INCIDENTAL EXPOSURE TO ONLINE NEWS IN EVERYDAY LIFE INFORMATION SEEKING CONTEXT: MIXED METHOD STUDY

A Dissertation

presented to

the Faculty of the Graduate School

at the University of Missouri-Columbia

In Partial Fulfillment

of the Requirements for the Degree

Doctor of Philosophy

by

BORCHULUUN YADAMSUREN

Dr.Sanda Erdelez, Dissertation Supervisor

© Copyright by Borchuluun Yadamsuren 2010

All Rights Reserved

The undersigned, appointed by the dean of the Graduate School, have examined the dissertation entitled

INCIDENT	TAL EXPOSURE TO ONLINE NEWS IN EVERYDAY LIFE
INFORMA	TION SEEKING CONTEXT: MIXED METHOD STUDY
presented b	y Borchuluun Yadamsuren,
a candidate	for the degree of doctor of philosophy,
and hereby	certify that, in their opinion, it is worthy of acceptance.
	Professor Sanda Erdelez
	Professor John Budd
	Professor Denice Adkins
	Trolessor Beinee Flakins
	Professor Charles Davis

Professor Clyde Bentley

Dedication

This dissertation is dedicated to my loving family. Words cannot express how much I am grateful to have a wonderful family who always support me. My parents Dr. Yadamsuren Ish and Borgil Jodov-Ish taught me, from childhood on, perseverance and a desire to learn and provided unconditional love, encouragement, and support in the process of getting my education. Without intention, my dad was a role model and inspired me to pursue a doctoral degree by sharing his joys and passions in being dedicated scholar.

I am deeply thankful to my loving husband, Jagdagdorj Erkhembayar, for providing all the necessary support and encouragement for me to reach this point. He has always cherished me during difficult times, shared my happy moments, and sharpened my mind by asking tough questions. Without him, I would not have been able to finish this dissertation.

Thanks to my daughters Nomin-Erdene, Bolor-Erdene, and Saruul-Erdene for shining into my life with their happy smiles, being patient, and allowing me to concentrate on endless hours of research. This dissertation is especially for Saruul, who constantly asked me when I would finish my "big book" and offered to include her nice drawing in it.

I am grateful to my sisters Chuluuntsetseg Yadamsuren, Tsetseg-Ulzii Yadamsuren and my brothers Ulziibold Yadamsuren and Bold-Erdene Yadamsuren for their support, love, and encouragement overcoming the far-away distance. Thanks for always believing in me.

This dissertation is dedicated to the ones I love.

ACKNOWLEDGEMENTS

I would like to thank everyone who supported me in finishing this research. I had the most wonderful committee that provided me with marvelous help and invaluable suggestions. Thank you to Sanda Erdelez, John Budd, Denice Adkins, Charles Davis, and Clyde Bentley for sharing their intellectual and practical wisdom on conducting research. I am grateful to Sanda Erdelez who provided warm encouragements throughout my doctoral study. Her intellectual guidance with critical comments and challenging questions were priceless for my research. Thank you to John Budd for introducing me to philosophical foundations and different paradigms in the knowledge quest. Denice Adkins always asked excellent questions about my research and provided encouragements. Charles Davis has been a long-term mentor in my intellectual quest to study online media, starting from my master's study. Clyde Bentley generously supported my research by sharing his expertise in the study of the habits of news readers.

My deepest gratitude goes to Reijo Savolainen for being my unofficial and indispensable committee member. He exchanged numerous e-mail messages from long distances, reviewed my early drafts, and provided insightful comments and suggestions for applying his Everyday Life Information Seeking model to my research.

I owe many thanks to other faculty members of the University of Missouri. Thank you Douglas Raber for introducing me to the grounded theory approach and providing invaluable suggestions at the early stages of my research. Thanks to Kim Thompson for challenging my thinking, editing my early draft meticulously, and teaching me to be perseverant. Thanks to Jaber Gubrium for introducing me to the active interview

technique. Thanks to Stephanie Craft for allowing me to test my initial inquiry in her class as I was developing my dissertation research. I am forever indebted to Byron Scott for supporting me in pursuing my graduate study at the University of Missouri.

I am deeply grateful to Gary Westergren and Neeley Current for their nurturing support and friendship. The Information Experience Laboratory provided me not only with financial support for my doctoral study, but also with wonderful opportunities to gain invaluable research and practical experiences. Thank you for allowing me to use the lab resources for my data collection and analysis.

Thank you to my friends who shared the challenging and rewarding journey of my doctoral study at the School of Information Science and Learning Technologies.

Thanks to Anindita Paul, Jennifer Crispin, Lanika Ruzhitskaya, Xin Wang, Jiazhen Wang, Heather Hill, Jenny Bossaler, Brooke Shannon, Musa Olaka, Said Al Ghenaimi, Andrew Tawfik, Camille Dickson-Deane, Weichao (Vera) Chen, Matthew Schmidt, Christiana Kumalasari, Piyanan (Tak) Nuankhieo, Dinara Saparova, Kyungbin Kwon, Ta Boonseng, Monica McCroy, Dan Cernusca, Diane Velasquez, and Denyse Sturges for cheering me up. I am grateful to my friend Anindita Paul for being a loyal and motivating companion through the bumpy roads of my doctoral study. Daily discussions about my research with you were invaluable for me. Thanks to Kanwal Ameen for encouragement and motivations at the final moments of my research.

Thanks to Robert Weir, director of digital development at the *Columbia Missourian* newspaper, for giving me access to their website for the recruitment of survey participants.

Thanks to my study participants for sharing their experiences of news reading and the ambiguous topic of incidental exposure to online news. Without your help and cooperation, this research would not have been possible.

Special thanks go to Jennifer Crispin and Marta Ferguson for the careful copyediting of my dissertation.

Thanks to everyone who helped me through this long journey!

TABLE OF CONTENTS

ACKNOWLEDGEMENTSii
LIST OF FIGURESx
LIST OF TABLESxi
ABSTRACT
CHAPTER 1. Problem Statement
1. Introduction
2. Background
3. Research Goal
4. Research Design
5. Significance of the Study
CHAPTER 2. Literature Review and Conceptual Framework
1. Media Audience Studies
2. Uses and Gratifications Theory
3. Media Usage Patterns
3.1. Active usage
3.2. Passive usage
3.3. Ritualistic or habitual usage
4. Online News Reading Behavior

5. Incidental Exposure to Online News
6. Incidental Information Acquisition (IIA) in LIS
7. Information Encountering (IE) Model
8. Everyday Life Information Seeking (ELIS) Model
9. Assumptions of This Study
CHAPTER 3. Research Methodology
1. Research Design
1.1 Phase I
1.1.1. <i>Survey</i>
1.1.2. <i>Sampling</i>
1.1.3. <i>Pilot test.</i>
1.1.4. Survey data collection37
1.1.5. Survey data analysis
1.2. Phase II
1.2.1. Interview instrument
1.2.2. Interview procedure39
1.2.3. Selection of interview respondents44
1.2.4. Qualitative data analysis 47
1.3 Research quality 51

1.4 Potential ethical issues
CHAPTER 4. Findings
1. Quantitative Findings
1.1. Demographics of survey respondents
1.2. Education
1.3. Number of days respondents read news
1.4. Sources used for news reading 60
1.5. Devices used for news reading
1.6. Online news reading behavior of respondents
1.7. Incidental exposure to online news
2. Qualitative Findings
2.1. Background information about the interview respondents 67
2.2. Characteristics of online news reading behavior 69
2.2.1. What are the respondents' perceptions of online news? 69
2.2.2. What types of news do the respondents read online? 74
2.2.3. How do the respondents read news online?79
2.2.4. Why do the respondents read online news?
2.3. Characteristics of Incidental Exposure to Online News
2.3.1. What are the respondents' perceptions of incidental
exposure to online news?117

	2.3.2. How often do respondents experience incidental exposure	to
	online news?	121
	2.3.3. Where do respondents incidentally discover online news?	
		123
	2.3.4. How do respondents feel about incidental exposure to onl	ine
	news?	132
	2.3.5. What types of news do they find incidentally?	134
	2.3.6. What is the connection between the incidentally exposed	
	news and the readers' underlying needs or problems?	137
	2.3.7. How do the respondents judge the credibility/quality of ne	'WS
	stories to which they get exposed incidentally?	142
	CHAPTER 5. Discussion	148
	1. Online News Reading Behavior in Light of the ELIS Model	148
	2. Uses and Gratifications of Online Media	154
	3. Incidental Exposure to Online News	155
	4. Discussion about Methodology for Studying Incidental Exposure to Online	
News		164
	5. Online News Reading Behavior Model	166
	6. Types of Online News Readers	171
	7. Fragmentation of Audience	174

CHAPTER 6: Conclusion		
1. Implications of the Study		
2. Limitations of the Study		
3. Future Studies		
Appendix A: Survey instrument with informed consent form		
Appendix B. Screenshot of the banner at the newspaper website		
Appendix C: Interview questions		
Appendix D: Interview analysis steps		
Appendix E: Coding sheet		
Appendix F. Chart of nodes for interview #6		
Appendix G: Example of triangulation		
Appendix H: Overview of interview respondents' demographics		
Appendix I: Analysis of critical incident stories		
Appendix J: Analysis of news stories reported in critical incident stories 212		
Appendix K. Underlying needs for incidental exposure to online news		
REFERENCES		
VITA 228		

LIST OF FIGURES

Figure 4-1. Screenshot of Customization of News Source	es 84
Figure 5-1. Online News Reading Behavior	171

LIST OF TABLES

Table 3-1. Design of Questions
Table 4-1. Age Groups of Interview Respondents
Table 4-2. Ethnicity of Survey Respondents
Table 4-3. Household Income of Survey Respondents
Table 4-4. Education of Survey Respondents
Table 4-5. News Sources
Table 4-6. Devices Used for News Reading
Table 4-7. Online News Related Activities
Table 4-8. Attention Given to News
Table 4-9. Incidental Exposure to Information and News on the Internet 66
Table 4-10. Demographics of Interview Respondents
Table 4-11. Types of Online News Sources
Table 4-12. Access to Online News Sites
Table 4-13. Online News Reading Behavior During the Browsing Process 94
Table 4-14. Perceptions of Incidental Exposure to Online News
Table 4-15. Frequency of Incidental Exposure to Online News
Table 4-16. Environment for Incidental Exposure to Online News

Table 5-1. Types of online news readers	172
Table 4-18. Expressions Used for Credibility Judgments	143
Table 4-17. Specific Locations for Incidental Exposure to Online News	131

ABSTRACT

The Internet and new technologies are changing the information behavior of news readers. News readership is shifting to the Internet because of accessibility, inexpensive technology, and free content. The prevalence of news on the Web provides opportunities for people to come across news in an incidental way as a byproduct of their online activities.

The present study explored the nature of incidental exposure to online news by applying Savolainen's Everyday Life Information Seeking model, Erdelez's Information Encountering model, and Uses and Gratifications theory. Online news readers participated in two phases of mixed method study. The first phase involved the analysis of a web survey with 148 participants recruited through the website of a local newspaper. Respondents who demonstrated an awareness of their incidental exposure to online news were selected for the second phase. In the second phase, the researcher interviewed 20 respondents using critical incident, explication interview, and think-aloud techniques.

The findings highlighted social, behavioral, cognitive, and affective aspects of online news reading behavior and incidental exposure to online news. The study indicates that online news reading happens in a habitual way. Incidental exposure to online news is becoming a major way for some respondents to get informed about news events. The study presents a model of online news reading behavior and four different types of online news readers: avid news readers, news avoiders, news encounterers, and crowd surfers. Respondents' perceptions of incidental exposure to online news are grouped into three contexts: news reading, non-news reading, and Internet in general.

CHAPTER 1. Problem Statement

1. Introduction

The Internet and the latest communication technologies have had enormous impact on the news media industry. The newspaper industry is struggling to survive hardships, such as losing advertising and readership. U.S. newspapers have entered a new period of decline for the last few years. A number of prominent newspapers, such as the *Rocky Mountain News* and *Seattle Post Intelligencer*, have closed their doors because of shrinking readership. Media industry experts are questioning whether the newspaper industry will survive the Internet. Media practitioners are puzzled by the current situation and they feel that something is changing with readers.

Advanced communication technologies are changing the news reading habits and information behavior of news consumers. News readership seems to be shifting to the Internet because of accessibility, inexpensive technology, flexibility, and free content. The prevalence of news on the Web provides opportunities for people to encounter news in an incidental way as a byproduct of their online activities. Incidental discovery of online news is also becoming an important way of how people get informed about public events. Tewksbury, Weaver, & Maddex (2001) refer to unintentional news reading as a contemporary avenue for citizen acquisition of current affairs information. For this study, incidental exposure to online news will be conceptualized as memorable experiences of accidental discovery of useful and interesting news when people engage in various activities online.

The present study aims to explore the nature of incidental exposure to online news from an interdisciplinary perspective, applying theories from mass communication and library and information science (LIS). This chapter introduces the research goal, assumptions, concept explications, and research design of the study.

2. Background

Internet technology and online news dissemination have changed the news reading habits and information behavior of readers. News reading is more deeply embedded in people's daily lives than it has been at any previous time, thanks to wireless Internet, mobile technology, and portable devices. According to Purcell et al. (2010), 92% of Americans access news in multiple formats on a typical day. Instead of reading a copy of the local newspaper or watching the scheduled evening news, people increasingly turn to the Internet for daily news. Cell phones, laptops, and other portable devices provide a tremendous opportunity for readers to choose stories that interest them from the myriad of channels and websites anytime they want. As Ognianova (1997) has stated, the combination of distinct features, such as interactivity, unlimited space, unconstrained access, and regular updates, make online news services a new medium from both the industry's and audience's perspectives. Readers subscribe to online news, customize the news they receive, and use really simple syndication (RSS) feeds to get the most important and interesting news on their computer screens. The Internet provides "audiences with substantially more control over the news selection process than they enjoyed with the traditional media" (Tewksbury, 2003, p. 694).

The impact of online media on readers' behavior is massive, but at the same time it is challenging to understand how their information seeking behavior is changing. On

one hand, media researchers argue that the enhanced control of the Internet provides an opportunity for online news readers to pursue their own interests, assuming that they are less likely to follow the cues of news producers. Media experts worry that new technologies are fragmenting audiences by limiting their exposure to viewpoints other than those of like-minded groups Chaffee & Metzger (2001). As a result of this narrowed focus on specific content, people appear likely to ignore other messages. The use of individually tailored media might be displacing "national comings-together," and pleasure could be pushing public affairs ever more out of sight (Katz, 1996).

On the other hand, there is some evidence that the nature of the Internet and its rich content provide opportunities for people to stumble upon unexpected news stories. According to the *State of the News Media: Annual Report on American Journalism* (2007), about seven in ten adult Americans or roughly 141 million people use the Internet. However, when it comes to online news in particular, the size of the audience levels off. The number of Americans who say they go online every day for news dropped from 34% in June 2005 to 27% in 2006. The report says that this apparent drop could possibly be related to the fact many people incidentally discover news online when they access the Internet for reasons other than news. Tewksbury et al. (2001) calls unintentional news reading "incidental exposure," which is "a contemporary avenue for citizen acquisition of current affairs information" (p.534).

The growth in incidental exposure to online news may pinpoint how the news reading behavior of people has evolved over the years. The Web has gradually become a part of the working day, thanks to increasing broadband penetration in the workplace.

Most online users multitask when they surf the Web. During this multitasking process,

they could stumble upon interesting news online although their original goal was not news reading. This way, people get news sporadically throughout the day, rather than in one hour of devoted news time in the morning or around dinner, which was the typical media behavior before the Internet.

3. Research Goal

As one of the growing patterns of online news reading, incidental exposure to online news calls for direct academic inquiry and empirical testing. To explore this behavior the present study takes an interdisciplinary approach, bringing together insights from two distinct research traditions of user studies in mass communication and library and information science. Incidental exposure to online news is studied from the perspective of information seeking behavior models from library and information science (LIS). The present study is guided by Uses and Gratifications (U&G) theory from mass communication, Savolainen's (1995) Everyday Life Information Seeking (ELIS) model, and Erdelez's (2004) Information Encountering (IE) model from LIS.

The aim of this study is to build as rich a picture as possible of the concept of incidental exposure to online news and its nature and attributes, as perceived by the respondents in the context of online news reading.

The research questions guiding this study are as follows:

RQ1. What are the characteristics of online news reading in the context of people's everyday life information seeking behavior?

RQ2. What are the characteristics of incidental exposure to online news?

The first research question intends to investigate online news reading behavior of people within the framework of the Everyday Life Information Seeking model (ELIS).

The second research question aims to explore the phenomenon of incidental exposure to online news. To that end, this study investigates the following questions:

- What are the respondents' perceptions of incidental exposure to online news?
- How often do respondents experience incidental exposure to online news?
- Where do respondents incidentally discover online news?
- How do respondents feel about finding online news incidentally?
- What types of online news do they find incidentally?
- What is the connection between the incidentally exposed news content and the readers' underlying needs or problems?
- How do the respondents judge the credibility/quality of news stories to which they get exposed incidentally?

This study explores incidental exposure to online news from a holistic perspective including social, behavioral, cognitive, and affective dimensions. It is challenging to capture a holistic view of information behavior because there are many observable and unobservable behaviors related to how people seek and use information. When one looks at information behavior as a whole, it is a challenge to combine its internal and external components by specifying how unobservable cognitive behavior affects and orients observable information behavior and vice versa (Savolainen, 2007, p.117). Nahl (2005) suggests that researchers need to look at both the affective and cognitive mental activity of information users, since "thinking of a search word" or "feeling motivated to finish a task" are parts of their behavior (p.39). Affective issues in incidental exposure to online news are reviewed using factors such as intention, purpose, motive, and emotional feeling for searching. According to Savolainen (2007), the cognitive viewpoint focuses

fundamentally on the individual and on understanding the way that each person thinks or behaves in response to information needs (p.118). Cognitive factors are related to information needs, knowledge, decisions, and information use associated with incidental exposure to online news.

The present study proposes that the use of online news happens in an everyday life information seeking context and people read online news both actively with a certain goal and passively without predetermined goals. An underlying assumption for this inquiry is the proposition that readers can experience incidental exposure to online news within their three different media usage patterns: active, passive, and ritualized.

4. Research Design

Investigating the information behavior of online news readers in real life is a complex task. Information-seeking behavior often defies generalization and usually escapes observation. It is difficult to study behavior that varies so much across people, situations, and objects of interest, and that takes place primarily inside a person's head (Case, 2002, p.5). In addition to this complexity, serendipity adds more challenges for investigation of this behavior "since it is by definition not particularly susceptible to systematic control and prediction" (Foster & Ford, 2003, p.337). Williamson (1998) mentions the methodological challenges during the interviews to distinguish "purposeful information seeking" from "incidental information acquisition" in the use of sources of information (p.28). She recommended having precise definitions to analyze data.

Due to the scarcity of prior empirical research on incidental exposure to online news, the present study is exploratory. To capture, interpret, and understand the complex nature of the information behavior of online news readers—more specifically the nature

of incidental exposure to online news—this study uses the mixed method approach. This combined approach allows the gathering of reasonably complete and reliable data on the real-world information behavior of online news readers. When only one approach to research (quantitative or qualitative) is inadequate by itself to address the research problem, mixed method research is appropriate. According to Creswell and Clark (2007), "the combination of qualitative and quantitative data provides a more complete picture by noting trends and generalizations as well as in-depth knowledge of participants' perspectives" (p.33).

A single research method would not be sufficient to study incidental exposure to online news. By using quantitative and qualitative data, the researcher is able to triangulate and cross-validate findings to understand how readers experience incidental exposure to online news. The triangulation approach is used "when a researcher uses two different methods in an attempt to confirm, cross-validate, or corroborate findings within a single study" (Creswell and Clark, 2007, p.217). With the mixed method approach, the body of quantitative data collected with a survey is enhanced by rich qualitative data.

Gathering quantitative data offers the opportunity to get a general picture of online news reading behavior of users. In addition, a survey serves as a screening tool to select people who are more aware of their incidental exposure to online news. However, such data is limited in revealing a true picture of readers' perceptions of their incidental exposure to online news.

A key rationale for the qualitative component in the present study is to explore incidental exposure to online news from a holistic perspective, including the social, behavioral, cognitive, and affective factors that lie behind the quantitative measures.

Creswell and Clark (2007) argue that qualitative data could enrich and explain the quantitative results in the words of participants when the quantitative results are inadequate to provide explanations of outcomes. Wilson (1981) also argues that qualitative research is particularly appropriate to the study of the needs underlying information-seeking behavior because it can help researchers to uncover "the facts of everyday life of people" and reveal the needs that "press the individual towards information seeking behavior" (p.11).

