version of a newspaper like the *New York Times* is more credible than the *New York Times* online version.
 - a. Strongly Agree - **5%**
 - b. Agree - **8%**
 - c. Somewhat Agree - **6%**
 - d. More Agree than Disagree - **9%**
 - e. More Disagree than Agree - **10%**
 - f. Somewhat Disagree - **11%**
 - g. Disagree - **34%**
 - h. Strongly Disagree - **14%**

12. I believe that printed newspapers are more comprehensive than online newspapers.

- a. Strongly Agree - 11%
- b. Agree - 18%
- c. Somewhat Agree - 10%
- d. More Agree than Disagree - 7%
- e. More Disagree than Agree - 18%
- f. Somewhat Disagree - 6%
- g. Disagree - 20%
- h. Strongly Disagree - 8%

13. When getting the news from a **printed newspaper**, what are the first, second and third most important sections of the newspaper to you? (*Put appropriate letter in box*):

| | <i>Most Important</i> | <i>Second</i> | <i>Third</i> |
|-------------------------------------|-----------------------|---------------|--------------|
| a. Local News - | 24% | 18% | 16% |
| b. Business/Financial News - | 5% | 9% | 21% |
| c. Relationship/Family News - | 1% | 1% | 2% |
| d. Entertainment News - | 5% | 7% | 14% |
| e. National News - | 34% | 31% | 5% |
| f. Lifestyles/Fashion/Health News - | 3% | 6% | 3% |
| g. Sports News - | 8% | 10% | 10% |
| h. International News - | 12% | 13% | 17% |
| i. Other () - | 6% | 1% | 8% |

Most Important

Second Most
Important

Third Most
Important

Section III: Online Newspapers

Section III asks about your opinions regarding only online newspapers.

Questions 14-19 ask to what extent you agree or disagree with the statements about online newspapers (*Please circle your answer*):

14. I would prefer to read the news online, even if some details are missing.

- a. Strongly Agree - 5%
- b. Agree - 20%
- c. Somewhat Agree - 11%
- d. More Agree than Disagree - 10%
- e. More Disagree than Agree - 11%
- f. Somewhat Disagree - 16%
- g. Disagree - 18%
- h. Strongly Disagree - 8%

15. I have a favorite Web site that I regularly get news from.
- a. Strongly Agree - **21%**
 - b. Agree - **37%**
 - c. Somewhat Agree - **18%**
 - d. More Agree than Disagree - **2%**
 - e. More Disagree than Agree - **2%**
 - f. Somewhat Disagree - **3%**
 - g. Disagree - **10%**
 - h. Strongly Disagree - **5%**
16. When reading the news online, "pop-up" advertisements decrease the credibility of a site.
- a. Strongly Agree - **20%**
 - b. Agree - **17%**
 - c. Somewhat Agree - **15%**
 - d. More Agree than Disagree - **8%**
 - e. More Disagree than Agree - **6%**
 - f. Somewhat Disagree - **10%**
 - g. Disagree - **17%**
 - h. Strongly Disagree - **5%**
17. Online newspapers have more advertisements than printed newspapers.
- a. Strongly Agree - **13%**
 - b. Agree - **11%**
 - c. Somewhat Agree - **5%**
 - d. More Agree than Disagree - **10%**
 - e. More Disagree than Agree - **16%**
 - f. Somewhat Disagree - **18%**
 - g. Disagree - **17%**
 - h. Strongly Disagree - **7%**
18. When reading the news online, it is important to me that there are images that accompany the news story that I am reading.
- a. Strongly Agree - **18%**
 - b. Agree - **26%**
 - c. Somewhat Agree - **24%**
 - d. More Agree than Disagree - **14%**
 - e. More Disagree than Agree - **9%**
 - f. Somewhat Disagree - **1%**
 - g. Disagree - **6%**
 - h. Strongly Disagree - **1%**

19. When reading the news online, it is important to me that there is an optional video attachment.
- a. Strongly Agree - 2%
 - b. Agree - 17%
 - c. Somewhat Agree - 16%
 - d. More Agree than Disagree - 18%
 - e. More Disagree than Agree - 13%
 - f. Somewhat Disagree - 9%
 - g. Disagree - 21%
 - h. Strongly Disagree - 3%