The body of qualitative data in this study is analyzed with a grounded theory approach. However, this study does not follow pure grounded theory from a strict interpretation of its definition. Glaser (2000) points out that grounded theory is a general method and it can be used on any data. According to Glaser, not all grounded theory methodological steps are necessary when it is used as a general method.

5. Significance of the Study

A thorough analysis of people's online news reading behavior and incidental exposure to online news sheds light on future directions for online media development and research activities in both mass communication and LIS. The study of incidental exposure to online news contributes to the research realm of human information behavior in incidental information acquisition, everyday life information seeking, multitasking, and future information use studies.

The application of human information behavior theories to the study of the information behavior of online news readers is important for both researchers and practitioners in understanding the changing nature of user behavior better. As Ognianova (1997) has stated, finding out "what goes on in a consumer's 'black box' during the

reading/viewing of an online news service" is crucial for media studies. Nguyen (2008) emphasizes the importance of the research need for "a non-linear model" to understand online news readers' behavior. The ELIS model and the Information Encountering model may help researchers and practitioners to better understand what is going in people's minds and find out why and how they discover some news and miss other news.

Understanding the information behavior of online news readers may help media professionals and information specialists to design more effective online information and media systems and may help empower readers in the digital environment. An increased understanding of spontaneous and unexpected aspects of news exposure could be useful in the design of information and news services. This understanding may help answer many questions, such as how media websites should attract readers and where to place online news on the World Wide Web to provide better opportunities for incidental exposure to it.

CHAPTER 2. Literature Review and Conceptual Framework

This chapter reviews the literature in user studies from two fields: mass communication and library and information science (LIS). The main goal of this study is to explore the information behavior of online news readers, more specifically their behaviors related to incidental exposure to online news from the interdisciplinary perspective.

The present study brings together two distinct research traditions of user studies to build a preliminary understanding of the information behavior of online news readers. Audience studies from mass communication contribute to the understanding of media users' behavior and habits. The Uses and Gratifications (U&G) theory from mass communication provides insight into the motivations, uses, and gratifications of reading online news. Research from LIS contributes to the understanding of the individual behavior of news readers with the assumption that online news is one of many different information sources people use. The present study is guided by Savolainen's (1995) Everyday Life Information Seeking (ELIS) model, Erdelez's (2004) Information Encountering (IE) model and the U&G theory from mass communication. The ELIS model provides a foundation to place online news reading in the context of people's everyday life information seeking. The IE model provides the framework to investigate incidental exposure to online news. The present study does not aim to test this model but uses it to explain one of many possible types of incidental information acquisition. The U&G theory provides a foundation for understanding the audience needs from a media usage perspective.

1. Media Audience Studies

The question of how and why individuals use certain media has been the focus of communication studies from the very beginning of empirical media research. In the early years of media effects research, audience members were considered passive and media was considered to have a powerful effect on them. The bullet theory, also called the hypodermic needle theory, predicted strong and universal effects of mass communication messages on all audience members who are exposed to them. Bentley (2000) argues that audience studies at the end of the 20th century were too focused on micro levels of personal media use and the context of a particular text. Researchers now emphasize the need to have a more eclectic form of research that looks at both micro and macroscopic issues in media use.

Research suggests that media use depends on a variety of factors related to audience characteristics, such as needs fulfillment, appropriateness, social norms, peer evaluations of media, and situational factors that either facilitate or constrain people's behavior. Among these factors, needs fulfillment or motivation has been most extensively discussed, mainly in Uses and Gratifications studies.

2. Uses and Gratifications Theory

The Uses and Gratifications (U&G) theory is the most widely used theory in media audience studies. Drawing from the traditions of psychology, the Uses and Gratifications school asserts that consumption of media fulfills basic human needs. It investigates the reasons for media use, and has been used for many years to learn about the mass media audience. U&G research began in the 1940s when researchers became

interested in learning why audiences engaged in various forms of media behavior, such as listening to the radio or reading the newspaper.

U&G theory focuses on examining individual use of the media. McQuail, Blumler, and Brown (1972) suggest the following categories of media audience needs and gratifications:

Diversion–escape from routine and problems, emotional release

Personal relationships—social utility of information in conversations, substitute of the media for companionship

Personal identity or individual psychology—value reinforcement or reassurance; self-understanding; reality exploration etc.,

Surveillance–information about things that might affect one or will help one do or accomplish something. (p.140)

Katz, Gurevitch, and Haas (1974) list 35 needs taken from the literature on the social and psychological functions of the mass media and divide them into five categories: cognitive, affective, personal integrative, social integrative, and tension release needs. According to Bunz (2001), cognitive needs result from the desire to acquire information, knowledge, and understanding in an increasingly information-rich society. People seek to understand and know about their environment to make sense of contexts. Affective needs are connected to emotional experiences and people's intrinsic desire for pleasure, entertainment, and aesthetics. Personal integrative needs derive from people's desire to appear credible, confident, stable and to have high self-esteem. These needs are closely related to an individual's value system. Social integrative needs are affiliation needs. People want to be a part of a group, and they want to be recognized as part of this group.

According to Severin & Tankard (2001), the U&G theory has drawn some criticism for being non-theoretical, vague in defining key concepts, and for being nothing

more than a data-collecting strategy. This theory has also been criticized for being focused too narrowly on the individual, not looking at the surrounding context and putting too much emphasis on active audiences. It postulates that people use media because they believe media will help them achieve their goals and satisfy their needs. By focusing on audience internal motivations as the origins of media use and the determinant of how audiences will be engaged by the media, the U&G approach has largely ignored social and cognitive factors or audiences' psychological establishments as possible forces that can initiate people's exposure to media information.

Ajzen and Fishbein (1980) argue that a measure of behavior involves four distinct elements: the action, the target at which it is directed, the context in which it occurs, and the time of its occurrence. From this perspective, it could be argued that the U&G theory lacks context measurement. It does not take into account the possibility that people may have different attitudes toward the gratification sought in media as those contexts change over time and among people.

Despite harsh criticisms, the U&G theory has been developed, applied, and integrated with other theories, especially those dealing with new technologies. Ruggiero (2000) has investigated the evolution of this theory and argues that it still has a significant role in media audience studies providing "a cutting-edge theoretical approach in the initial stages of each new mass communications medium" (p.3).

The U&G theory has been applied to studies of different media, including newspapers, radio, television, the VCR, cable, computers and the Internet. Ruggiero (2000) argues that interactivity, "demassification," and "asynchroneity" of the Internet offer much broader avenue for U&G researchers to examine communication behavior

(p.16). Demassification refers to the ability of the media user to select from the variety of sources. Asynchroneity means that senders and receivers of electronic messages can read them at different times and interact at their convenience.

A number of studies have applied the U&G theory to users' needs in the electronic environment. According to Severin & Tankard (2001) people use electronic media to satisfy the following needs: learning, entertainment, social interaction, escapism, passing time, and habit. Diddi & LaRose (2006) have proposed a theory of news-habit formation based in the U&G theory and have applied it to online news consumption among college students. They found six different patterns of news choice: hometown newspapers, comedy news, cable news, Internet news, broadcast news, and indepth news coverage. They found surveillance and escapism to be the most consistent predictors of the news consumption behavior of college students.

3. Media Usage Patterns

Mass communication researchers have attempted to classify media usage into different groups: 1) instrumental and ritualized; 2) active, passive and ritualized. Nguyen (2008) argues that actual media use is a combination of three forms—active, passive and ritualized.

3.1. Active usage

U&G researchers investigate why and how audiences seek, use, and consume news content. Early research studies in this realm were built on the assumption that motivated individuals purposefully seek media content to fulfill their cognitive and affective needs (Blumler, 1979). According to Lin and Salwen (2006), this theoretical

paradigm also subsumes the concept of audience activity—occurring in either instrumental or ritualized forms. Audience activity associated with an instrumental tendency reflects a media-use process that is motivated by more specific cognitive needs and goals. Ritualistic use focuses more on the medium, rather than on particular content. This way, ritualistic use is associated with "diffuse motives," such as passing time, habit, relaxation and more exposure to the medium (Rubin & Perse, 1987).

In the 1980s media researchers started criticizing the long-term notion of an active audience and suggested that audience activity is not an absolute concept, but a variable one. Windahl (1981) argues that the notion of activeness shows the media audience as "superrational and very selective"(p.176). Instead, he argues that audience activity covers a range that varies across phases of the communication sequence. His assertion means that individuals tend to display different types and amounts of activity in different communication settings and at different times in the communication process.

3.2. Passive usage

Scholars who support a passive audience conception cite the escapist model of media use, which presumes that people use media, especially TV, to pass time (Barwise, Ehrenberg, & Goodhart, 1982; Kube, 1986). Horna (1988) found relationships between leisure and people's use of mass media with the U&G theory. He concluded that leisure and mass media are synonymous since the media audience seeks entertainment, relaxation, or escape.

Factors, such as (a) different time relations (advance expectations, activity during the experience, postexposure), (b) variability of involvement (such as background noise, companionship), and (c) ritualistic or habitual use (such as mild stimulation), suggest a

more passive audience than traditionally believed. Specifically, the time- relations theory postulates that individuals are differently selective and goal directed at different times: before, during, and after exposure to media (Levy & Windahl, 1984). Variability of involvement suggests that the motivation to use any mass medium is also affected by how much an individual relies on it and how well it satisfies her or his need (Lichtenstein & Rosenfeld, 1983).

3.3. Ritualistic or habitual usage

The assertion by many scholars in mass communication that exposure to mass media may not always be highly deliberate or purposeful challenges some of the basic notions of the U&G approach. Severin & Tankard (2001) argue that media usage could be ritualistic or habitual when people have a low level of attention to media. Donohew, Nair, & Finn (1984) describe people as making their way through the mass communication environment passively, as if they are on "automatic pilot."

The terms "habit," "rite," and "ritual" have been used interchangeably by theorists. However, the selection of a term depends on the degree, intent and timing of the action (Bentley, 2000, p.54). The distinction between habit and ritual is less clear. Kluckhohn (1942) defined ritual as "an obsessive repetitive activity—often a symbolic dramatization of the fundamental 'needs' of the society, whether 'economic,' 'biological,' or 'sexual'" (p.78). Rubin (1984) cautioned that ritualized and instrumental media use are not neatly dichotomous but are more likely interrelated. Just as audience activity is variable, individuals may use media ritualistically or instrumentally depending on background, time, and situational demands. According to Bentley (2000), media use

results in both effects and consequences. Effects are the result of active, instrumental use of media content.

Habit has been used to challenge popular notions of consumer behavior, of which news readership is a natural subset. The theory of reasoned action assumes that consumer attitudes and behaviors are related and that behavior results from intention. However, some other researchers argue that habitual use of media is more related to utility and not much to intentionality and selectivity.

A few researchers have empirically studied the habits of media users. Ouellette and Woods (1998) conducted a meta-analysis of 55 studies related to habits of media users defining habit as "behavioral tendency." They noted that habitual responses are likely to occur with minimal thought and effort, to the extent that contextual features integral to performing the response and one's behavioral goals are similar across time and setting. Bentley (2000) has studied the habits of traditional newspaper readers and concluded that psychological and sociological needs alone are not enough to explain why an individual reads newspapers and consumes news. Rios & Bentley (2001) have argued that a habit of online news reading may be more difficult to foster because reading appears less time-bound online, which lessens the context of stability for habit development.

4. Online News Reading Behavior

A number of studies have investigated how news reading behavior has changed in the digital environment. Nguyen (2008) has developed and tested a theoretical model of the online news adoption/use process, based on expectancy-value and innovation-diffusion theories, to examine the predictive power of nine common features of online

news. Liu (2005) has investigated how the reading behavior of users has changed in the digital environment. Liu's study showed that a screen-based reading behavior is emerging, which is characterized by more time spent on browsing and scanning, keyword spotting, one-time reading, and non-linear reading, while less time is spent on in-depth reading and concentrated reading.

Flavian & Gurrea (2006) proposed three basic goals for reading digital newspapers: 1) to search for specific information; 2) to search for updated news; and 3) for leisure-entertainment (p.233). They analyzed the online newspaper readers' behavior to identify their main goals for reading news. They concluded that many readers seek specific information on a specific subject in the online newspapers, such as stock prices, sports results, and so on.

5. Incidental Exposure to Online News

Incidental exposure to online news is not a widely studied area either in mass communication or in library and information science. Tewksbury et al. (2001) recognize that there is a potential chance for readers to stumble on news when they are engaged in other online activities. They identify this behavior as incidental exposure to news. They argue that the prevalence of news on the Internet provides opportunities for people to encounter news in an incidental fashion, as a byproduct of their other online activities. They say many search engines and portals which provide information services increase the chances for incidental exposure to online news. In their later study, Tewksbury, Hals, & Bibart (2008) define the two broad forms of news exposure behaviors: selectors and browsers. Selectors' news reading behavior is characterized by "a focus on specific

content defined by individual interests and needs" (p.257). Browsers are "characterized by use of news media to obtain information on a range of topics" (p.257).

Lee(2009) also studies how incidental exposure helps readers follow the public agenda. His definition of incidental exposure to online news is based on Downs (1957) definition, which considers incidental exposure as a by-product of individuals' non-political activities and which does not cost any special effort to find. Nguyen (2008) argues that online news reading could happen unintentionally in many circumstances in the form of passive use due to the structure of media provision. He says that unintentional use could also take the form of ritualized convenience-based use of media services that are seen as having a neutral value.

According to Erdelez (2004), incidental exposure to online news could be considered a type of "opportunistic acquisition of information" (OAI). Heinström (2006) calls this behavior "incidental information acquisition" (IIA). Erdelez (2004) argues that users find interesting and useful information without the purposeful application of information searching skills and strategies. She calls these experiences, "opportunistic acquisition of information" (p.1013). In her earlier studies, Erdelez (1997) defined information encountering as "memorable experiences of accidental discovery of useful and interesting information" (p.412). She states that information encountering is one of many types of OAI.

Heinström (2006) defines "incidental information acquisition" (IIA) as acquiring (useful or interesting) information while not consciously looking for it. This definition is based on Williamson's (1998) notion of "finding information unexpectedly while

engaged in other activities" (p.24). Williamson (1998) defines "incidental information acquisition" synonymously with "accidental information discovery."

A few studies on incidental information acquisition have included some reporting about incidental news acquisition, although they were focused on different types of information. Many researchers have asserted that incidental discoveries could occur during browsing and daily monitoring activities, like newspaper reading (Erdelez, 1996; Erdelez & Rioux, 2000; Toms, 1998). Williamson (1998) argues that IIA occurs with mass media usage. She states that people not only use mass media purposefully, but they also listen to radio, watch television, read magazines, newspapers or other printed materials without the intention of locating specific information.

6. Incidental Information Acquisition (IIA) in LIS

IIA is one of the neglected areas of research of the library and information science. According to Heinström (2006), accidental retrieval of useful information is a little researched phenomenon due to the obvious difficulty in capturing serendipity. Wilson (1997) argues that the studies in information seeking ignore the fact that people frequently "discover information" while monitoring their world in an attempt to keep their "internal models up to date":

Everyone has some set of habits or routines for keeping his internal model of the world up to date...We have friends, relatives, work associates, and acquaintances to whom we talk regularly and with whom we exchange news and views. We have habits of reading and watching and listening to public vehicles of communication—newspapers, television, radio, magazines and books. These are not random, but patterned activities...[I]nformation is in part acquired because it is deliberately sought...It is also found where it is not specifically sought, as an accidental concomitant of routine activities with other purposes or as pure accident... [I]t is clear that we could describe individual patterns of information-gathering activity, both where the search for information was the primary motive

and where it was incidental....(Wilson, 1977, p.36-37)

Previous research in IIA covers the following aspects: timing, context, design of information systems, users' personal characteristics, the nature of information processing and information sources. Solomon (1997) argues that timing and context are crucial for IIA. Serendipitous information retrieval has been studied in the context of pleasure reading (Ross, 1999), everyday information seeking (Savolainen, 1995), and through libraries, seminars, media, personal networks, or the Internet (Erdelez, 1997; Erdelez & Rioux, 2000; Williamson, 1998).

Williamson (1998) has studied IIA in an ecological model of information use, where she examined information seeking in the context of the lives of the people both individually and collectively. Ross (1999) has studied incidental information acquisition in the context of reading for pleasure and emphasized the importance of the affective dimension that follows readers throughout the process. She emphasized the importance of paying attention to how readers could be engaged in constructing meaning from the text in the context of their own lives. Ross argues that serendipity is not an entirely fortuitous event. It could be an "accident when a particular text comes to the attention" of a reader, but after that readers could construct texts by foregrounding elements that address their own lives and concerns (p.796). Rice, McCreadie, & Chang (2001) argue that serendipity may not always be pure luck because people in general do not search for highly specific items, but rather look for alternatives in an uncertain and complex information environment.

A number of studies emphasize the importance of leaving some features in the design of information systems for incidental information acquisition. Koch (2001) argues

that some things should be left to chance to broaden the serendipitous results generated by information systems. Jones & Rosenfeld (1992) suggest that serendipity should serve as an appropriate tool for users to retrieve inaccessible "invisible material." Batley (1988) describes an experimental retrieval system that offers serendipitous browsing as an active search option.

Heinström (2006) explores incidental information acquisition (IIA) from a psychological perspective with a focus on whether certain personality traits, study approaches, or emotional states make students more prone to acquire valuable information by chance. Erdelez (1995) describe serendipity in two contexts of activity: browsing and environmental scanning. She identifies the four types of information encounterers: super-encounterers, encounterers, occasional encounterers and non-encounterers. Erdelez identifies the importance of the role of individual differences, cognitive styles, and personal characteristics in serendipity.

A number of studies explore the nature of information processing happening with incidental information acquisition. Serendipity in information retrieval and information seeking can be viewed as a "by-product of browsing" (Foster & Ford, 2003, p.323).

Olsen (1994) reports that serendipity was identified as important by 82% of people in her survey. Rice et al. (2001) argue that serendipitous findings of interest are one of the consequences of browsing in the library and through journals. They define three types of browsing: search browsing, general browsing, and serendipity browsing. The authors identified the four dimensions of the process: the act of scanning, the presence or absence of purpose, the specification of search outcomes or goals, and knowledge about the resource and object. Bawden (1986) defines three types of browsing: purposive,

capricious, and exploratory or semi-purposive. Ross (1999) argues that the term 'browsing' rather than searching may be used when the information need is fuzzy or the searcher is unaware of helpful sources.

7. Information Encountering (IE) Model

Erdelez (2004) has developed the Information Encountering (IE) model, which assumes that information users switch from the foreground task of finding specific information to the background interest or problem-related tasks during the information encountering process. She hypothesizes that people have a number of discrete problems related to various subjects, with different levels of specificity, urgency, and complexity. According to Erdelez, people's information needs depend on these discrete problems, making them to switch to their background problems in their minds even during active searches for information not related to those problems. Erdelez (2004) argues that a person typically attends to only one problem at a time due to the limitations of the human perceptual system engaged when seeking information.

The IE model proposes several steps that occur during IE: noticing, stopping, examining, capturing, and returning. Each step involves a combination of cognitive, affective, and behavioral processes that may be applied to the user, who does the following:

- 1. Sees information relevant to the background problem;
- 2. Interrupts the original search process to examine the encountered information;
- 3. Saves the information that is deemed to be worth saving;
- 4. Returns to the initial information search for the foreground problem. (Erdelez, 2005, p.181)

The author states that these steps are not necessarily visible in each information encountering episode and the mode of their fulfillment depends on the characteristics of the specific information environments.

8. Everyday Life Information Seeking (ELIS) Model

The ELIS model developed by Savolainen (1995) provides an overarching framework for this study, serving as a foundation upon which to place online news reading in people's everyday life information seeking context. The model provides a holistic framework for social, cultural, and psychological factors affecting information seeking behavior in an everyday life context. Savolainen (2005) argues that the source preferences and use patterns individuals select and use to solve problems or make sense of their everyday world are socially conditioned. The ELIS model suggests that the "way of life" ("order of things") and "mastery of life" ("keeping things in order") are the main factors in ELIS behavior. In this model, values, conceptions, and current phase of life affect information seeking behavior and source selection. In addition, an individual's material, social, cognitive, and cultural capital provide the basic equipment for seeking and using information (Savolainen, 2005, p.146).

The "way of life" concept is based on the sociological idea of habitus. Bourdieu (1984) argues that sociologists often forget that the objects they classify produce not only objectively classifiable practices but also classifying operations that are themselves classifiable. Sociologists differentiate social classes using the classifiable practices which agents produce and classificatory judgments they make of other agents' practices and their own. Bourdieu (1984) states that the habitus is "both the generative principle of objectively classifiable judgments and the system of classification of these

practices"(p.170). Further, he explains that the social world, including the space of lifestyles, is based on the relationship between the two capacities which define the habitus and the capacity to produce classifiable practices and works, as well as the capacity to differentiate and appreciate these practices and products (taste). Bourdieu argues that the habitus is "necessity internalized and converted into a disposition that generates meaningful practices and meaning-giving perceptions" (p.170). Swartz (1997) states that "habitus can be understood as Bourdieu's attempt to write a theory of culture as practice" (p.115). He explains that habitus emphasizes the mutually penetrating realities of individual subjectivity and societal objectivity, after the social constructionist theorists.

Savolainen (1995) interprets Bourdieu's definition of habitus as a socially and culturally determined system of thinking, perception, and evaluation, internalized by the individual. He argues that habitus is a relatively stable system of dispositions by which individuals integrate their experiences and evaluate the importance of different choices. He thinks that preference for newspapers, news channels, or websites is affected by habitus. Savolainen defined the concept of "way of life" as "order of things," based on the choices that individuals make, ultimately oriented by the factors constituting habitus (p.144). He considers various activities taking place in the daily life of people as things. These activities could be not only work related but also repetitive tasks, such as household care and hobbies. Order refers to preferences given to these work-related and non-work-related activities.

The ELIS model offers a broad context for understanding news readers' behavior in an everyday life context and a way to study incidental exposure to online news, as

news is one of the important elements of information people seek and use in their everyday lives. Therefore, the use of the ELIS model is a suitable means of placing the incidental exposure to online news into this broad range of information behavior.

The ELIS model fills the gap in media audience studies, which are mostly driven by U&G theory. For decades, U&G researchers have challenged their own model and argued for a more comprehensive theoretical grounding. Rubin (1993) argues that U&G research needs to "continue its progression from simple exposure explanations of effects and typologies of media motivation to conceptual models that explain the complexity of the media effects process" (p.103). Rubin (1986) calls for a clearer picture of the relation between media and personal channels of communication and sources of potential influence. The ELIS model brings a rich natural and macroscopic context to the understanding of media usage in a broad social and cultural context, rather than focusing only on the individual.

The ELIS model provides better context to study incidental exposure to online news, as it does not isolate this behavior from everyday life information seeking processes and media usage. Erdelez (2005) notes that "IE may enrich conceptualization of several other evolving frameworks and theories of information behavior," including the ELIS model and multiprocessing in information behavior (p.182).

9. Assumptions of This Study

First, the present study assumes that the incidental exposure to online news is one of the many different ways that people seek, find and use information in their everyday lives. People like to browse and find things by accident.

Second, it assumes online news reading is a part of people's everyday life information seeking processes. People are engaged with news both purposefully and unconsciously. Chaffee and McLeod (1973) note that the use of mass communications occurs not in isolation from the rest of a person's social life, but interwoven in "an ongoing system of reciprocal influences" (p.237). Their study demonstrates that social utility plays a major role in the type of information people select. News reading is not separated as a distinct and purposeful activity, but instead is placed among many other information seeking activities. People could read online news both in their leisure time and in work environment.

Third, this paper assumes that the Levy & Windall (1984) audience-activity approach applies to the study of the information behavior of news readers. They argue that individuals tend to display different types and amounts of activity in different communication settings and at different times in the communication process. The activity of online news readers could change at various points in their time on the Internet. Users could go through all three types of media usage (active, passive, and ritualistic) several times a day. Readers could have an intention or goal to find a specific story on the Olympics in the morning and later go to other websites to do their jobs. While readers browse different websites, such as Yahoo! (http://www.yahoo.com/) or America Online (http://www.aol.com), they could experience incidental exposure to online news by looking interesting headlines and following the links.

Fourth, the present study takes a social constructionist approach, opening the avenues to the construction of the meaning of news, online news, and incidental exposure

to online news by respondents and the researcher, taking into account the complexity of having a single definition for these concepts.

CHAPTER 3. Research Methodology

This chapter explains the research design that guides the present study of incidental exposure to online news in an everyday life information seeking (ELIS) context. The chapter describes the research methods, sampling procedures, data sources, data collection, and analysis procedures.

The research questions guiding this study are as follows:

- 1. What are the characteristics of online news reading in the context of people's everyday life information seeking behavior?
- 2. What are the characteristics of incidental exposure to online news?

The development of the research design for this study took into account the insights from previous studies on information behavior and incidental information acquisition. The research methods employed in the previous studies were diverse. Studies that tested the ELIS model used interviews (Savolainen, 1995; Savolainen & Kari, 2004; Carey R. F., McKechnie et al., (2001), written activity logs and group interviews (Agosto & Hughes-Hassell, 2005), narratives, and other qualitative methods. Savolainen's (1999) study indicates that qualitative methods (semi-structured theme interviews and narratives of critical incidents) are preferable for the study of ELIS behavior, as the analysis of the complex relationships among "way of life", "mastery of life", and information seeking requires nuanced and context-sensitive empirical data.

Incidental information acquisition studies have typically used mixed methods with surveys and interviews (Erdelez, 1995), interviews and telephone diaries (Williamson, 1998) and surveys (Heinström, 2006). Erdelez (2004) has attempted to

study "opportunistic acquisition of information" (OAI) in a controlled environment. She found that even if useful information is encountered, the urge to follow up on it may be suppressed. Heinström (2006) argues that the examination of encountered information may be more likely to be revealed in a relaxed setting.

1. Research Design

According to Creswell and Clark (2007), there are four types of mixed method design: triangulation, embedded, exploratory, and explanatory. The authors emphasize the four decisions in selecting the mixed method study: implementation, priority of quantitative and qualitative data, integration of data and theoretical perspective.

The present study utilizes explanatory and triangulation design approaches. Explanatory design uses qualitative data to build upon initial quantitative results. This design is suitable for a study when the researcher wants "to use quantitative participant characteristics to guide purposeful sampling for a qualitative phase" (Creswell & Clark, 2007, p.72). The two-phase design structure makes it more straightforward to implement because the researcher collects only one type of data at a time. Despite this advantage, the explanatory design presents challenges to researchers. The design requires a lengthy amount of time for data collection in two phases. Creswell and Clark (2007) recommend researchers decide whether to use the same individuals for both phases or to draw participants from the same population for the two phases. Researchers also need to specify guidelines for the selection of participants for the qualitative phase of the research.

Triangulation means taking the results of several forms of data collection and showing the similarities. If both quantitative and qualitative methods result in the same or similar findings, there is a stronger case that the results are valid.

The present study was conducted in two phases. In Phase I, the researcher used surveys to collect data on respondents' general news reading behavior and their self-awareness regarding incidental exposure to online news. Descriptive statistical analysis of the survey helped the researcher screen participants for in-depth interviews in Phase II. In Phase II, the researcher conducted in-depth interviews using critical incident techniques, explication interviews and think-aloud sessions with a selected number of respondents.

1.1 Phase I

1.1.1. Survey.

The main goal of the survey was to get a general understanding of media usage, online news reading behavior and respondents' self-awareness of incidental acquisition of information on the Internet, including incidental exposure to online news. The survey also served as a screening tool to select people who were aware of their incidental exposure to online news. The strength of the survey method is that it allows responses from large number of individuals (Case, 2007, p. 205). However, the survey method also lacks the ability to capture the complexity of information seeking behavior and the context of the actual use of information, necessitating a second, qualitative method to gather richer data for analysis of the studied phenomenon.

The main survey instrument for this study was a self-administered, Web-based questionnaire. A few questions were adapted from the Heinström (2006) and Nguyen

(2008) studies. All survey questions were evaluated following Fowler's (1995) criteria. Fowler (1995) emphasized the five characteristics of questions and answers fundamental to a good measurement process in survey instrument design:

- 1. Questions need to be consistently understood.
- Questions need to be consistently administered or communicated to respondents.
- 3. What constitutes an adequate answer should be consistently communicated.
- Unless measuring knowledge is the goal of the question, all respondents should have access to the information needed to answer the question accurately.
- Respondents must be willing to provide answers called for in the question.
 (p. 4)

Survey questions were designed to solicit answers to questions about respondents' general news reading behavior and their awareness of their own incidental exposure to online news. The survey had 40 questions, of which only one question was open ended and all the others were closed (see Appendix A).

The first nine questions of the survey asked the respondents about their incidental exposure to online news. Q1 asked the respondents to respond to the statement, "News can be found in unexpected contexts." The main goal of this question was to find out about the respondents' general tendency to experience incidental exposure to online news.

Five questions (Q1, Q2, Q5, Q7, Q8) were aimed at finding out about the self-awareness of respondents regarding their general tendency to experience incidental information acquisition on the Internet. Questions Q3, Q4, Q6, and Q8 (see Table 3-1)

were designed to explore the concepts of the foreground and background problems described in Erdelez (2004) study. These questions were designed to get self-reported feedback from respondents about the context of their incidental exposure to online news. The two main contexts are given as options: news reading context or non-news reading context. The second dimension in these questions was to explore search or browsing behavior with regard to background problems. Q3 was designed to explore the tendency to experience incidental exposure to online news during a browsing process in a non-news reading context. Q4 was designed to capture the tendency to experience incidental exposure to online news during the search process in a news reading context. Q6 was designed to capture the tendency to experience incidental exposure to online news during a browsing process in a news reading context. Q8 was designed to check the tendency to experience incidental exposure to online news during browsing in a non-news reading context.

Table 3-1. Design of Questions			
	Search	Browse	
News	Q4	Q6	
Non-news	Q3	Q8	

Questions Q10-Q14 covered the general questions about news reading. Q10 asked the respondents how often they read online news. Q11 asked the respondents to rank the information sources in the order of their importance in their daily news consumption. Q12 asked the respondents to type the name of their top five favorite online news sources. Q13 asked the respondents about how much attention they pay to news events in general. Q14 asked the respondents about the reasons for reading news. Q15 asked the respondents about the devices they use to read news.

Questions Q16-Q31 asked the respondents about their online news reading behavior. Demographic data collection from each respondent formed the final part of the questionnaire (Q32-Q37). Q38-Q41 asked the respondents about their computer and Internet skills and the frequency of their use of computers and the Internet.

1.1.2. Sampling.

The researcher used purposeful and convenience sampling for this study. The main purpose for sampling was to find people who read news online. As Patton (2002) has stated, "the logic and power of purposeful sampling derive from the emphasis on indepth understanding" and lead to selecting "information rich" cases (p.46). To select information-rich cases for this study, the participants were recruited through the website of the Columbia Missourian newspaper, a local newspaper run by the University of Missouri School of Journalism in Columbia, Missouri. The assumption behind this sampling strategy was that people coming to visit this website would more likely be online news readers in general. According to the State of the News Media: Annual Report on American Journalism (2007), the heaviest use of online news continues to be happening at more established, traditional sites of newspapers and television outlets despite the fact that the places Americans visit online remain varied and vast in number. This way, it was easier to find the group of people who could share their experiences of reading news online and their incidental exposure to online news. This initial sampling strategy was slightly changed during the qualitative data collection. In order to explore the phenomenon of incidental exposure to online news more deeply, the researcher decided to expand the initial sampling strategy beyond the local newspaper's website.

This additional arrangement will be explained later in Section 1.2.3. Selection of interview respondents.

1.1.3. Pilot test.

Prior to real data collection, the researcher conducted a pilot test of the survey and interview instruments. This test also aimed to test the think-aloud session with Morae Recorder 3.0, a special software which captures all interactions of the user with computer, including audio, video, facial expression, and keystrokes. All pretest sessions were conducted at the Information Experience Lab (IE Lab), a user experience research laboratory at the University of Missouri. First, the respondents were asked to fill in online surveys on the computer screen the intended way. All their interactions with the computers and their experiences with filling in the survey were recorded with the Morae Recorder. Their experiences were remotely observed by the researcher from the control room. Second, after the respondents completed the online survey, they were interviewed about their experience filling in the survey. They were asked to return to the questions and discuss their understanding of the questions posed and their responses.

Fowler (1995) discusses intensive individual interviews to pretest survey questions, arguing that researchers need to look at several different techniques for discussion with respondents:

- 1. Asking respondents to paraphrase their understanding of the question;
- 2. Asking respondents to define terms;
- 3. Asking them for any uncertainties or confusions they had about what the appropriate answer was;
- 4. Asking them how confident they are that they can give an accurate answer;
- 5. If the question called for a numerical figure, asking respondents how they arrived at the number; if a question calls for a rating task, asking them to talk about the process they went through to decide on the answer. (p. 112)

The respondents reflected back on their problems understanding the survey questions and their general impressions of the survey structure and navigation. The interview sessions were also recorded with Morae Recorder.

Both the survey and interview instruments were revised after the pilot test with nine subjects. The Likert scales of several survey questions and questions about incidental exposure to online news received much feedback from respondents during the pretest.

1.1.4. Survey data collection.

The survey questionnaire was entered in Survey Monkey

(www.surveymonkey.com), a Web-based survey tool. Case (2007) has stated that

responding to online surveys can be "quite easy" if they do not require much typing

(p.207). The *Columbia Missourian* newspaper placed a banner advertisement (see

Appendix B) to recruit participants on two of the main pages of its website: one on the

home page (http://www.columbiamissourian.com/) and the second one on the News

section home page (http://www.columbiamissourian.com/stories/news/). The banners

were placed on these pages from March 2 to April 15, 2009. In order to increase the

response rate to the Web survey, the researcher offered a coupon for a free cup of coffee

at Kaldi's, a local coffee shop, for the first 100 survey respondents. Toward the end of the

survey data collection, the researcher used additional recruitment techniques to increase

the response rate. The total number of valid responses obtained in the period of data

collection was 148 questionnaires.

1.1.5. Survey data analysis.

The researcher imported data collected by Survey Monkey into Excel, then manually adjusted the formatting problems of Survey Monkey, deleted unnecessary columns, renamed the variables to analyze them further and entered the reformatted data into SPSS for analysis.

A simple analysis of survey data started during the data-collection process to screen the potential candidates for the interview sessions. The researcher used the built-in function of Survey Monkey to select survey respondents by different criteria. First, the respondents who agreed to participate in the interview process were selected. Second, the respondents were selected with additional criteria, including their responses on incidental exposure to online news questions, top five online sources, gender, family income, education level and so forth. The reason for this selection strategy will be explained in Section 1.2.3. Selection of interview respondents.

At the end of the survey data collection, the researcher conducted a descriptive data analysis to answer the first research question, with the aim of exploring the general news reading behavior of people in their everyday life media usage context.

1.2. Phase II

1.2.1. Interview instrument.

A list of primary questions was developed to direct the interviewing process (see Appendix C). The interview questions were tied to the research questions of the study, with the goal of exploring the online news reading behavior of respondents in an ELIS context and revealing the nature of incidental information acquisition in the context of online news reading. Some interview questions related to incidental exposure to online news were based on Erdelez's (1995) study.

The ambiguous nature of incidental exposure to online news, which usually occurs on an unconscious level, was a big obstacle for this study. Many respondents admitted that they did not think about or notice their behavior concerning incidental exposure to online news until the researcher asked them to recall their most recent experience. Constructive interviews helped the researcher to continue to interview and probe with more questions until the respondents started talking about their exposure to online news based on their perceptions.

1.2.2. Interview procedure.

Qualitative data collection with 20 respondents took place from April 14 to May 15, 2009. All interview sessions, except two, took place in the Information Experience Laboratory (IE Lab). To suit the needs of the respondents, two of the interview sessions were conducted at the home and the office of the respective interview respondents.

Dexter (1970) defined an interview as a conversation with a purpose. According to Lincoln & Guba (1985), the degree of the interview structure may be categorized as either structured or unstructured. The structured type is often referred as a "focused" interview, and the latter as a "depth," "clinical," "elite," "specialized," or "exploratory" interview. In a structured interview, the interviewer knows what he or she does not know and can frame the appropriate questions to find out. In an unstructured interview, the interviewer does not know what he or she does not know and must rely on the respondent to tell him or her. Unstructured interviews were used in this study because of the complicated nature of studying incidental exposure to online news. The interview data

collection involved the following steps: deciding whom to interview; preparing for the interview; making an initial start; pacing the interview and keeping it productive; terminating the interview; and gaining closure. The interview was terminated in the following situations: when the researcher felt it was productive enough, when information collected seemed to be redundant, or when both interviewer and respondent displayed fatigue. All interviews were recorded with Morae Recorder 3.0 and a digital audio recorder. The researcher also took short notes during interviews to capture the key points. Notetaking helped to focus the interviews, to serve as a backup in the case of recorder failure, and to act as a preliminary index to the recorded file itself. The researcher wrote all important observations and thoughts after each interview session in a research journal immediately following the data collection.

The interview sessions used the critical incident technique with the explication interview method and think-aloud method. The researcher asked respondents to introduce themselves in the beginning of the interview. Then they were asked to recall their most recent experiences of incidental exposure to online news. The critical incident technique and the explication interview were employed at this stage of the interview to facilitate respondents' retrospective thinking about their experiences.

The critical incident technique was developed by Flanagan from work in the U.S. Army Air Forces Aviation Psychology Program (1954). It is considered to be a flexible set of principles that can be modified for the situation under study. The explication interviewing technique was developed by Vermersch (1994) in France. According to Urquhart et al. (2003), the explication technique offers a verbalization of activity. This technique draws on Piaget's theory of how experience is processed into reflection,

seeking to help people progress from a prereflected to a reflected experience, which is relevant for studying incidental exposure to online news. Urquhart et al. (2003) suggest that with the explication technique interviewees should enter a state of evocation, so that they are "reliving" an example of the activity under investigation (p.66). Then, the interviewer should press them to provide more details and insights about their experience. Urquhart et al. (2003) think that "the ability of the interviewer to establish and maintain a state of evocation in the interview is essential to the success of the explication interview" (p.67).

The interviewer tried to sense an evocative state, which is not an unusual state but has particular characteristics, and to understand, recognize, and to inspire this state. The researcher looked for certain cues in the behavior of interviewee. In most cases, the gaze of a respondent revealed whether that respondent was in an evocation state. To foster the evocation state, the researcher sat beside the respondent in each interview. Urquhart (2003) recommends interviewers not to sit directly opposite the interviewees because this posture interferes with the ability of the interviewees to stare into space. Thus an interviewee might return the gaze to the other person and his or her thoughts to the present. The researcher tried to foster an environment in which evocation is dominant, considering the possibility that evocation might not be "sustained throughout an interview" (Urquhart, 2003, p.68). If respondents interrupted themselves with sudden failures to recall, the researcher rephrased and repeated the questions later. Urquhart (2003) recommends interviewers use reassurances like following: "No problem, just tell me which type of impressions come back" or "It doesn't matter. Just tell me what you can remember" (p.69). In some cases, summarization of what had been said before

allowed respondents to resume their positions and continue. Most respondents did not have much of a problem recalling their experiences of incidental exposure to online news during the interview process. Some of them shared more than one case of incidental exposure to online news.

The wording of the interview questions asking respondents about their behavior related to exposure to online news was very important. The researcher used different words to describe incidental exposure to online news to respondents. The questions were gradually modified from the first interviews to the last interviews. It was challenging to conduct interviews with the first few respondents. In the beginning, respondents were asked to share about their "most recent" or "most memorable" experiences of finding "unexpected news" on the Internet. Starting from the fourth and fifth interviews, the researcher started asking respondents to share their experiences of getting exposed to news online unintentionally. In most cases, it took a certain amount of time to reach the same level of understanding of what was meant by "incidental exposure to online news." The researcher allowed the respondents to describe their online news reading behavior and their experiences of exposure to online news based on their perceptions.

The researcher applied the think-aloud method during the interview sessions. This method has traditionally been used as a psychological research method but has increasingly been used for the practical evaluation of human-computer interfaces (Nielsen , 1993, p.195). A think-aloud test involves having a test subject use the system while continuously thinking out loud. The strength of the think-aloud method is the wealth of qualitative data it can collect from a fairly small number of users.

The initial goal of using think-aloud sessions was to capture respondents' incidental exposure to online news in real time during the interview. However, during think-aloud sessions it seemed to be unnatural to expect people to experience and notice incidental exposure to online news since it was almost forcing them to think about this complicated behavior consciously. There were only a few cases, when respondents reported that they experienced incidental exposure to some interesting news online during think-aloud sessions. On the other hand, think- aloud sessions brought much more richness to exploring the online news reading behavior of respondents in general.

The basic interview plan called for a think-aloud session in the second half of the interview. However, it was difficult to follow this type of strict interview protocol. The researcher had to be flexible enough to apply the different techniques (critical incident, explication interview, and think-aloud session) in different stages of the interview, depending on the context, to get a better understanding of the respondents' online news reading behavior and their experience with incidental exposure to online news.

It was very helpful to have a laptop with an Internet connection and the Morae Recorder in front of the respondent from the starting point of the interview and even during the process with critical incident technique. In many cases, the think-aloud session started immediately when the researcher wanted to get a better understanding about the online news reading behavior of respondents and their experience of incidental exposure to online news. The think-aloud session was also started at any point of the interview when a respondent wanted to show what he or she was describing. In many cases, the respondents provided very detailed pictures of what exactly they were doing on the Internet, which buttons they were clicking, and so on. Think-aloud sessions allowed for

the capture of nuanced pictures of the respondents' experiences of incidental exposure to online news and their online news reading behaviors.