20. When reading the news online, what are the first, second and third most important sections of the newspaper to you? (*Put appropriate letter in box*):

| | <i>Most Important</i> | <i>Second</i> | <i>Third</i> |
|-------------------------------------|-----------------------|---------------|--------------|
| a. Local News - | 14% | 16% | 13% |
| b. Business/Financial News - | 7% | 10% | 28% |
| c. Relationship/Family News - | 0% | 1% | 1% |
| d. Entertainment News - | 6% | 9% | 17% |
| e. National News - | 38% | 26% | 8% |
| f. Lifestyles/Fashion/Health News - | 2% | 7% | 5% |
| g. Sports News - | 8% | 6% | 6% |
| h. International News - | 17% | 21% | 17% |
| i. Other () - | 8% | 1% | 3% |

Most Important

Second Most
Important

Third Most
Important

21. For each of the eleven news content areas listed below, please specify which one of the two media you would prefer to get the following information from (*Please record your answer by printing an "x" under the appropriate media*):

| | Online Newspaper | Printed Newspaper |
|----------------------------------|------------------|-------------------|
| a. Local News..... | _____ 25% _____ | _____ 74% _____ |
| b. Business/Financial News..... | _____ 74% _____ | _____ 26% _____ |
| c. Relationship/Family News..... | _____ 51% _____ | _____ 48% _____ |
| d. Entertainment News..... | _____ 75% _____ | _____ 22% _____ |
| e. National News..... | _____ 67% _____ | _____ 33% _____ |

| | | |
|-------------------------------------|-----|-----|
| f. Lifestyles/Fashion/Health News.. | 70% | 28% |
| g. Sports News..... | 66% | 32% |
| h. International News..... | 67% | 31% |
| i. Weather News..... | 75% | 22% |
| j. Music News..... | 77% | 19% |
| k. Movie News..... | 71% | 29% |

Section IV: Internet Use

Section IV asks you about your interaction with the Internet and newspapers.

Questions 22-26 ask to what extent you agree or disagree with the following statements (please circle your response):

22. On average, I spend more than two hours on the Internet, daily.
 - a. Strongly Agree - **40%**
 - b. Agree - **23%**
 - c. Somewhat Agree - **16%**
 - d. More Agree than Disagree - **6%**
 - e. More Disagree than Agree - **3%**
 - f. Somewhat Disagree - **1%**
 - g. Disagree - **7%**
 - h. Strongly Disagree - **3%**
23. I would rather pay for the online version of the newspaper than the printed version.
 - a. Strongly Agree - **3%**
 - b. Agree - **14%**
 - c. Somewhat Agree - **11%**
 - d. More Agree than Disagree - **6%**
 - e. More Disagree than Agree - **13%**
 - f. Somewhat Disagree - **6%**
 - g. Disagree - **33%**
 - h. Strongly Disagree - **14%**
24. I would pay a fee to subscribe to a newspaper online.
 - a. Strongly Agree - **2%**
 - b. Agree - **11%**
 - c. Somewhat Agree - **5%**
 - d. More Agree than Disagree - **8%**
 - e. More Disagree than Agree - **9%**
 - f. Somewhat Disagree - **9%**
 - g. Disagree - **32%**
 - h. Strongly Disagree - **23%**

25. People should pay for the news that they read online.
- a. Strongly Agree - 1%
 - b. Agree - 1%
 - c. Somewhat Agree - 9%
 - d. More Agree than Disagree - 11%
 - e. More Disagree than Agree - 15%
 - f. Somewhat Disagree - 9%
 - g. Disagree - 32%
 - h. Strongly Disagree - 21%
26. I believe that reading a newspaper online is different than reading a printed newspaper.
- a. Strongly Agree - 19%
 - b. Agree - 34%
 - c. Somewhat Agree - 19%
 - d. More Agree than Disagree - 12%
 - e. More Disagree than Agree - 7%
 - f. Somewhat Disagree - 7%
 - g. Disagree - 2%
 - h. Strongly Disagree - 1%

Section V: Demographics

Section V. questions are asked for categorical and informational purposes. If you choose to provide your e-mail address, it will not appear in any results.

(Please print your answers):

27. What year were you born? _____
28. What is your major? _____
29. What is your academic year? *(Please circle your answer):*
- a. Freshman - 0%
 - b. Sophomore - 2%
 - c. Junior - 24%
 - d. Senior - 56%
 - e. Fifth year Undergraduate - 17%

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