1.2.3. Selection of interview respondents.

The researcher used Survey Monkey's built-in function to select the respondents who agreed to participate in the second phase of the study. Then, the following procedure was applied to select the respondents for the interview sessions:

First, the researcher looked at the scores of the survey questions related to the respondents' self-awareness of incidental exposure to online news (Q3, Q4, Q6, and Q8). Most respondents chose answers on the higher end of the Likert scale, which made it difficult to use this question as the main screening tool for interview respondents. Higher scores chosen for these questions meant that the majority of survey respondents stated that they experienced incidental exposure to online news "very often" or "often." Although the most responses were on these higher ends, the researcher decided to select the respondents alternating those who chose "very often" with those who selected "often." The researcher also paid attention to the context of incidental exposure to online news reported in the given questions: news reading or non-news reading context.

After first four interviews, the researcher felt saturation in the respondents' responses about their incidental exposures to online news. During and after these first four interviews, the researcher realized that these respondents were mostly loyal newspaper readers, who followed a specific routine of checking newspaper websites on a daily basis. They were mostly ritualistic news readers and reported that they experienced incidental exposure to online news during their news reading on traditional news sites.

The only change in their behavior seemed to be the medium used for news reading.

Instead of traditional newspapers, these respondents read online versions of these newspapers every day. They did not talk much about other experiences of finding news unintentionally on the Internet except when reading online newspapers. In other words, their perception of incidental exposure to online news was described in the context of news reading. All four respondents said that they experienced incidental exposure to online news every day.

The original goal of selecting respondents based on their overall experience of incidental exposure to online news did not seem to be a good criterion to select the interview respondents because it was obvious that incidental exposure to online news was prevalent for all respondents. The researcher did not see much difference in the interview responses of respondents about their experience of incidental exposure to online news even though there was a slight difference in their survey responses about their incidental exposure.

Based on the pilot study with nine respondents, the researcher sensed that there should be a different group of people whose perception of incidental exposure to online news is described in non-news reading context. Therefore, the researcher decided to use different selection criteria to screen the interview respondents further.

The response to the survey question about the top five online news sources was chosen as the next criterion to screen the interview respondents with the assumption that preferred online news sources might bring a different context for incidental exposure to online news. The initial analysis of the top five online news sources preferred by survey respondents presented the two patterns: traditional news sources (*New York Times*, *Washington Post*, local newspapers) and alternative news sources (Digg

[http://digg.com/], Boing Boing [http://boingboing.net/], and so on). The selection of the interview respondents aimed to alternate the respondents based on these two types of sources with the assumption that those who mostly use the alternative sources might have different experience of incidental exposure to online news. In addition, the researcher attempted to select the respondents from different demographic groups, using the following criteria: age, gender, ethnicity, education, and so forth.

To enrich the data as much as possible, the researcher also decided to expand the sampling beyond the main recruitment, which relied on the random click-to-Web-survey from the local newspaper's website. E-mail invitation messages were sent through several mailing lists on April 8, 2009, a week before the closing of the Web survey: one maintained by the College of Education at the University of Missouri, one for the parents' group at the Child Development Laboratory for the university, and one that serves as a local company's internal mailing list.

The interview sessions with respondents coming to the survey through the mailing lists revealed that these respondents had much broader definitions of news. Interviewing several respondents from this group, the researcher sensed saturation with their online news reading behavior and incidental exposure to online news. Their experiences of incidental exposure to online news seemed to be quite different from the experiences of the news readers going to the local newspaper's website. Their perceptions of incidental exposure to online news were described in different contexts: e-mail, non-news sites, mostly on professionally oriented information sites or professional social-networking sites. Most of these respondents said that they do not trust the media and look for alternative views on different websites.

Toward the end of the interview data collection, the researcher sensed a saturation with responses of respondents recruited beyond the random clicks on the original recruitment banner on the local newspaper's website. Therefore, she decided to interview a few more respondents who came to the Web survey through the local newspaper's website.

Qualitative data collection was finished when saturation of data happened based on the responses of interviewees about their experiences of incidental exposure to online news in an online news reading context. Glaser and Strauss (1967) characterized this point as one of theoretical saturation, which refers to the (non)emergence of new properties, categories, or relationships. Once the body of data no longer offers any new distinctions of conceptual import, categories could be described as "saturated" and no further evidence need be collected (Dey, 1999, p.8).

1.2.4. Qualitative data analysis.

Qualitative data from the 20 interviews, including think-aloud sessions, were fully transcribed electronically through a professional transcription service. All transcripts were imported to *QSR NVivo 8.0*, a qualitative data analysis software package.

The main goal of the qualitative data analysis was to find the emergent themes relevant to the two main research questions aimed at exploring online news reading behavior and incidental exposure to online news within the frameworks of the Everyday Life Information Seeking (ELIS) model and the Information Encountering (IE) model.

The researcher employed both inductive and deductive analyses in the qualitative data analysis process. The main concepts from the ELIS model and IE model were used

in the deductive analysis process. The grounded-theory approach was used to analyze qualitative data by means of the inductive analysis. Strauss & Corbin (1998) provide a framework, commonly referred to as grounded theory, of coding procedures for rigorously analyzing large amounts of raw qualitative data. The purpose of their methodology is not to test theory, but rather to generate theory based on descriptive and interpretative analysis of data. However, the grounded theory approach used for analytical purposes in this study does not strictly follow that definition. This study's methodology relies on the constant comparative method of analysis (Glaser & Strauss, 1967), which helps the researcher avoid the dangers of waiting until the very end to analyze data, including discovering a lack of data, an inability to investigate emergent findings, or an inability to resolve conflicting data.

The qualitative data analysis consisted of the following seven steps (Appendix D).

In Step 1, the researcher took notes during the interview process and immediately after each interview session with the following purposes:

- To capture the first impressions and initial analysis of the interview session;
- To modify the next interview questions on online news reading behavior and incidental exposure to online news based on each interview;
- To fix any problems with data collection methods and technology;
- To select the next respondents carefully.

In Step 2, a more detailed reading and analysis of interviews was conducted after the interviews were transcribed fully. The researcher read the transcript of each interview in the paper format several times before entering and coding it in NVivo. Open coding was used to code the interviews based on the concepts from the ELIS and IE models. The

main interview questions were also used to code the interview transcripts. The researcher also looked for the emerging themes and included them in the coding table. As an outcome of this step, the initial coding table was created. The initial strategies for coding information to nodes were developed. The coding process started on the paper copy of the interview transcripts. The observation analysis of both the interview content and coding process was documented.

In Step 3, the interview transcripts were imported into NVivo. The researcher read the transcripts again to code in NVivo. At this stage, open coding, axial coding, and constant comparison techniques were employed for the analysis process. The researcher coded each interview transcript with the existing and emerging codes. The coding table was revised constantly. Construction of the list of nodes began with the key questions from the sessions and was supplemented by other themes as they emerged from the data.

Corbin & Strauss (2008) have described "constant comparison" as the process of comparing each incident in the data is with other "incidents for similarities and differences" (p.73). Individual incidents were coded in NVivo as "free nodes," and categorizing strategies were used to group the data into meaningful categories through inductive analysis. As the analysis proceeded, incidents that seemed to be conceptually similar were grouped together under a higher level descriptive concept and groups of related incidents were clustered into tree nodes. For example, the eight facets were created for the underlying needs of news encountering, such as "values," "sense of community," "work needs," "critical needs," "followup," "curiosity," "social needs," and "emotional connection." The nodes listed in Appendix E are the broad themes of the study. In addition to open and axial coding processes, the researcher analyzed critical

incident cases separately to get a better sense about respondents' incidental exposure to online news.

Sonnenwald 's (1999) information horizon method was applied to analyze the news channel source preferences for each respondent. All news channels used by the respondents were presented in the table and given numbers according to their priority in respondents' everyday life media usage.

In Step 4, the researcher reanalyzed all interview transcripts in NVivo with axial coding for the second-round analysis. This time, the goal of the analysis was to check the consistency of coding carefully. All free and tree nodes were checked. The researcher double checked all nodes and fixed any problems with the previous coding. Multiple techniques were used for checking consistency in coding. The researcher looked at the time stamps for adding new nodes and making changes in them. The charts of nodes (see Appendix F) in NVivo were analyzed for each interview to compare the number of nodes visually.

It was important to code the interviews analyzed earlier with the emerged codes from the later analysis process. The researcher applied the latest coding decisions to all interviews analyzed in the beginning stage of previous phases. At this stage, some free nodes were converted to tree nodes. Information in critical-incident case analyses and in the information horizon table of news channels was double checked and some minor problems were corrected.

In Step 5, all free and tree nodes were analyzed individually with axial coding.

The most important nodes directly related to the main research questions were selected for further analysis. Each node was analyzed and some nodes were collapsed to bigger

concepts. The main outcome of this stage was the finalized list of the nodes pertinent to the main research questions.

In Step 6, the researcher carefully analyzed the list of nodes directly related to the research questions with axial coding. To ensure the consistency in coding, the researcher used the NVivo functions comparing the chart graphs before and after axial coding.

During this axial coding process, irrelevant parts of the interview transcripts were uncoded and the missing parts were coded to the appropriate nodes. The goal for this analysis was to check and see if all interviews were coded with important nodes. At the same time, the researcher made sure that earlier interviews were coded with the emerging themes.

In Step 7, all important nodes were analyzed on the textual level to reach the main goal of this study.

1.3 Research quality

Validity and reliability for both quantitative and qualitative research should be considered in a mixed method study. Creswell and Clark (2007) define validity in a mixed method study "as the ability of the researcher to draw meaningful and accurate conclusions from all the data in the study" (p.146).

In quantitative research, "validity means that the researcher can draw meaningful inferences from the results to a population" (Creswell and Clark, 2007, p. 135).

Reliability means that scores received from participants are consistent and stable over time. Three traditional forms of validity in quantitative studies are as follows: content validity (i.e., Do the items measure the content they were intended to measure?), predictive or concurrent validity (i.e., Do scores predict a criterion measure?), and

construct validity (i.e., Do items measure hypothetical constructs or concepts?) (Creswell, 2003). The pilot testing with nine respondents established the content validity of the survey instrument and allowed for improvements in the questions, format, and scales. Triangulation with the interview data was used to secure an in-depth understanding of the online news reading behavior of respondents and their experience of incidental exposure to online news and to provide richness to the whole.

To ensure qualitative research quality, the researcher made many efforts to check the accuracy of collected data. Creswell and Clark (2007) state that checking for qualitative validity means assessing whether information obtained through qualitative data collection is accurate. To ensure the accuracy and trustworthiness of interview data, member checking was used. Summaries of the findings were checked back with the key participants in the study, asking them whether the findings were an accurate reflection of their experiences. Member checking is an important step for constructivist studies in getting feedback from interviewees on the construction of meaning by the researcher. The main task of member checking is "to obtain confirmation that the report has captured the data as constructed by the informants, or to correct, amend, or extend it" and "to establish the credibility of the case" (Lincoln & Guba, 1985, p. 236).

Wolcott (1975) notes that the researcher is the "principal instrument" in qualitative studies. As such, a grounded theory researcher accepts certain responsibilities in the interpretive role (Strauss & Corbin, 1994). These responsibilities include the following:

1. Giving "voice" to subjects' stories;

- 2. Sharing what the researcher learned with his/her subjects, his/her disciplinary field, and the larger world
- 3. Giving clear indicators as to why the researcher interprets the collected data as he/she does.

Williams (1986) asserts that researchers must be sensitive interviewers and perceptive observers who are able to take rich field notes, who can communicate well, and who are aware of their own biases. Furthermore, researchers need to be willing to acknowledge their predispositions and be willing to study themselves to uncover the influence of their biases as they study phenomena. In many cases of the complicated discussion about incidental exposure to online news and the online news reading behavior of respondents, the researcher shared her own predispositions with the respondents to get better idea about their responses. The researcher paraphrased the key points of the respondents' responses during the interview process, clarified unclear parts, and conducted accuracy checking of the obtained information. All of these detailed conversations were written in a research journal immediately after the interview sessions. These reflective thoughts affected the following interviews.

For research quality, triangulation of the data was conducted between quantitative and qualitative data. Any data collected via the interviews was compared with the survey data to see the similarities and differences between them (see Appendix G). The critical incident stories and the news source preferences were confirmed by the interview data about the respondents' general tendency to experience incidental exposure to online news and their online news reading behavior.

Creswell and Clark (2007) caution researchers about additional potential threats to validity issues in mixed method studies. They identify several potential threats to the validity of sequential mixed method design, as applied in the present study. First, they stipulate that the researcher has to decide whether to select the "same or different individuals for the qualitative and quantitative data collection" (Creswell & Clark, 2007, p.148). In an explanatory design, this threat can be minimized by selecting the same individuals for both phases of the study. In this study, respondents for the qualitative study were selected from the pool of survey respondents, who agreed to participate in the second phase. Second, they note that using the same sample sizes for the qualitative and quantitative data collection could affect the research quality. This threat was reduced by using larger sample for quantitative phase and smaller sample size for qualitative data collection. Third, they advise that the instruments should be designed without "psychometric" properties, which mean validity and reliability properties (Creswell & Clark, 2007, p.148). Both survey and interview instruments were tested with nine respondents prior to real data collection. The instruments were refined based on their feedback. The interview questions were rephrased in the multiple ways to ensure content validity.

The researcher was cautious about the potential impact of the big news events on the respondents' reporting about their incidental exposure to online news, as the present study is exploring the live phenomenon of how people react to constantly changing news events. Therefore, it was hard to predict how world events, such as an ongoing economic crises, natural disasters, or any other emergent news would have an impact on the reported experience of incidental exposure to online news by respondents. To improve

the quality of research, the researcher tried to schedule all interviews within a short period of time. The researcher paid close attention to general news events happening before and during the data collection. The researcher was alert to the potential impact of the big news events in the critical incident stories about incidental exposure to online news described by interview respondents.

1.4 Potential ethical issues

The researcher followed all research procedure in dealing with human subjects in both phases of the present study. The Institutional Review Board (IRB) approval was sought from the University of Missouri Columbia Campus IRB Review Board. Informed consent forms for survey, interview and think-aloud sessions ensured the confidentiality of all respondents. All identifiable information was removed for the respondents to secure their confidentiality.

CHAPTER 4. Findings

This chapter presents the study findings according to the stages of data collection and the sources of data. The first part of this chapter presents findings from Phase I (Web survey), including a description of the survey respondents based on the frequency distributions analysis in SPSS. The body of data collected from the Web questionnaire offers insights into the respondents' attitudes toward general news, their news sources, and their news reading habits. Part of the Web questionnaire provides information about the respondents' self-awareness regarding their incidental exposure to online news.

The second half of this chapter covers findings from Phase II (interviews) pertinent to the research questions. Phase II findings include a description of the interview respondents, a description of major themes drawn from the interview data in NVivo, and a presentation of the qualitative data around the research questions and emerging themes.

The research questions that guided this study are as follows:

RQ1. What are the characteristics of online news reading in the context of people's everyday life information seeking behavior?

RQ2. What are the characteristics of incidental exposure to online news?

The first research question aimed to explore general news reading behavior and to see where online news reading fits in an everyday life information seeking context.

The second research question is intended to explore the phenomenon of incidental exposure to online news from a holistic perspective, covering social, behavioral,

cognitive, and affective characteristics. In addition, the researcher attempted to apply the Information Encountering (IE) model to investigate incidental exposure to online news.

The study investigated the following subquestions:

- How do people get incidentally exposed to unexpected news stories online?
- How much they are aware of incidental exposure to online news?
- Where do they experience incidental exposure to online news (online media sites, non-media sites, search processes, browsing, social networking, or in the physical world)?
- How does incidental exposure to online news happen? Where is the starting point? Does the initial interest in the topic start in the physical or virtual world?
- What types of news do they find incidentally?
- What is the connection between the incidentally exposed news content and the readers' underlying needs or problems? What causes them to follow links with incidental exposure?
- What are their value judgments for the news items they are exposed to incidentally?
- How do they feel about incidental exposure to online news?

1. Quantitative Findings

This part reports the findings from the Web survey. The percentage reported is based on the valid percentage. The number of missing values varied from question to question. Therefore, they were not removed from the data. The number of missing values is presented in the tables with the label "missing values." Percentage and frequencies are

not repeated often to avoid redundancy in description of quantitative findings. The exact survey questions are presented in the tables to make it clear what was asked of the respondents. It should be noted here that the quantitative findings of this study are not generalizable because of the exploratory nature of the study and sampling procedure. Recruitment of the survey respondents through a website of a local newspaper, affiliated with one of the most prestigious journalism schools in the country, skewed the sample to highly educated and dominantly white respondents.

1.1. Demographics of survey respondents

The Web survey collected responses from 146 respondents. The questions in the survey asked the respondents about their demographics.

The majority of the interview respondents (67%) were over the age of 31. About 23% of them were over the age 51 and only 2% of were under the age of 20 (see Table 4-1).

Table 4-1. Age Groups of Interview Respondents

<u>U</u>			
Age Group	Frequency	Percent	Valid Percent
Under 20	3	2	2
20-25	23	16	17
26-30	18	12	14
31-35	16	11	12
36-40	20	14	15
41-45	13	9	10
46-50	9	6	7
Above 51	31	21	23
Missing values	13	9	
Total	146	100	100

The majority of the respondents (60%) were female, while 40 % of survey respondents were male.

Table 4-2. Ethnicity of Survey Respondents

Q34. How would you	describe your i	ace/ethnicity?		
Ethnicity	Frequency	Percent	Valid Percent	Cumulative
				Percent
White	99	68	74	74
African American	4	3	3	77
Hispanic	7	5	5	82
Asian American	12	8	9	91
Other	12	8	9	100
Total	134	92	100	
Missing values	12	8		
Total	146	100		

As presented in Table 4-2, the majority of the respondents (74%) were White followed by Asian American (9%). Responses in the Other group included international students, visitors, and those respondents who described themselves as having a mixed ethnic heritage. About 5% of respondents chose Hispanic, and 3% of them stated they were African American.

In terms of household income, half of the respondents reported that their household income is over \$50,000. Only 18% of respondents said their household earns less than \$20,000 (see Table 4-3).

Table 4-3. Household Income of Survey Respondents

Q35. Which of the following categories is closest to your TOTAL HOUSEHOLD's income for the past year?

USD	Frequency	Percent	Valid Percent	Cumulative
				Percent
less than 10000	11	7	8	8
10000 to 20000	13	9	10	18
20000 to 30000	18	12	14	32
30000 to 50000	25	17	19	51
50000 to 100000	43	30	33	83
more than 100000	22	15	17	100
Total	132	90	100	
Missing values	14	10		
Total	146	100		

1.2. Education

The majority of the respondents (52%) reported that they have graduate or professional degrees, followed by 19% with four-year college degrees, and 18% with some college-level education. About 10% of respondents reported that they have some graduate work and 2% have a high school education (see Table 4-4).

Table 4-4. Education of Survey Respondents

Q36. What is your highest level of completed education?				
Education level	Frequency	Percent	Valid Percent	Cumulative
				Percent
High school	2	1	2	2
Some college	24	16	18	20
Four year college	25	17	19	38
Some graduate work	13	9	10	48
Graduate or	70	48	52	100
professional degree	70	40	32	100
Total	134	92	100	
Missing values	12	8		
Total	146	100		

1.3. Number of days respondents read news

Q37 asked the survey respondents about how many days they read online news in an average week. The majority of the respondents (51%) said they read news daily, followed by 15% who read news five days a week. About 12% of survey respondents said they read news six days a week. About 9% of them reported four days a week and 8% said three days a week. Only 5% of the respondents reported that they read news two days a week and 2% chose one day a week.

1.4. Sources used for news reading

The Internet appears to be the dominant source for news reported by the survey respondents (see Table 4-5). All respondents who selected this option were divided

between "always" and "sometimes." About 73% of respondents reported that they "always" use the Internet to get informed about news events and 27% chose "sometimes." Friends were reported as the second prominent source to get informed about news events. About 59% of respondents to this question said they "sometimes" get informed about news events from their friends. Radio appeared to be the next important news source for respondents. About 34% of respondents said they always use radio to get informed about news.

Table 4-5. News Sources Q11. Please mark how often do you use the following sources to get informed about news events. Always Sometimes Rarely Never Response count Print 24 37 32 8 137 newspapers Print 10 43 39 8 134 magazines TV32 43 17 8 137 Radio 34 37 22 8 134 Internet 73 27 139 Friends 15 59 22 4 136

1.5. Devices used for news reading

Q15 asked the respondents which devices they use to read news online. Respondents had the option to choose all applicable answers. The majority of the respondents stated that they use their laptops, office computers and home computers for news reading. About 69 % of respondents said they use laptops to read news online (see Table 4-6), while 53% of respondents stated that they use office computers and 43% of them read news on their home computers. About 15% of respondents reported that they read news on their cell phones.

Table 4-6. Devices Used for News Reading

Q15. Which device(s) do you use to read online news?		
	Percentage	
Laptop	69	
Office computer	53	
Home computer	43	
Cell phone	15	
PDA	6	
Public library computer	8	
Other	6	

1.6. Online news reading behavior of respondents

The survey questions asked the respondents to indicate how often they engaged in online news related activities. The findings of this part are presented in Table 4-7, with slight changes in the questions asked. The combined percentage of the responses "very often" and "often" indicate that reading related news stories was the top choice for respondents. Of survey respondents, 61% stated that they click on links to related stories for in-depth coverage "very often" or "often," and 60% of the respondents stated that they often get updated news from the Internet. In response to the prompt, "I use search tools to find news of my interest," 55% of the respondents chose "very often" or "often." When asked if they visit a number of websites for the same news item, 45% of the respondents chose the responses "very often" and "often." On the lower end of the Likert scale, the combined percentage for "rarely" or "never" shows that 74% of the respondents stated that they do not subscribe to Really Simple Syndication (RSS) to get news. Likewise, 58% of the respondents reported that they never subscribe to RSS, and 51% of the respondents indicated that they never subscribe to free e-mail alerts of general news. With the combined percentage of responses "rarely" and "never," 72% of the respondents

stated that they do not express their opinions on social networking sites, such as Facebook, MySpace, or others.

Of the respondents, 49% indicated that they never personalize their news pages, and 49% of the respondents also stated that they never set up news websites as their homepage. Likewise, 39% of the respondents reported that they never receive audio news on the Internet in addition to reading.

Table 4-7. Online News Related Activities

Online News Reading	***				
Ways to Read Online News	Very	Fairly often	Occasionally	Rarely	Never
E-mail alerts of general	often 7	10	12	20	51
news					
E-mail news alerts related to their interests only	7	17	22	23	33
Personalized news page	13	9	12	17	49
Setting up favorite news home page	28	5	5	13	49
Using search tools for news of own interest.	25	30	29	12	4
Updated news from the Internet several times a day.	30	30	21	7	13
Visiting a number of sites for the same news item	18	27	29	24	2
Audio news on the Internet	6	9	20	26	39
Video news on the Internet	8	13	38	26	14
Reading related stories	19	42	34	5	-
Online news polls	4	8	30	32	25
Using alternative sources	12	21	40	23	5
Opinions on social networking sites	5	3	20	25	47
Receiving links to news stories from my friends	12	21	40	21	7
Reading blogs	19	16	28	27	10
Subscribing to RSS	13	6	8	16	58

The majority of the survey respondents (90%) indicated that they pay "a lot of attention" or "some attention" to news (see Table 4-8).

Table 4-8. Attention Given to News

Q3. How much attention do yo news?	u generally pay to
	Percentage
A lot of attention	45
Some attention	45
Only a little attention	9
No attention to all	1
Total	100

1.7. Incidental exposure to online news

The nine questions in the survey asked the respondents about their awareness of incidental exposure to online news and information in general.

The survey question Q1 asked the respondents to respond to the prompt: "News can be found in unexpected contexts." Of the respondents, 27% chose "very often," 48% of them "fairly often," and 12% of them "occasionally."

The majority of the survey respondents indicated that incidental exposure to online news is their typical behavior to get informed about the news events. Of the respondents, 75% said they "very" or "fairly" often come across interesting news stories online when they browse the Internet for other purposes than news reading (see Table 4-9). Of the respondents, 78% reported that they find interesting news stories at times when they browse the news websites without specific goals in mind.

Table 4-9. Incidental Exposure to Information and News on the Internet

_	dency to Encounter Information					
Q	Questions	Very	Fairly	Occasionally	Rarely	Never
02	I mun into intomostino	often 37	often 40	20	2	
Q2	I run into interesting information on the Internet	31	40	20	2	-
	when I am not consciously					
	looking for the given topic.					
Q3	•	37	38	21	4	-
	news stories online when I					
	browse the Internet for other purposes than news reading.					
	purposes than news reading.					
Q4	I find interesting news stories	36	42	18	3	1
	at times when I browse the					
	news websites without a					
	specific goal in the mind.					
Q5	I come across useful	25	40	27	8	1
	information when I am not					
	looking for it.					
06	I run into news stories on	28	37	26	8	1
Q6	different topics when I search	20	31	20	0	1
	the Internet for news stories					
	on a specific topic.					
o -		1.0			_	
Q7	I click on different links on the websites and find	18	41	37	5	-
	interesting information					
	unexpectedly.					
	1 •					
Q8	I come across unexpected	17	40	31	12	1
	news stories when I search the					
	Internet for non-news related information.					
	miormanon.					

2. Qualitative Findings

This part presents findings from the qualitative part of the present study. Findings are incorporated from critical incident cases, think-aloud sessions, and general interviews.

2.1. Background information about the interview respondents

In the beginning of each interview session, the researcher asked the respondents to introduce themselves, in order to get detailed information about their work, hobbies, lifestyle, and technology skills. The detailed description of all interview respondents is presented in Appendix H. For confidentiality reasons, the interview respondents are identified by the codes described in Appendix H and Table 4-10.

The hobbies of the respondents were very diverse from reading to music, fiber arts to knitting. Eight respondents said that they like to read. Their favorite reading genres included fiction, biography, best sellers, science fiction, comic books, novels, fairy tales, and historical science fiction. R2 and R10 said they like reading about everything. R2 said that she likes reading "just whatever happens" to capture her "fantasy." R1, R4, and R17 said that they like surfing the Internet.

The occupations of the interview respondents included homemaker, government officer, undergraduate student, graduate student, programmer, Web developer, administrative assistant at a local bank, project coordinator at the university, technician at a local insurance company, public school consultant, librarian at the university, assistant professor at the university, and facilitator for an autism program at a nonprofit organization.

Table 4-10. Demographics of Interview Respondents

Code	Gender	Age	Ethnicity	Occupation	Major/Field
R1	F	29	Indian	Homemaker	Innovation and design
R2	F	54	African American	Admin at a local bank	Finance
R3	M	19	White	Undergrad student	Journalism
R4	M	28	White	Programmer at the university	Computer/technology
R5	M	32	White	Project coordinator	Educational technology
R6	M	26	White	Doctoral student	Educational technology
R7	F	41	White	Technician at the insurance company	Student at the college
R8	M	38	White	Public school consultant	Education
R9	F	31	White	Program coordinator at the university	Library science
R10	M	29	White	Government officer	Public administration
R11	F	57	White	Librarian at the public university	Library science
R12	F	47	White	Educator for public school	Education
R13	M	25	White	Web developer	Computer science
R14	F	28	White	Office support staff at the university	Education
R15	F	26	Asian	Graduate student	Educational technology
R16	F	34	White	Doctoral student	Educational technology
R17	F	25	Asian	Graduate student	Educational technology
R18 R19	F M	38 27	White White	Assistant professor Graduate student	Medical field Political science
R20	F	53	White	Facilitator for dyslexia and autism program	Education and horticulture

Interview respondents' majors covered diverse areas: innovation and design, finance, journalism, technology, Web design, education, educational technology, library

science, public administration, computer science, medicine, political science, and horticulture.

2.2. Characteristics of online news reading behavior

This part presents findings from the qualitative part of the study pertinent to RQ1, which aimed to investigate the online news reading behavior of respondents.

RQ1. What are the characteristics of online news reading in the context of people's everyday life information seeking behavior?

The findings related to RQ1 are organized around the following questions about online news reading behavior:

- 2.2.1. What are the respondents' perceptions of online news?
- 2.2.2. What types of news do the respondents read online?
- 2.2.3. How do the respondents read news online?
- 2.2.4. Why do the respondents read online news?

2.2.1. What are the respondents' perceptions of online news?

The researcher used the critical incident technique and explication interview method to investigate incidental exposure to online news in the beginning of each interview session. During the first few interviews, the researcher sensed that respondents' perceptions of news might be affecting how and what they describe about their incidental exposure to online news. Some respondents started sharing stories about how they were incidentally exposed to white papers or other documents related to their work online. To understand the perception of news by respondents, the researcher asked the following questions: "What is your definition of news?" and "How could you define news?" These

questions were asked at the different stages of the interview depending on the context and content of the whole interview. In some cases, respondents shared their perceptions of news during think-aloud sessions when they demonstrated how they read online news on the computer screen. In other words, perceptions of news by respondents were captured from the different points in the interview sessions, not necessarily as direct responses to the aforementioned questions about the definition of news.

Defining what is news seemed to be a challenging task for a few respondents. Several of them admitted that it was difficult to define news. Ambiguity and difficulty of news definition were visible by the following words used in the definition of news: "anything," "whatever," "all," and "general." R20 said: "News...um....I don't know. I guess it's whatever is interesting."

Respondents used the following criteria to distinguish news from other types of information:

- Old v. new definitions of news;
- Content (topic areas, balanced, enhancing knowledge, not sensational, not slanted, objective, interesting, true, fact based);
- Knowledge gap (something they do not know or do not have);
- Impact;
- Importance;
- Proximity (local, world, professional community);
- Currency of information;
- Utility (work-related needs, hobbies, interests, useful, applicable);
- Emotions (feel-good stories).

Respondents shared their thoughts about the changing nature of news with technological innovations. Three respondents shared that their perception of news was broader than the traditional notion of news provided by the mainstream media. R13 said that most people think news is "stuff" that is "produced" by "large corporate news outlets." He said that this traditional definition of news is limited. He considers that the entire Internet is news. With this definition, he thinks that he is "soaked in media" and media are "going around" him. He said that information does not need to be produced by news corporations to be defined as news. R5 said that news is "information" that he did not have before and does have "afterwards." He compared his broader definition of news to his parents' perception, which considers news as "what comes on at five o'clock, and ten o'clock every day."

R9 said that news is "anything that enhances" his "understanding of events happening in the world" whether it is "related" to skills he needs "to learn at work" or "personal hobbies or interests." He described the traditional definition of news as something that "lands" on his "porch or front door in the morning."

In contrast to the aforementioned cases, R15 had a strict definition of news. She did not count the stories that appear in various blogs and magazines as news. For R16, "pictures" were not considered news. News had to be "some form of a story" about "something that has happened."

R10 defined news with two scales: proximity and importance. News to him is "the events" that "fits on two scales proximity and importance." He said: "...it could literally be an event from anywhere, I do get, like some of the newsletter, news searches that I do, produce small stories um, on small...on little things like a particular charity event or

something like that." He also said that news definition depends on "how many people it affects"

Four respondents said that news is information they "do not know" or "do not have." The illustrative remarks include the following:

Well, uh, you know, news is information, you know. Information that you did not possess before you encountered it...for me news is information that I do not have, that I find, and that afterwards I do have. (R5)

What is my definition of news...oh, um, giving the information on current topics of interest that I don't already have. (R12)

News to me is, very general, to me it's information that, I don't know I think it's hard to define in some sense, because, it'sto me it's not fair. To me I think all this stuff is news. (R16)

What is news to me, something I don't know is news. Anything it could be something old already that's useful but I haven't know that, so it's news to me. (R17)

Four respondents' perceptions of news were tied to the coverage about the world and the impact of news:

...I guess like just what's going on around the world today, just like...some of the things that impact our world. (R6)

Um...I guess, anything that's uh, it's anything that might impact other people, some event or problem in the world that has consequences for uh, the large majority of people. (R19)

Two respondents said that they would consider their professional or work-related information as news. R20 looks "for things in the news that talk about people with dyslexia" because she writes a blog for her business. She considers the online discussions taking place at the Mom's Source website (http://www.momssource.com/) as news. R5 also thinks that the discussion related to technology at the social networking site Ning

(http://www.ning.com/) is news because he gets informed through questions and answers about opinions on certain topics in his professional network:

I consider this to be news, because this person is asking a very relevant question and it's a question that hasn't been answered yet...So this person is leveraging the wisdom of crowds to his benefit, so he's putting this out to the entire developer community. And so the entire developer community in a hermeneutic manner is going to negotiate meaning in order to come up with a reasonable answer or what also happens is they'll just abandon it. But typically questions like this get answered very well because they're very relevant to everyone. So, yes, I would definitely consider this to be news. Not necessarily the question, but the information that proceeds and so what I'm finding here is these are people's opinions about it, and from those different opinions I'm then informing my own opinion about it. (R5)

In order to see if the respondents' definitions of news depended on whether the stories were written by professional journalists or not, the researcher asked the question, "Does it matter who wrote the news stories?" Five respondents said their perception of news does not depend on who wrote news stories. R12 reported that she is "open to read variety of articles" and decides on "her own" whether she feels that it is "a slanted" or "objective article." R14 said "it does not matter" if the authors of news stories are "professional journalists." She cares whether "the facts" are right. R16 also stated that the authors "don't necessarily need to be paid to tell a news story." She said the readers can judge whether the stories are "biased" or "incorrect." R19 claimed that he "does not pay attention to the author." R10 said that his judgment about the authorship of news stories depends on the topic of news and his interest. He reads "just about anything that is written" for things that are of his "personal interest." However, he said he follows professionally written news pieces for his "citizenship oriented interests."

2.2.2. What types of news do the respondents read online?

The online news sources mentioned by the interview respondents could be categorized into six main groups: websites of traditional news media organizations, alternative news sites, social networking sites, "crowd-surfing" sites, sites with unexpected news, and news sites from home countries (see Table 4-11). In terms of the news topics the interview respondents read, the following themes emerged: national news, news from hometown or home country, professional/work-related news, and hobby-related/interesting news.

Table 4-11. Types of Online News Sources

Types	Examples
Websites of traditional news media	local newspaper sites
organizations	local TV channel websites
	national media CNN, ABC
	media websites from places where
	respondents have lived before
	podcasts from NPR
Alternative news sites (fun sites)	Gossip website, Yahoo!
Social networking sites	Twitter, Facebook
Crowd-surfing sites	Digg
Sites with unexpected news	Gawker (http://gawker.com/)
News sites from home countries	Chinese news sites
	Vietnamese news sites
	Indian news sites

Websites of traditional news media organizations.

R3 and R19 said that they read online versions of national newspapers daily. R3 reported that he reads *The New York Times*, *Los Angeles Times*, *Washington Post* and *Wall Street Journal* every day.

R19 stated that he visits *The New York Times* online at least once a day for updated news. He said that his reading is affected with how busy he is. During the semester he "tends" to browse headlines on *New York Times* site, but when "not in school" he opens "twenty stories everyday" trying to "read every story." He also reads the *Christian Science Monitor* online after reading *The New York Times*. R5 said that he visits the number of news sites "to keep informed" about news events. He reported that he checks the *CNN* website to see "what is hot on the front page."

Alternative sites.

The alternative sites included news aggregating sites and portals, such as Yahoo!. Two respondents reported that they mostly rely on Yahoo! for their news needs. R14 said that she visits the Yahoo! portal daily "to find out what's going on there." R17 stated that she also relies on the Yahoo! portal for her news needs. However, she is not satisfied with the quality of news provided at this portal: "...a lot of times the news on Yahoo! is not worthy, it doesn't have a lot of value, so whether you read that site or not it is not anything new you don't already know, it's a little bit disappointment but it's okay." She said that Yahoo! does not provide much information on the big events on "what is really going on" and she needs to read more about the actual news to understand about what exactly is happening in other places.

R19 said that he also reads random news at the Yahoo! portal despite his loyalty to *The New York Times*. This 27-year-old, political science graduate student described Yahoo! as a "random assortment of topics" in which he is not "normally interested." He compared the content of traditional news sites to Yahoo! news:

When I check CST and *New York Times* and other websites, they're really going

to focus on ... international type news and imperative things, but that little Yahoo! news section on their page can be about anything, you know? Dogs that save someone's life. I wouldn't look for that I guess, but I'll click on it.

R13 stated that he adjusts the news stream coming to him so that he can read perspectives different than those reported in the mainstream media:

...if I'm on the computer, news is shot at me, I mean, information is shot at me...um...I guess, only a portion of it, less than half, maybe only even a quarter is what you'd call traditional news. Um. But the topic areas are generally like stuff that would mostly be covered in mainstream but just from a different perspective. I would say a quarter of the stuff the mainstream media would never even touch. So it would be...in my view information, not traditionally.

Social networking sites.

Three respondents stated that they use social networking sites a lot and find news there. R3 said that he gets on Facebook "just like about every time" he logs onto his computer. He reported that he is a fan of *The New York Times* on Facebook. He said that he liked the redesign of Facebook that allows him to get "more status updates" from the news sources of which he is a fan. This nineteen-year-old journalism undergraduate student also subscribes to news on Twitter. He said that he subscribes to many news sources at Twitter and gets lots of "Twitter tweets" with a "one sentence headline." He emphasized that he receives "five times more tweets from news sources than friends" because the most of his friends are not on Twitter.

R13 said that he uses Facebook and Twitter a lot. This 23-year-old Web developer added that there is always "a chance that somebody sent [him] something" or "posted a link" on Facebook. He said he keeps "a little Twitter application open" so that he can "see what's been going on there" and "see what people have been thinking and talking about" which "will be posted to news sources."

Crowd-surfing sites.

Two respondents stated that they like visiting "crowd-surfing" sites, such as Digg, Slashdot (http://slashdot.org/) and Fark. They explained that the crowd-surfing sites use a voting mechanism to vote a story up or down based on its interest to people and the crowd decides if something is newsworthy or not. R5, a 32-year-old technology project coordinator stated that he visits Slashdot for "current and hot technology topics," where he finds "60% of the stories" relevant to him. He feels pretty much guaranteed that he will learn or find something unexpectedly on this site. He called his experience of reading Digg as a "gamble" since he never knows what he is going to find there.

R16, a 34-year-old doctoral student in educational technology, said that she "solely" uses Digg for her "news interests" because "it has both fun and political stuff there." She described Digg as the place, "totally driven by the interface," where people submit articles, "subscribe to it," and "vote on whether they think it's good or not." She stated that she opens up the browser, logs in and then "digs up" news there. She said that she likes reading comments at Digg in addition to news stories because they can provide links to other stories, can reveal if other readers think if something is misreported, or can simply be "kind of funny." She also reads "related area link" at Digg, where people provide the links to other stories.

Sites with unexpected news.

The majority of respondents stated that they visit certain websites to read unexpected and odd stories. R3 said he mainly reads national newspapers online, but he also visits the gossip news site Gawker. He described his experience of visiting Gawker as a "guilty pleasure" because he thinks "it is admittedly not very newsy." He explained

that he reads this site to be informed about the stories that "everyone was talking about it." He admitted that he would not be exposed to the news stories about like "when Rihanna got beat up by her boyfriend Chris Brown" if he just "strictly" reads *The New York Times* and the *Washington Post*. He finds Gawker a "funny" and "entertaining" website.

R4 mainly reads news on his interest area in technology. This topic is also related to his work needs since he is a computer programmer. On the other hand, he said he visits the Boing-Boing website (http://boingboing.net/) daily because "it is a random collection of interesting things." He stated that he finds "interesting and unexpected" stuff at Boing-Boing and likes XKCD Web comic on this site.

News sites from home countries.

Three respondents stated that they read news sites from their home countries. R1 said she reads the electronic edition of the *Hindu Sun Times* and a few other news websites from India, including the *Times of India* (http://timesofindia.indiatimes.com/) and India TV (http://www.indiatvnews.com). This 29-year-old homemaker, who came to the United States seven years ago, stated that she wants "to know about what is happening" in her home country because she lived most of her life there. She said she thinks indiatv.com, an Indian website, is "a pretty good website" to be informed about her home country.

R15, a 26-year-old student from China, said she reads the online Chinese edition of *Next* magazine (http://hk.next.nextmedia.com) because she is more "comfortable" reading in Chinese. She described this website as "the website for Chinese people abroad

not for the Chinese people in China." She said she finds not only stories about the events in China but also news from other places, including "America and Canada."

R17 stated that she reads a Vietnamese news site, Dantri (http://dantri.com.vn/), in her native language because she has been "away" from her home country for a few years, but she still wants to get updated about what is happening there, "especially to people" of the same age as her.

2.2.3. How do the respondents read news online?

This part describes the behavioral aspects of respondents' online news reading with detailed descriptions of how they access online news sites and which devices they use. It summarizes their descriptions of their actual news reading behavior on the news websites. Think-aloud sessions revealed detailed pictures of how respondents read news online.

Habits of online news reading.

A few respondents said that they read newspapers online because they have lifelong habits of newspaper reading. The illustrative examples are as follows:

"...because it was my habit to read newspapers like when I was in India, I would read the newspaper everyday...so I just wanted to continue the same habit, I guess" (R1).

"Um...I guess it's a lifelong habit, my ...we always had newspapers in the house, my mother was a reader ever since I was small, my father didn't start reading 'til later on in my life, but he always read the newspaper and we always two or three newspapers in the house. So I just grew up that way" (R2).

It was apparent from their responses that family members had an influence in the formation of their habit of reading news. With the Internet, their news reading habit still remained with changes only in the medium used.

Time to read online news.

The most respondents reported that they have specific times or daily schedules for reading news online. Four respondents said they check news online in the morning. R1 stated that she reads *The New York Times* and the *Columbia Missourian* newspapers every morning. She also checks the Indian news sites. R5 said he reads news every morning after he comes to his office: "...the first thing I do is go through my e-mail, make sure there is nothing pressing that I need to attend to immediately and after that I'll usually uh, visit just a couple news sites, *CNN*, Slashdot, see what's going on there."

R10 reported that he checks news in the morning for 20 minutes after he gets to his office at 7:30 a.m. Then, he said he checks news "just ... [at] any time when there's a slack period." He reads *The New York Times*, the *Washington Post*, the *Columbia Daily Tribune*, and the *Columbia Missourian* "thoroughly every day."

R13 said he starts using his iPhone from the moment he wakes up, but he does not check Google Reader or Facebook early in the morning. He added that he does not want to get his "mind running about all this stuff quite that early." He starts reading news when he comes to his office and starts using his computer.

Three respondents reported that they check news online in the morning, but afterwards they continue browsing for news several times a day. R12 said he reads news late evening or early morning: "... like it might be six-thirty in the morning and usually after ten or ten-thirty at night."

R16 said she checks Digg "usually in the morning" and for "a little break" during her working day to "use it as little mental break to go and look for fun things." R20 said she checks news when she is home because she does not have an Internet connection in

her office. She does not directly go to the news sites, but looks at the customized toolbars "once in the morning" and "once in the evening."

R7 said she checks local newspapers' websites in the evening to "to see what's going on" and goes to different sites "if something catches" her attention.

R2 visits the local newspapers' websites in the afternoon when they are updated: "...usually I try to wait until after I think the website's been updated for the day, usually after 2 o'clock, 3 o'clock."

In most cases, respondents follow the same routine of reading news online at specific times. However, a few respondents reported that their news reading behavior could be spontaneous. R19 stated that he has an "irregular schedule" of reading news online. He said he checks online news "any time" he wakes up at "strange times... not really in the morning," mostly in the afternoon. R4 admitted that his behavior could be "spontaneous" depending on his "day and mood." R13 said that his news choice varies "during different times of the day" and in "different setting[s]." He explained that he follows the news stories about programming and different languages during the day, but when he gets home he reads about bikes, music, and local currency.

Monitoring for updated news.

The majority of respondents reported that they monitor news throughout the day. A few respondents said that they check online news on their portable devices, such as laptops and iPhones, everywhere they go. R3 takes his laptop to his school and "browses the news sites" even during class "at least a little bit." He pointed out that he can get the Internet anywhere with "mobile broadband" even "on a train in the middle of nowhere."

R13 said he has a lot of chances to check the news throughout the day. This 26-year-old Web developer spends his entire working day on the computer and checks news "every once in a while," switching over to his Google Reader or Facebook "for a little break." He said that it is a way he takes "a little prolonged break from the routine of working." He admitted that he is "inundated" and "soaked in" media because he could "literally" be "out at four in the morning riding [his] bike on the Katy Trail" and "open up Twitter or Facebook or Google Reader."

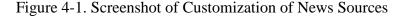
R4 said he checks news "throughout the day and night" and "it happens whenever." R5 stated that he returns to *CNN* "periodically throughout the day" to read news updates. He thinks that *CNN* is "updated three, four times a day" whereas Slashdot is updated throughout day. He goes to *CNN* at his lunch break, after he gets home, after dinner or whenever he "is bored." However, he said that "the majority of flipping for news" happens in the morning.

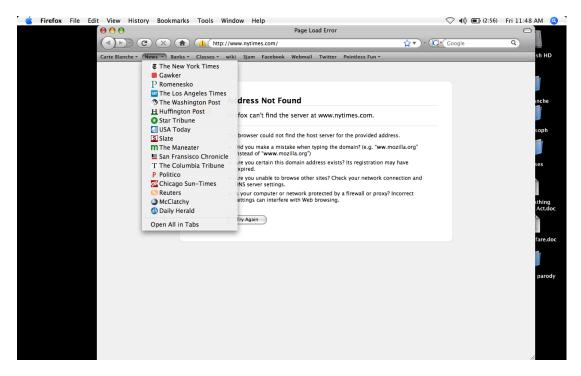
R10 said he knows exactly when the two local newspapers update their websites and checks them in the afternoon: "... although at two o'clock I'll go to the *Tribune* when they do their current thing. The *Missourian* seems to update about that same time, and it kind of seems to vary." He said that except checking these two newspapers in the afternoon, most of his online news reading is "just kind of catch-as-catch-can" activity.

R11 reported that she monitors news all day using her default personal homepage and listening to the Internet radio because "the news is always right there." R16 said she checks Digg for "at least a couple of times a day" to check what is going on.

Ordered routine of visiting online news sites.

Respondents provided rich data demonstrating and describing their online news reading behaviors during think-aloud sessions and in the interview process. Many respondents reported that they have a specific order for checking a number of online newspapers. R3 said that he customized the Firefox browser with the bookmark for news with a "dozen of news sources" which he visits on daily basis (see Figure 4-1). He explained that he has "a very organized routine" of reading online news. He opens *The New York Times* and has "at least seven tabs" open for all "different news sites" and "keep[s] switching between" them. He starts reading *The New York Times* first and then goes to other big national papers, including the *Los Angeles Times*, the *Washington Post*, and the *Wall Street Journal*. He is a "registered user" on many of these news sites. He said that he has a "different tactic" to browse news for each online news site he visits. For example, he does not check the Opinion page and Sports page at the *Los Angeles Times*. He checks everything on the homepage of *The New York Times* if he has time. He goes through the "most popular," "most of these, most of them" parts.





R11 said that she goes through the list of websites like "a cow going through pasture." She explained further that she has own "little path," which starts from the earthquake map and goes to *CNN*, *Drudge Report* (http://www.drudgereport.com/), Yahoo!, *Google*, *BBC*, and *CBC*. She called her habit of checking the earthquake map "embarrassing." She said she does not "usually go up to *CBC* and *BBC*" unless she is "on the northern border" of the country with her work-related travel. She explained that checking news on *CBC*, radio, and TV give her a "different slant on the news."

R19 stated that he has a routine of checking the list of news websites every day repeating "the same process every time" he goes online. He said he has a "kind of a routine" to "check a short list of websites" anytime he is online.

Incidental exposure to online news.

Five respondents stated that their online news reading is random and happens mostly through incidental exposure to news. R9 reported that she does not actively seek for news as opposed to many other respondents who have habit of reading news in the morning or in the evening. This 31-year-old program coordinator at the university said she does not need to look for news because she lives in very "dynamic" and "media rich environment," which allows her "to stumble across information." She noted that this media environment is "too extreme" and news is "so fragmented." The present status of overwhelming news gives her feeling of living in an "attention deficit disorder society" with "too many opportunities for stumbling upon things," which makes it difficult to "focus on a clear path." She said she wants to have a "less complicated," "less distracting," and "simpler" place for news reading to avoid "the Web environment," which is "a giant mass of stumbling upon news or information." This young lady admitted that she "expects" incidental exposure to news to be "the way" she "discovers news" in her daily life. She said that she should be "reading many sources and get an understanding of what's going on in the world," but she cannot do it because she does not have time to "invest" and "manage left, central and right views" and "look at all those news sources and magazines." Instead of it, she said that news "comes" to her "through incidental exposure":

...because of the way the work environment is, it's a balance between a constant interruptions and focusing on certain tasks you might be doing. Many things at once. ..I wouldn't just generally sit down and just designate a bunch of time to news reading.

R13 said that he tries to stay away from "the news from the mainstream media," but he "runs into" this type of news a lot on the Internet. He said he extensively uses the

Internet since he is a Web developer. The researcher asked the respondent if he feels he is uninformed about the general news covered in the mainstream media since he reads news mainly from the alternative sources. He responded that he "feels ahead" of others because he is "soaked in media" and encounters news in many places. He added that news is "so widespread" on the Internet. He gets exposed to news "incidentally" through "people who post about it on Twitter" and stories that "shows up on places like Boing-Boing." He explained that he gets news from the Internet, blogs and social networking tools, which provide "links to ongoing events from people in that location." He said he likes getting news in this way without media filter:

... like that happens with Twitter a lot. When there was...like that terrorist attack in Mumbai, there were people in the hotel that was being bombarded that were posting about it you know. So like, rather than getting it through CNN, which has their filter of perception. Like people on Boing-Boing were literally reading about what was happening in real time from people who were on the Internet.

R14 stated that she does not seek news, but mostly relies on incidental exposure to news. She said she gets news from Yahoo! or MSNBC portals. She said she sometimes clicks on the interesting links in Facebook, when somebody makes a "status update about something that has to do with the news." She said that she does not usually go directly to news websites unless her husband sends her the links to follow.

Incidental exposure to news was also reported as a main way to get exposed to news events for R17. This 27-year-old graduate student said the Yahoo! portal is her main source of news. She noted that she looks at news at Yahoo! every time she checks her e-mail. She reads Yahoo! news "because it is right there" and she can" just glance there." She said this way "the news comes" to her on her way to e-mail:

...Yahoo! ... always publish some kind of news of the day, and right there you can see it and if it's a hot news, like economic crisis, it's right there, with no need of searching around. Or you come to office and like people start talking and know about stuff, and then okay, I'm going to read around and stuff like that.

Her news reading behavior remains passive, unless she encounters news either at the Yahoo! portal or through personal communication with her colleagues at work. Once she finds out if there is anything important is going on, such as a plane crash, elections, an economic crisis, a bailout and so on, she starts actively looking for news on the given topic. She said that she goes to *CNN* and *MSNBC* when she has "more interest" in certain news, otherwise she does not have the need to go there.

R18 said that she does not read news actively. She said her main ways to get informed about the news events are listening to radio when she drives and "running across" news on the Internet. She said she is "oblivious" to news unless she is incidentally exposed to news, which changes her behavior from passive to active. She said she checks *CNN* and *New York Times* when she follows up news stories based on her incidental exposure. R13 also reported that he always "runs into news on the Internet."

A more detailed picture of the respondents' behavior related to incidental exposure to online news will be presented under RQ2 findings.

Access to online news.

The following themes, regarding access to online news sites as reported by respondents, emerged from the analysis: direct visits to news sites, subscriptions, receiving news in e-mail and customization (see Table 4-12).

a. Direct visits to news sites. The data analysis indicates that respondents use different methods to directly access news online. The following patterns emerged from

the analysis, regarding direct visits to news sites: memorizing the URL and typing it in to access sites, bookmarking the URL, searching on Google to find news sites, creating links to news sites on personal websites and blogs, and following links from other websites, social networking sites and e-mail.

R5 said he goes directly to CNN, Digg and Slashdot every morning because he finds it "to be a better interface." He stated that he uses Google news page, but finds it as a "portal" because whenever clicks "on a link there it takes" him to *Wall Street Journal* or *New York Times* or other sites. He shared about his preference to find stories "right there on the site" rather than going off "to another place."

R7 reported that she directly goes to the local newspapers' websites. As opposed to many other respondents, she does not use bookmarks to keep the list of websites. She said that she "memorized them in her head."

R10 said that he directly visits the websites of *The New York Times*, the *Washington Post*, the *Columbia Daily Tribune* and the *Columbia Missourian*.

Many respondents stated that they bookmark the URLs of online news sites they visit regularly on their computers. R10 stated that he bookmarks the newspapers on his office computer, where he does "the bulk" of his news reading.

Table 4-12. Access to Online News Sites

Types	Subcategories
Direct visits	-Memorization of URL and typing it,
	-Bookmark
	-Google Search
	-Personal websites and blogs
	-Links from other sites, social networking sites and e-mail
Subscription	-Subscription to newspaper websites
	-Subscription to electronic edition of print newspapers
	-Subscription to podcasts
	-RSS feeds (Google news reader)
	-Subscription to news on Twitter
	-Becoming fan of news organizations on
	Facebook and following them
Receiving news in e-mail	-Receiving subscribed news in e-mail box
	-Automated news search with Google
Customization	-Toolbars
	-Browser setups to make noticeable some news
	-Personal website or blog to organize news and information
	-Alert box tools
	-Setting up homepage with I-Google

b. Subscription to news. Respondents reported that they use the following strategies to subscribe to online news:

- Subscription to newspaper websites;
- Subscription to electronic edition of print newspapers;

- Subscription to podcasts;
- RSS feeds (Google news reader);
- Subscription to e-mail news;
- Subscription to news on Twitter;
- Becoming fan of news organizations on Facebook and follow them.

R3 said he does not only read online newspapers, but also subscribes to "a dozen podcasts" from *NPR* and listens to them "walking around" with his headphones when he is away from his computer. R20 reported that she used to subscribe to the two local newspapers, but stopped her subscription because she started receiving "alerts" from them. R12 reported that he subscribes to e-mail news from several news sites, including *CNN*, *Fox*, and *News Match* (http://labs.openlaszlo.org/ipdc/newsmatch05/).

Three respondents reported that they are heavy users of the Google News Reader. R4 stated that he relies on Google News Reader to get news related to his interests. Google News reader "pulls in the articles" so that he "does not have to deal with extra stuff." It is "convenient" and saves time because he does not need to go "through [his] bookmarks and find a site and then click on it and go through." He finds Google News Reader easy to use as it gets his news "pulled into one location." This way, he does not "have to constantly fight the new addresses or keep track of all of the sites" he looks at. He said the Google Reader works "not only for aggregating content" for him, but also "as a bookmark tool" because if he "really wants to go in and visit a site, it is easy to do so from it."

R6 stated that he uses Google Reader a lot. R13 said "Google News Reader is definitely the main way portal that news comes" to him because "it is so simple." Despite

his multiple ways and devices to get exposed to news, he said Google Reader fulfills his needs "to browse around and find something to read." He claimed that with "fairly active" behavior, he categorizes all news and information subscription in Google News Reader as follows:

... I have a couple categorized at the top that are interesting that commonly have stuff that I like, so I keep them up here and then the rest, here... So those are the best ones that I like to read and then they're categorized after that by stuff or Mac stuff, this one is a bunch alternative thinking kind of stuff, this one's technology, design, music and video, then more crazy alternative thinking stuff. These ones are like, link-posting sites that have just ridiculous amounts of stuff. They both have like a hundred, no it says a thousand links to political stuff.

He demonstrated how he created a special category for content that "fits well on the screen of the iPhone."

c. Receiving news in e-mail. R10 said he uses the automated search with Google News. This 29-year-old government officer claimed that he keeps his e-mail "open and going concurrently with everything else" on his computer to see some interesting stories there. He said he has "one automated search through Google news" which "pulls stories on a daily basis" to "digest." He admitted that "most often, three times out of five" a story like that could "just get trashed with nothing interesting in it" because "Google is a giant vacuum."

d. Customization. Many respondents reported that they customize their computer and browser setups to meet their news needs. The following themes emerged from the analysis, with regard to the customization of news-receiving tools:

- Customization of toolbars in browsers:
- Browser setups to make noticeable some news;
- Creation of personal website or blog to organize news and information;

- Setting up alert box tools;
- Customization of homepages in browsers.

R5 said he uses a number of ways to customize his news reading behavior. He created his own blog for news needs with subscriptions to a number of RSS feeds. He said he "set up his blog" for him to view as opposed to the fact that "many people set up blog for other people to view." He called his own blog a place, where he "keeps all his stuff that is very tightly coupled with what he does." However, he said that he visits his blog rarely and only in the cases whenever he has "not seen anything going on for a while" and "wondering why is it so quiet around here."

In addition to his own personal blog, R5 said he set up homepage with I-Google. He stated that he customized I-Google to get "any information" he wants in addition to Google's news service. He described his experience with I-Google as follows:

Because you can customize it, to get any information you want. So you know for instance, Google has their news service, and you can customize your i-Google page to send you the top stories from whatever topic you're interested in. So I have a category for general news, and then I have a category for open-source technology news um, and I have a Gmail account and it has kind of a preview of your Gmail weather, a quote of the day, a word of the day, um, and my calendar.

However, he admitted that he goes to I-Google as a "last destination" for news when he checks his Gmail account to see if there is "other information he can see with a glance."

R11 noted that she created her own homepage to make her news monitoring easier many years ago. She said this personal homepage serves not only her work needs for collection development in the library, but also as a place to get news from one point.

Many respondents reported that they customize toolbars and bookmarks on their own personal laptops and office computers where they read news regularly. R20 said she uses Google Toolbar on her home computer and reads news only when she receives Google alerts. R11 described how she customizes her browsers as follows:

Now on my laptop, my personal laptop, I also have across my toolbar, whatever that, where you can capture a link and bring it down to do more things....Yeah, in browsers. Um where you can find it. Yeah. I don't like Yahoo!, but so I'm just, I'm just not crazy about it. So I won't let it install on my new updated Firefox and also Delicious. But anyway, um, so I'll pull them down and I'll put them across my header. And I use that as another visual to check. (R11)

The majority of respondents said that they do not customize the homepage of their browsers. Only R13 said that he sets up homepages in his browsers to "a blank page," so that it will be "quicker" to download.

Online news reading behavior during the browsing process.

The rich description of online news reading behavior by respondents and their demonstration of reading processes during think-aloud sessions allowed the researcher to closely investigate the actual process of news reading during the browsing. The following themes emerged as the types of activities respondents do during online news reading: tab switching in browsers, clicking on the specific locations on news sites and saving for future reading, and visiting different news sources to compare the same story (see Table 4-13).

Table 4-13. Online News Reading Behavior During the Browsing Process

Types of Behaviors	Examples
Tab use and switching in	Opening tabs
browsers	Switching among them
Clicking on specific locations on	Most popular
news sites	Most viewed
	High voted stories
	Third column
	Top 10 or Top 20 stories
	Right side at CNN website
	Related stories
	Comments
Saving for the future reading	Marking as unread
	Bookmarking with Googlemark and other tools
Visiting different news sources to	
compare stories	

a. Tab switching. Opening news stories in the separate tabs in a Web browser and switching among them was reported as the dominant behavior for many respondents. R3 declared that he spends his "first few minutes....opening a bunch" of tabs to read news. R6 said he has "a lot of tabs open" whenever he reads the news online. R4 stated that he opens "five or six tabs" keeping the links he wants to "further read" and continues browsing "for other things" he finds "interesting."

A few respondents explained their reasons for opening new tabs for news stories, tying the behavior to keeping focus on their news reading. The illustrative examples are as follows:

I find a story I'm interested in and I pop a tab open because I'll have to go and my task whenever I'm you know, browsing for information is just to find information that's interesting to me. Uh, it's not to go off and read that information. After I've found that information that's interesting to me, then I go and read it. And then if it's not interesting to me I can just get rid of the tab, you know, who cares....(R5)

...These stories, after I look through certain, after I look through all the *Chicago Tribune* ones that are interesting to me. Then I'll click on them individually. (R6)

R9 noted that she opens new tabs to compare how the same story is covered by different newspapers. R16 said he has "the tabs open up in the background" so that he can "browse while it is loading." She stated that she also uses new tabs to come back to the previous task without being lost: "Um, I usually do, just cause I don't like trying to find where I was, I guess if I want to go back to where I was." She starts "closing the windows" once she understands the stories and eventually closes all tabs. Then she starts all over again opening new tabs for news reading.

b. Checking the specific locations on news sites. Respondents stated that they have special strategies to check the certain spots on news sites during their online news reading process. These special spots included the right side on the CNN website, related links, top stories, "most popular," "most read," "most e-mailed," and "most viewed" parts of the online news sites.

R6 said he checks the stories at "the right hand side" on the *CNN* website and also looks at the "related stories" on the bottom of the websites. He said he clicks on "on one of them" to see the Top Ten stories are even if he is "not really interested in any of them." He stated that he wants to see what other people are interested checking in the specific spots on the news sites:

...Like even if on Google Reader it doesn't show as anything new, I'll still go to *Chicago Tribune* just to see what other people are looking at. So for instance they have the most viewed, um, and then I'll click, like I can get the Top 20. So like I'll what are other people interested in and what other people are talking about, I guess.

Two respondents stated that they pay attention to "most viewed" or "most e-mailed" parts to read online news. The following comment illustrates that tendency:

Probably like the most viewed, or the most e-mailed because that's actually like why I sometimes go to it, cause like this will be a way to find a story that everyone else thinks is really cool and everyone's like e-mailing to each other and commenting on it. (R3)

They said that looking at these spots helps them to keep up with the social conversations with their colleagues and friends.

c. Saving for future reading. Saving news stories for future reading was an important task for many respondents during their news browsing online. R4 said he uses Google bookmarks and Google toolbars to save news sources and stories for future reading. When he uses computers other than his, he marks stories as "unread" to see it on his computer and bookmark it. He stated that he saves some interesting news stories for future reading since he does not have much time to read everything he interested in during his office hours. He reported that he mostly uses bookmarks to save the non-work related stories to read them later:

I often Google bookmark things to go back to later and I'll do that here. Rather than mark anything as read, I would go over here and have, and then bookmark them. And I do that throughout the day a lot. If I come across something personally interesting, I mean not work related, I'll open it, go to it, bookmark it, and then close that and look at it later, and leave it. (R4)

He said he uses his Delicious account to save his "technology-related" bookmarks separately from the stuff related to his personal interests so that he could "hand them out to people at work."

R10 said he keeps "unusual" or "interesting" stories for future reading. He said he does not print out the stories to keep. Instead, he e-mails the links to news stories to his

personal e-mail and to "retain" and "forward" them from there for "future information and cycling."

R13 reported that he saves the links to the stories related to his interests and hobby during his working day and reads them after work. He shared the case of how he saved a "six-page" interview with Barack Obama a few days ago. This article was "really long" and required "in-depth" reading so that he had to save it for future reading. Finally, he read it on his iPhone when he "was sitting outside" the previous night and "waiting for somebody to show up." This respondent also said he uses the "favorite" button in Twitter to save the stories for future reading.

Devices used for online news reading.

Respondents use the following devices to read online news: office computer, home computer, laptop, and iPhone.

In many cases, the respondents stated that they use multiple devices to read online news. R5 said he mostly reads news on his office desktop computer. In addition, he also uses his iPhone to read news online to "pass time." R13 reported that he uses multiple computers and devices: his office computer, home computer, and iPhone. He said he uses his office computer the most and then his usage time is split between his iPhone and home computer. Moreover, this Web developer said he uses "one browser for reading documentation and reading news" and a different browser "for looking at the stuff" he is "creating and debugging" to make his work environment more efficient.

Three respondents stated that they have iPhones. Two of them said that they read online news on their iPhones. R5 said he uses his iPhone when he is sitting on "his back porch" and waiting for "the barbecue to get done." This 32-year-old technology project

coordinator said he "might pull out" his phone and "take a look at what's going on, just to pass the time." He was excited to share that it is "really cool" to surf the Web in his car while his wife drives. This technology-oriented guy also likes using his iPhone when he attends the conferences, where he uses it constantly because he does not like "lugging a computer around" with him all the time. However, he is planning to buy "a little netbook" to "fill the gap between the cell phone and the computer" since it has the "affordances of both."

R13 said he bought his iPhone six months ago. He uses his iPhone "from the minute" he "wakes up to the time" he goes to sleep. He said that this new tool changed his news reading behavior a lot, "significantly becoming" a part of his "way to interact with media." He admitted that he "would miss" his iPhone a lot if he "had to get rid of it" because it would "alter" his habits.

R10 reported that he bought his iPhone three months ago, but he has not used it for news reading because he is still looking for the news reader program.

Social aspect of online news reading behavior.

The interview sessions revealed that online news reading is not only an individual behavior, but collaborative process of finding news sources, news stories, and sharing them with others on the Internet. There were many indications that online news reading behavior is not only an individual process, but that it is influenced by other people. R6's news choice and news reading behavior seemed to be driven by his social needs more than his own needs. He said he mostly focuses on the news topics that are discussed by other people:

Um...it depends if it's like a huge story, I may see, like um, like what other people are saying, look at this whole bail out thing, like with the government. Like I may go to CNN and then see what MSNBC says. But for stuff like that, where maybe not a lot of people may be talking about it, I'll...I won't really look into other pieces. I guess depending on how much I expect to talk about that particular topic with someone determines how much I really look into it. Yeah, if it's like a huge thing, I guess if it's important, I'll go to Wikipedia and look it up. Um, just kind of like general information about it. (R6)

R17 admitted that her news reading depends on other people's interests in certain news stories. She said that she reads news when there is "something hot" that everybody starts talking about.

R15 said she follows the big news events because she "care[s] about" other people around her and wants to "share" information with them. She said she wants to know more about the Swine Flu infections in the USA and to tell her friends to be "more careful."

The respondents stated that the Internet provides numerous opportunities for them to share and discuss news. It appears that the online news environment allows respondents to easily follow the trail of news choices from other readers. Many respondents' news selections depend on what other people have read in a given day. A few respondents stated that they visit the crowd-surfing websites, such as Digg, to follow the selection of stories by other readers. Many respondents shared that they read the comments sections of news stories and exchange their ideas and other sources related to the stories. The interview analysis shows that social networking sites are becoming a big avenue for news sharing.

R16 said she likes the quality of comments at Digg because of because its "voting system and the people it attracts." She said these comments are "really good" as opposed

to YouTube comments, which she does not read. She described how collaborative news reading takes place at Digg as follows:

Uh, sometimes I do, but I'm often Digged down, cause I'm not clever or witty. Um. Cause they really, it's kind of stringent criteria the people who post, cause there's like this person that dug down 12, take them away, boys, people were like whatever, like that's a stupid comment, so they dug him down, so it automatically hides it. So I mean, that's just one article. (R16)

One interesting element of the social aspects of online news reading at Digg seemed to be the control check for spins on news stories reported by different media outlets. During a think-aloud session, R16 shared her experience of how she checks for any spin on news stories:

Well that person has a lot of Digg, so people like what he has to say...Here's an article from AP, so this blog seems to be spinning the report of it, oh really? ...And so the AP has a different article that person thought had a different spin, so, I would kind of read through that. (R16)

Further, she explained that people who wrote comments are "pointing out biases in people who submitted the links." She admitted that she "could spend an hour just going through" the comments "depending on how intrigued she is." She said she sometimes posts comments at Digg, but her comments are often "digged down."

2.2.4. Why do the respondents read online news?

The interview analysis shows that news reading is not only a leisure activity, but also serves numerous other interwoven needs for respondents. The following themes emerged from the analysis with regard to the needs for online news reading:

- Monitoring news;
- Work needs:
- Social needs:

- Hobby-/Interest-related news;
- Spiritual needs;
- Break needs.

R2 said she listens to "five minute" news stories when she is driving to check if "something happened between last night and this morning," and then goes online to check local newspapers to see if they "picked up" these stories once she reaches her office. This 54-year-old administrative assistant at the local bank noted that she looks for "certain financial news stories" related to her job:

... a lot of times what I'm looking at is going to affect my work. I mean, not necessarily the crime stories, but the financial stories, maybe some local stories that um, a company being sold or a company having hard times might affect my job or my company.

R3 stated that he mainly reads the big national newspapers every day and scans all the important headlines to monitor news events. This 19-year-old journalism student said that he wants to be as "well-informed" as he could "possibly" be. He feels "smarter" and like a "more well-informed person" with his daily news reading. When the researcher asked him if his excessive news reading is related to his major in journalism, he said:

... actually one of the things that actually disturbs me most about a lot of the journalism students I talk to is so a lot of them don't, I don't feel they dedicate enough time to reading the news. I feel I'm a much better writer and I know what to do with my news stories like uh because I spend so much time reading the news.

He stated that with news reading he is "helping" his "own chances of becoming a better writer" since "there has never been a tougher time to go into journalism":

...I feel like you know maybe someone that reads half an hour, even reading half an hour of news a day is impressive for anyone, but I feel like if this is the

difference between me getting a job and me not, that's making me feel a little bit better.

This future journalist said he reads news "to be able to talk" to his friends about the news and to have impact on his friends' news reading by putting links to news stories on social networking sites.

R5 said he checks Wonderland forums and the Ning social networking site for his technology-related work needs and visits news sites to monitor what is going on.

R13 stated that his news reading purpose shifts from work-related needs during the day to more leisure-oriented reading in the evening:

... then...when I leave, it [news reading] kinds of dies down, um, I try, once I leave work...I'll maybe browse stuff that I'm more interested in like music or stuff at night. Or if I'm waiting for somebody or just sitting around I'll maybe read an article here or there that I saved from earlier that I was interested in, but once I, once the sun goes down, I'm kind of more in a enjoy-myself mood.

News reading serves not only information needs for R19, but also his leisure needs. He stated that he checks "news sites" first and then "racing" websites and comic book websites. R20 stated that she subscribes to RSS feeds for local news and professional news and receives Google alerts for dyslexia and autism. R7 said she reads news for her spiritual needs. She maintains a prayer list for her husband to keep with him:

...we pray, every day for different things and things that for friends and family and things that we know specifically are going on and then when we see things that are going on, like this thing I would be praying for Linn, and the students there, for things to settle down and for no more incidents to happen. Like when the sea captain was captured and like he was held for ransom and all that we were praying through that whole situation to get results peacefully and so that's, we do that with different things that we hear are going on, we pray for the economy every day, we pray for the government, that they do things correctly. We may not agree with everything they do, and I know that prayer works.

There were a few respondents who mentioned that they read news to have a mental break from their work or to get over boredom. R10 said that "boredom" during slow hours at his office "gets" him on the Internet.

Preference for online news sources.

Respondents stated that they prefer online news sources over other channels of news for the following reasons: variety of content online, willingness to have impact and make changes, features of online media (dynamic, beyond the limitations of traditional media), and time-saving advantages.

R5 is a doctoral student who conducts a research on technology usage. He said he gets 99 % of his news online, especially technology news. R3 stated that he "rarely picks up" newspapers on the campus. He said he prefers online news over traditional newspapers for two reasons—to support online media and to save the forest:

I feel like I'm going to be able to give them more money by going to their website and clicking on their ads than like by picking up the free newspaper and also since I'm very conflicted because I'm an environmentalist and also a journalist and I know that ... about all the money in journalism comes from the printed paper.. .but I mean, how many forests to we have to slaughter so that we can deliver the news at a slightly higher, well that much higher profitability rate...So I compromise my own little way by doing this.

He said he clicks on banner ads to open the new browser windows "to support news" knowing that "they only get like 50 cents" from that click. He said he is "silly enough to believe that it's making a difference every time" he clicks on those banners.

Three respondents compared online media with traditional newspapers to explain about their preferences for online news. R2 likes online media because it's "more timely than the newspaper." R16 said she stopped her subscription to the print newspapers

because she does not like "subscribing to one company" and "paying for it." Further, she explained her choice as follows:

...And it's not as portable, you can't take breaks with it... I'm going to read from your quality and your level of bias and read all the stories pertaining to how you view things so you would have to get tons of different newspapers and tons of different magazines and then comparing news stories, that would be impossible and not impossible and it would be very hard to do and lots of tiny print whereas you would need ten minutes on the Internet to do that, to compare, you know, what this person says about this story to what that person says about that story. It's like totally different and, I don't even, I don't even get print news anymore.

R8 said he thinks that the Internet encourages him "to look in different ways" compared to traditional newspapers. He said the Internet "jumps out" at him more than the print newspapers did. He likes online news because he "can direct it" to his interests: "...you don't have to listen to the whole story, like a newspaper, flipping the pages you can turn it, and move to a different topic if you're not interested."

Three respondents compared their online experience with TV watching. R10 said he prefers online news over TV because TV is "too static" and it "stops" him "from going anywhere or doing anything" making him just "sit and wait." He said he "hates" commercials on TV. He said the following about why he likes watching TV shows and DVDs on his computer:

Um...because it's too static. It's just, I sit there and I don't...I mean if I have to I have a computer and I'll watch movies and I'll rent DVDs of television shows that I like, I'll watch entertainment that way, but I hate commercials and I feel like in a lot of ways, it really just sort of stops me from going anywhere or doing anything, I'm just sitting and waiting for it.

R19 said he prefers online news sources because he has a "gut feeling" that "there's probably a lot more out there" than is reported on cable news. He thinks that TV

reporters don't have enough "time and reason to cover everything" because there are "so many different topics they can cover in half an hour."

R5 said he prefers online news because he does not want to spend too much time watching TV news:

... TV news is you know, what takes them a half hour to tell me, stories that I don't really are about you know, Bobby the dog hurt his paw, you know stuff like that, uh, I can find out all of that information in two, three, four minutes online.

He stated he likes having option to choose the stories himself on the Internet instead of being "spoon-fed" by "saccharin-sweet kind of commentator" giving him the information. In addition, he wants to get the variety of viewpoints on news stories:

... whenever you watch the news on TV you only get the perspective of whoever wrote the news piece, but online if you find a piece and you say well I want to find out some more about that, you can dive into it readily. You can inform yourself. You can get more than one perspective on it. So, yes, I do use radio and TV, but not very much.

Potential factors for online news reading behavior.

The researcher thoroughly analyzed all interview sessions, including critical incident stories and think-aloud sessions, to explore the potential factors that influence respondents' online news reading behavior. The following themes emerged as the potential factors that influence this behavior in general:

- Work environment/access to the Internet;
- Occupation;
- Technology skills;
- Time availability;
- Trust/attitude to news:
- Interest/hobby;

- Personality;
- Culture;
- Usability of online news systems.

a. Work environment/access to the Internet. The interview sessions revealed that the work environment and occupation of respondents seemed to be an important factor that affects their online news reading behavior. A few respondents shared information about the restrictions on the use of the Internet during their work hours. R7 works for a national insurance company, where the employees use the News Hut system. She said that this system allows browsing "work-related" news, such as "the new seat-belt laws," and "the graduated driver's license law." This administrative assistant said that it is "frustrating" to read news at her office because "video stuff gets blocked" and what she is "allowed to look at" is "very limited." She said it is "simpler" to look at news at home. R20 said she cannot read online news at her job because she does not have an Internet connection at her office, which she would have to pay additional money for. In contrast, R8 said his work environment does not limit his news browsing and he is "able to look" if he is curious about something.

R11 said she is always traveling because of her job. The mobile nature of her work affects her news reading behavior. She said she built her own website to get all necessary information, including news, from one place. She included all of her "fast clicks and the things" that she does every day on her personal website to have "everything available anywhere.

b. Occupation. A few respondents indicated that their occupation affects what news sources they read. R4 said he does not read the mainstream media because he is not satisfied with their coverage of technology news:

There aren't any newspapers that really cover what's going on. Magazines, there are magazines, print magazines that cover the issues, some of those are interesting. But they tend to be behind sometimes... they're at least a month behind whatever's happening. And you know, the big newspapers, *The Wall Street Journal*, *The New York Times*, any of those, they don't have the people with technological expertise to cover these areas. *The Columbian-Missourian* definitely doesn't. I mean, they're a small-town paper, there's no reason that they should be.

R19 stated that he is interested in general news because of his major in political science. He said he pays attention to current events taking place in Africa because "we tend to miss most stories on Africa." He stated that he also reads about the political events happening in China.

c. Technology skills. It was clear from the interview analysis that technology usage by respondents influences their online news reading behavior. Respondents who spend a lot of time on the Internet seemed to be using technology more effectively to fulfill their news needs. A few respondents used technology more heavily compared to other respondents. R13 is one of these respondents. This Web developer said he had "set up feeds" with his computer, laptop and iPhone to "pull information towards" him. He grew up with technology and described his involvement with technology as follows:

... I've been interested in the Internet ever since I knew it existed which was when I was like, well I was born in 83, so like people started getting dial-up and broadband in the early 90s so like right about when I turned ten or thirteen, about that area I started getting real interested in computers. And so, I've basically, like from my teenage years on been, highly involved in the Internet and I do Web development a career. So creating information and then creating media is kind of what I do all the time. So it's important for me to, kind of see how it's done everywhere else and keep....be aware of what's going on.

He said he does not have "the devices to absorb mainstream media" since he "threw" his "television off of a roof" five or six years ago. He said he does not watch TV, does not listen to radio and does not read traditional newspapers. He relies totally on his computer and iPhone, which are his "main ways of connecting with the rest of the world." He said "outside of the Internet, news comes" to him "through people" and his "surroundings" that he encounters during the day.

R20 was the only respondent who expressed a negative attitude toward the computer and Internet. She said she intentionally does not keep a laptop at her office because she does not need "other distractions" when she is working and "interacting" with her clients. She criticized her other colleagues who post messages during the day. She said she does not "miss" her computer during the day.

d. Time availability. Many respondents mentioned that time availability is an important factor that affects the way they read news and what sources and tools they use for online news reading. R4 stated that he uses Google News Reader mainly because "it can be a big time saver." Instead of reading the "three-page" article he likes to read "a summary in their RSS feed." He said the following: "If I go to the site, then I have to look through, sometimes have to look through the full article. Then you won't have them set out. The RSS feed is just, that's option."

R5 reported that he likes crowd-surfing sites not only for their voted content but also to read comments and discussions "people have around the story." He said he might not "click the link to the original story" just "seeing what people have to say about it."

This way, he does not "waste his time" judging very quickly what is "really cool."

R9 stated that he does not use RSS because "it will take time to learn it." R18 said she does not go to news websites directly. Time seemed to be a big factor for her news reading behavior. She reported that she finds news when she is searching for something else on the Internet or she finds links to news stories from her e-mail. She said "it feels more legitimate and less like wasting time" if she has "gone" to news from her e-mail. She thinks her husband seems to be "wasting" his time "consistently" looking at "all of the newspapers in St. Louis, Kansas City, and Springfield" as his "daily routine."

R7 is a busy mom and student. She also works for an insurance company. She admitted that she does not have much time to devote to news reading.

R12 thinks that she is "probably not as exposed" to news as she would like to be because she is "very busy as a mom and educator." She reported that she has the opportunity to use the Internet "before bed." She said she gets news from her husband who is a detective and who reads news every day and listens to radio. She admitted that "his reading" does have "an effect" on her because they have conversations about news. She said she also gets news through conversation with people during her working day "more that than anything" because she does not "sit in front of the TV" and she is "just going all the time" because of her job. She subscribes to news updates via her e-mail, but does not read them:

... You know I think I have a couple other ones that come to my e-mail box, but I rarely every list them. You know I don't even remember what they are. I think it wasn't intentionally subscribed and I haven't deleted them because I think just because if I want to look at it I can. But I don't even look at them enough to know what they are.

R20 also said that she does not have much time to spend on the Internet. In addition to her full-time job, she has "eight acres" and works outside a lot "doing a lot with plants and different things."

e. Trust of media. Trust and attitude toward media appeared to be an important factor in determining how respondents chose news sources and media channels. R13 said he uses "alternative" sources, including local or personal information sources. He stated that he tries to "stay away" from mainstream media:

... because of the interests behind it, they have a very powerful, agenda, like kind of in the subtext of why they produce what they produce... Especially in big news, like the financial crisis where the same holding company owns like banks, and owns media conglomerates, they have like, vested interest in the very things they're reporting about.

He said that news coming from the mainstream media is "distorted and imbalanced." He reported that he likes getting news incidentally through other channels on the Internet, such as Twitter and Boing Boing:

...I'll hear about Swine Flu, I'll hear about those things and it'll be more direct and it won't have any, sensational...you know...like you look at the Cable News coverage of the Swine Flu and they like talk about, make up, ten, fifteen second graphics about it, you know Swine Flu...the latest blah, blah...like there's just so much. So many layers of interest involved to get people interested in news. Whereas here on the Internet, like people are literally just talking about the topics and their perspective is known. You know where they are coming from, rather than it being hidden behind this mask behind, of you know, fair and balanced. No one's balanced, people have bias because that's how people perceive the world.

He likes the fact that people "constantly post" news on the Internet, whereas media can't be on "top of" news. He said that "it is inevitable" that media are "going to be a little bit behind."

R16 raised a similar concern about the filtering effect of media. She likes reading people's opinions at Digg without media filters. She thinks that she might be "probably missing something" because she looks at the "wisdom of the masses." However, she is not worried about missing news from traditional media because she finds "stuff that is hidden from mass media" at Digg:

... I'm probably missing out on what the media thinks is important for me to hear, and I'm, but I'm aware of what the people think are important. So I think that's...so I'm not too worried.

e. Interest and hobby. Interests or hobbies of respondents seemed to be important factors for their online news reading behavior. R4 said he has "active news seeking" behavior in his interest area of technology. It is also related to his work since he is a computer programmer. He said he does not care about general news, but cares about "what is happening in the technology." Unfortunately, mainstream media does not meet his expectations when it comes to reading technology news since "technology is moving" and "the stuff" he is "interested in" is new. He said he visits the TechCrunch website (http://techcrunch.com/) but cannot find out about much of what he wants to see because "what they're doing doesn't exist until they do it." He stated that finding technology stories usually happens in "accidental" way.

R10 said his online news reading behavior depends on how interesting the story is on news sites:

...When it comes to something that I find specifically interesting I'll put a great deal of effort of focus on it, um...I can't give you...it definitely has my attention. When it's something that is on the sort of may be interesting, may not be interesting, I'll sort of check it out anyway, but I'd say, maybe half my attention will be on that.

R20 said she used to subscribe to the local newspaper to read its education blog but stopped her subscription because the columnist stopped writing for the newspaper.

She said she liked Jenny Keaton's "attitude," "the way she presented things" and how she talked about "what the facts were and what was happening."

f. Personality. The personalities of the respondents, including their value judgments, religions, and emotions, seemed to be an important factor affecting their online news reading behavior. R11 said she monitors news all day along and she described herself as an "alarmist" who wants to know "all the other stuff" always checking "the news, what's going on in town, what are the latest events, what are the boating things." Her lifestyle and past events in her life affected her news reading behavior. She said the September 11 event had substantial impact on her news reading behavior:

Um...preparedness. It's one of those things having lived through Y2K which was nothing, but then September 11th...I'm very aware, or more aware of what's going in my surroundings...I think that's basically, that's when I became a big addict of news, was September 11th...I was... working on my grant project and was nose down to the grindstone working on something when somebody came in and told me. And we had the TV on then in the back room and I remember from that moment, almost being afraid to leave the television set, that something would be happening...We were caught so unaware at that time that... But then at that point reminding me just how vulnerable I was...that I was a single person, without a car, um, with no connections to anyone...Wondering what would you do...and I think at that point, one was...I just made the decision that news was going to be important and also get a car and start to be more proactive in my life.

Two respondents stated that their emotions and feelings affect their online news reading behavior. R14 said she does not like the media despite the fact that she worked for TV before. She does not want to read negative stories in news anymore because it

"just makes" her "a little stressed out." She said she tries to look at "more upbeat stories" not following the media all the time.

R6 said he prefers Yahoo! news over traditional media sources because it does not "necessarily always report the negative" stories even though he does not consider it a news source. He said that news is always "so negative" that he wants to "avoid" it altogether. R4 said he does not "ever seek out" news because "it is very depressing" and usually "leaves" him "feeling very frustrated and angry."

The interview analysis revealed that there was a group of feelings that affected online news reading of respondents: feelings about power (how much power the respondents have), feelings about making changes, feelings about the impact of others and events, feelings of hopefulness, feelings of helplessness, and feelings about a willingness to influence others. R3 stated that he "wants to drive" his friends to news websites, such as *The New York Times* by posting Facebook status updates. He thinks his "friends eventually will start going" to *The New York Times* website of "their own accord" if he "keeps continuing to share news stories at Facebook. He shared the recent story how he influenced one of his friend's news reading:

Like I've talked to people and they're like ever since you've started like...actually, like a girl just yesterday I was talking to like I kept posting I uh, a lot of updates I do is from this one website and I talk to her about this website before and she says she goes to it now because of me, and like and it's not the best website that I read and it's not the most credible or the most newsy, but I mean like it kind of just speaks to the power of...just one person to interest someone.

R7 also mentioned the "control" and "influence" over news events she is reading. She said she is "most concerned" with local news because she has "the most influence" there. On the other hand, she said local stories have "the most impact" on her life. She

admitted that she realizes that it is important to care about what is happening "around the world" but it is not "as important" to her because she has "no control," "no voice," and "no power" over there.

R5 does not pay too much attention to the big news events. He stated that he has not done "in-depth" reading about the "financial crisis" because no one "really knows what's going with that anyhow":

Not even the government, so if the government can't make heads or tails of it, you know um, I don't know, that's not a....certainly I'm concerned about it, but it's not something I follow terribly closely. You know, it's a bunch of mud-slinging and name-throwing right now.

R4 said he tries to avoid news because it makes him "frustrated" because he has "no power" to change the events.

g. Culture. The culture of respondents seemed to be another important factor in their online news reading behavior. R2 said she reads the local newspapers and "e-mail[s]" the obituaries to her friends to "keep them up to date on what's going on back home." She explained that "word of mouth" is important way to communicate "in the black community." R15 said she mostly reads news from the Chinese news site.

However, she said she watches TV news in English so that she can "prepare lunch" or "do other housework" and at the same time "exercise" her "English listening skills" and get "a lot of information at that time."

h. Usability of news websites. Several respondents stated that the usability and design of the news websites influence their online news preferences and their news reading behavior. R3 said that "Web design" is "really important" for him. In addition to his regular visits to the national newspaper sites, he goes to the websites that he pities. He

called it as "another thing" for his "Web habits." He visits his hometown *Chicago Tribune*'s website, which has an "ugly" website.

R7 said he skips the homepage of the local newspaper to go to news page because of the "poor design" of the local newspaper's website.

R4 is a computer programmer and knowledgeable about technology, but he has never understood how to navigate some news sites because they have confusing "links on the side." He stated he has "never cared for Slashdot's main site" because he was "never sure where all the articles are" and that he "feels like" he is "missing stuff." To avoid this problem, he uses Google News Reader. "With the RSS feed" he feels that he is not "missing anything."

R10 acknowledged that he skips the home page of the local newspaper because it has "too much information" to deal with. He does not generally find anything interesting on their front page, so he does not bookmark it. Instead, he has got "their news tab bookmarked" so that he can "avoid their front page and just go straight to a list of news." He finds the news page "much easier" to read, to "try to see everything at once," to browse, to look at "what they've identified as most useful," and then to see "if there is anything interesting" for him.

R14 likes Yahoo! news because its website is easy to use. She does not like "messy" sites, including MSNBC because they have a too-crowded look. She said the following: "there is so much going on right here for me and ... and they are very small little headlines that sometimes it's hard for me to figure out like where I want to start."

2.3. Characteristics of Incidental Exposure to Online News

This part presents findings from the qualitative phase of the present study pertinent to RQ2, which aimed to investigate incidental exposure from holistic perspective. Findings from the previous part related to online news reading behavior of respondents indicated that incidental exposure to online news is becoming a typical way for many respondents to get informed about news events. The purpose of this section is to present a more detailed picture of incidental exposure to online news with the following questions.

RQ2: What are the characteristics of incidental exposure to online news?

- 2.3.1. What are the respondents' perceptions of incidental exposure to online news?
- 2.3.2. How often do respondents experience incidental exposure to online news?
- 2.3.3. Where do respondents incidentally discover online news?
- 2.3.4. How do respondents feel about finding online news incidentally?
- 2.3.5. What types of online news do they find incidentally?
- 2.3.6. What is the connection between the incidentally exposed news content and the readers' underlying needs or problems?
- 2.3.7. How do the respondents judge credibility/quality of news stories to which they get exposed incidentally?

In order to investigate incidental exposure to online news, a few approaches were applied. First, the researcher used the critical incident technique with explication interview method to refresh the respondents' recollection of memories about their behavior related to incidental exposure to online news. Once respondents started sharing their critical incident stories of incidental exposure to online news, the researcher asked

them to share information about their general tendency to experience this behavior. The researcher also asked the respondents to define "incidental exposure to online news" in their daily news reading context. Considering the fact that respondents had different perceptions of incidental exposure to online news, the researcher attempted to reach common ground in terms of understanding incidental exposure to online news with the respondents discussing about this behavior using active interview technique. Knowledge construction with the respondents was important for the researcher to ask them how, where, and how often they experienced incidental exposure to online news and how they felt about this experience.

2.3.1. What are the respondents' perceptions of incidental exposure to online news?

The interview analysis shows that respondents' perception of their incidental exposure to online news could be divided according to the context where respondents experience this behavior. Three different contexts (see Table 4-14) emerged: news reading context, non-news reading context (e-mail), and Internet in general. Few respondents perceived incidental exposure to online news as their typical behavior to get informed about the news events without mentioning the specific context.

Table 4-14. Perceptions of Incidental Exposure to Online News

Context	What is incidental exposure to online news?	Descriptive Words
News reading context	Finding news related to their curiosity	Unusual Weird Bizarre Interesting Wildly different Different Unexpected Eye-catching Something off the wall Random things
	Finding news for learning	Did not know before Something missed Did not hear
Non-news reading context (e-mail)	e-mail environment search process	Break News that pops up News comes up when he/she is doing something else Important story in e-mail Ending up reading a news story coming from a different reason Disruption from work News found while purposefully searching for something else
Internet in general	Incidental exposure is defined because of the nature of the Internet	Everything on the Internet is incidental exposure Blurred boundaries of media How things are listed

Respondents' perceptions of incidental exposure to online news described in a news reading context could be divided into two groups. First, many respondents perceived that finding unusual news during their regular news reading process was incidental exposure to online news for them. The respondents used the following

expressions to describe news that they found with incidental exposure out of their curiosity: "unusual," "weird," "interesting," "bizarre," "unexpected," "outrageous," "off the wall," and "wildly different from the usual stream of information." The illustrative examples are as follows:

...it just might be something just so off-the-wall like that, that I would look at it...Sometimes it's just so outrageous that you just got to go look, you know, and you know look at all these little side forms, and sometimes they catch my eye. It just kind of depends, it's just I guess whatever the mood or the news of the day is. (R2)

...it is just sort of the news of the weird, just things you sort of never really even think about it but then it's just so bizarre you just need to find out about it. (R10)

Second, a number of respondents stated that finding news that could enhance their knowledge is incidental exposure to online news. The respondents used the following words to describe their perception in this regard: finding something they "did not know before," finding "something missed," and finding "something they did not hear before."

Most respondents shared their perceptions of incidental exposure to online news without discussing much about the context where it takes place. Only a few respondents tried to define incidental exposure to online news based on the context where it takes place. R5 had a very strong perception about incidental exposure to online news compared to other respondents. For this respondent, incidental exposure to online news meant running across news when he is doing something not related to news. He said that finding interesting news when he is browsing news is not incidental exposure because he has expects to incidentally discover news in this news reading context. For example, he said that he would not consider his experience of running into unexpected information at Digg as incidental exposure to online news for the following reason:

I'll wait till I have a break in my work load and like, go there and take a break, for you know, fifteen minutes, where I know that I'm expecting, you know, I just want to see what's going on. What's going on the Internet today, what are the stories out there, what are people interested in, so in that sense I guess I'm actually expecting to run into unexpected information, whereas, where I'm in my e-mail, I am hoping that I do not run into unexpected information, that it's just business as usual.

He said that "the medium" in which he is working is important for distinguishing what is incidental exposure to online news. He explained that incidental exposure to online news could happen when he receives some news unintentionally in his e-mail:

I was working in my e-mail client. Just taking care of my work tasks, and this was in my inbox and you know uh, you get a story in your inbox that's very relevant to what you do, that just kind of puts everything else on hold, you've got to kind of put that fire out before anything moves forward.

R17 also thinks that finding news on a news website is not incidental exposure:

Yeah, but, I mean, I, you go for like a reason, no like, if I go to check my e-mail and then read some news, I see that as I encounter the news, but if I go to a website, you know, a news website to read the news, I don't think it's accidental, no.

R17 defined incidental exposure to online news as "seeing news" while she is doing something else, mainly on the Yahoo! site. She said, in other cases, she does not go "anywhere near the place" where she could see news.

Most respondents did not have problem sharing their perceptions of incidental exposure to online news. However, there were a few respondents who admitted that they did not think about this behavior before the interview. R1 said she has not thought about incidental exposure to online news until the researcher approached her. She admitted that incidental exposure to news "was happening all along" and it is "not anything new."

2.3.2. How often do respondents experience incidental exposure to online news?

The researcher asked respondents about their general tendency toward incidental exposure to online news after they recalled their most recent experiences. The question seemed to be a difficult question for some respondents. Many respondents used the word "probably" to describe the frequency of experiencing incidental exposure to online news. R2 said it was a "kind of a hard question" because incidental exposure to online news does not happen "on a regular basis":

... It just comes from looking and just whatever's there. Sometimes it's 'cause something happens and I didn't know it happened, or I didn't hear about it or whatever. Sometimes it's just so outrageous that you just got to go look, you know, and you know look at all these little side forms, and sometimes they catch my eye. It just kind of depends, it's just I guess whatever the mood or the news of the day is. (R2)

R9 said incidental exposure to online news happens "pretty frequently," but she does not "really think" about the "process of how that happens" because "sometimes it just happens."

Respondents explained about the frequency of incidental exposure to online news in two different ways: quantitative and qualitative. Eleven out of 20 respondents quantified the frequency of their experience of incidental exposure to online news without any prompt. Quantitative expressions used by respondents are presented in Table 4-15.

Eight respondents said they experience incidental exposure to online news on daily basis. The daily frequency of this behavior ranged from "at least three four times" to once every day. R15 said that he experiences incidental exposure to online news

"almost every day." R18 stated she is runs across some interesting news "at least three or four times a day."

Table 4-15. Frequency of Incidental Exposure to Online News

Frequency	Quantitative Expressions
Daily	At least three or four times a day (R18)
	Probably like two, three, maybe four times a
	day probably higher (R6)
	At least once a day (R19)
	Once or twice a day while I'm at work (R14)
	Once every couple of days (R10)
	Once every day (R10)
	Almost every day (R15)
	Every day (R16, R17)
	Probably daily, every day (R9)
Weekly	Probably once a week (R2)
•	Once a week (R20)
	Probably three times a week (R12)

Three respondents said they experience incidental exposure to online news weekly. R20 said she is incidentally exposed to news "once a week" because most of her activities are "pretty intentional." She stated that incidental exposure to online news is "pretty unusual." R12 said she experiences incidental exposure to online news "three times a week" when she is not seeking the given information. Compared to other respondents she has limited access to the Internet because of her work.

Two respondents explained that they usually experience incidental exposure to online news during their busy times. R19 said he browses news two or three times a day when he is busy. He admitted that he experiences incidental exposure to some interesting news during this browsing period because "something sticks out." R10 reported that his experience of incidental exposure to online news "depends" on how busy he is "either at work" or "at home."

Five respondents used the following words to express how often they experience incidental exposure to online news: "all the time" (R3), "constantly" (R4), "frequently, quite a bit" (R7), "pretty frequently" (R9) and "not very often." (R5) Two respondents reported that they experience incidental exposure to online news "frequently." R2 admitted that she experiences incidental exposure to online news "pretty frequently." R7 also reported that incidental exposure to online news happens to him "quite a bit." R5 said that he experiences incidental exposure to online news "not very often" and called his case described in the critical incident story as "an outlier" as far as his daily information seeking behavior.

2.3.3. Where do respondents incidentally discover online news?

The interview analysis indicates that respondents identified the two types of environments where they experienced incidental exposure to online news. The response to this question was related to the perception of incidental exposure to online news. Many respondents discussed the environment where they experienced incidental exposure to online news based on the initial intentions. The first type of environment mentioned by the respondents is websites where they are unintentionally exposed to online news. The second type of environment includes places on the Internet where respondents intentionally go to experience incidental exposure to online news.

Places to experience incidental exposure to online news unintentionally

The first group of environments could be classified into five subcategories (see Table 4-16):

- 1. Websites of traditional news media organizations
- 2. E-mail

- 3. Alternative media sources on the Internet
- 4. Non-Internet sources
- 5. Social networking sites.

Table 4-16. Environment for Incidental Exposure to Online News

Environment	Description	Examples
Websites of	News sites of traditional	Local newspaper site
traditional news	newspapers, broadcast and	Local TV channel websites
media	radio	National media CNN, ABC
organizations		Media websites from places where respondents lived before
E-mail	News in e-mail	Newsletters
	environment	Receiving links to stories from other people (friends, colleagues, family members, husband) Following links to stories from newsletters News on the toolbar of Gmail
Alternative media	Different websites where	Wikipedia
sources on the	respondents encounter	Yahoo!
Internet	news (or when respondent	Headlines on the Internet
	referred to the Internet and	Ethnic/immigrant news websites
	online environment in general)	Blogs
Non-Internet	Non-Internet sources	Magazines
sources	where respondents	Radio
	encounter news	TV
		Book reviews from a newspapers
		People/conversation
Social networking	Social networking sites	Facebook
sites	where respondents	Twitter
	encounter news	Ning: professional community network

a. Websites of traditional news media organizations. For many respondents the websites of official media organizations were the prominent place to experience incidental exposure to online news. These places included the websites of local newspapers, TV stations, and national media websites, such as *CNN* and *ABC*. Many

respondents claimed that they are incidentally exposed to news at *CNN* website. The illustrative example is as follows:

... probably like a place where I guess, like I said, *CNN* is one of the places, like here, if you click here. Like here this is a lot where I go. (R6)

R10 said that he is incidentally exposed to news on the websites of newspapers from the places where he lived before:

The DailyJournal.com,... The Indianapolis Star, The Columbia Missourian, The Columbia Tribune, um, I used to live in Nebraska, that's where I went to undergraduate, so The Journal Star, is a Lincoln newspaper, and the Omaha newspaper is Omaha Herald.

He said that he visits these news websites on daily basis and comes across some interesting news.

b. E-mail *environment*. Several respondents stated that they incidentally get exposed to news in an e-mail environment in the following ways:

- News stories refreshed in an e-mail environment:
- Following links from e-mail;
- Getting news in e-mail newsletter;
- Toolbar in Gmail.

R10 stated that he is incidentally exposed to a "newspaper that refreshes" in his Gmail account. R17 said she is incidentally exposed to news at Yahoo! when she goes to check her e-mail. Yahoo! is her main way to get informed about news:

I usually find something while I'm checking the e-mail ... you check it every day ... so it's good to have some news there that pops up, and so okay, it's the Internet thing, you're on your way and reading news is quick, so it's easy, you know, and not getting bored.

Respondents stated that they experience incidental exposure to online news in e-mail environments by getting links to news stories from other people, including the dean, colleagues, coworkers, friends, family members, and spouses. R10 noted that her friends and family members occasionally "recommend" that she read certain news stories by sending e-mail messages sharing the links after "they finish reading the articles." R12 said that she is exposed to news in her e-mail "whenever" her husband sends the links to news stories to her.

R18 reported that she gets e-mail newsletters every day. She said that e-mails from the American Heart Association frequently lead her "onto a wild goose chase that's interesting." She said she also receives newsletters from her dean, who sends the articles from the *Chronicle of Higher Education* to her.

R6 said that he experiences incidental exposure to news in the top toolbar in the Gmail system, where a message comes in related to the topic of an e-mail message. He said those messages in Gmail's top toolbar are "actually tailored" and based on "whatever" he writes in his e-mail:

So if I talk to my wife about food, what are we having for dinner, would you like to go somewhere. Here, change it to food, sometimes it'll be like a food story. So. Like, you know, some of the stuff is interesting if I'm e-mailing someone about the Iraq War or something that's going on, you know, it'll come up.

c. Social networking sites. The majority of respondents reported that they experience incidental exposure to online news in Facebook and Twitter. R10 and R17 said that they occasionally get exposed to the reference to an article from his friends on this social networking site. R13 said he is incidentally exposed to news on Twitter. R6

reported that his primary ways to get exposed to news incidentally are Facebook, Twitter, and Digg:

I would...yeah I would...there's so many things on the Internet that, I would say, my two primary ways of news are through Facebook links, friends posting articles and sometimes Twitter but people don't really post a lot of links on there, and Digg. So those are my two main ways. I don't really stumble upon through news sites, just because I don't go intentionally to news sites anymore. Um...yeah, I just don't do that. I don't know why, but I don't. (R6)

R5 shared that he experiences incidental exposure to online news at professional networking site Ning.

d. Alternative media sources on the Internet. A few respondents commented that they run into unexpected news stories on blogs and websites from alternative media sources. The illustrative example is as follows:

"In blogs. I mean you never really know what to expect when you're reading them. They tend to be focused on a particular subject, but the ones I like tend to be a little broader than that. They've got a specialty area but they kind of will cover political stuff" (R4).

e. Non-Internet sources. Respondents pointed out that they run across news stories in traditional media, including by radio, TV, magazines and book reviews in newspapers. Many respondents stated that they are exposed to interesting news unintentionally when they listen to the radio while driving. R10 said he is incidentally exposed to news when he listens to the radio. R18 said that he experiences incidental exposure to news through radio in addition to the Internet. R1 reported that she is incidentally exposed to news in Readers' Digest magazine. She writes down the URL of websites while reading the magazine and checks them on the Internet later:

... it's in magazines that I get. Like if I'm reading a *Readers' Digest*, they would make a mention of some other website and you know, it could be a health websites, or a news website, something like that and I would go and visit that

website, and I would make a note of it and then whenever I would get some free time, if it addressed me personally.

R17 said she is incidentally exposed to news while she is watching movies on TV:

I don't turn on the news channel... so I just have a film going on all the time... Yeah when they finish the film and they come up with news, sometimes the weather, news, you know like attention, something like that it just comes up and then you got it.

Another major non-Internet based source where respondents experience incidental exposure to online news appeared to be personal communication and conversation with other people. More than half of all interview respondents claimed that they are incidentally exposed to news from their coworkers, family members, spouses, and friends. R12 reported that she experiences incidental exposure to news "through conversation" with other people. She said that she uses the Internet "as a tool later to follow up" those stories mentioned in conversations.

Three respondents mentioned that they are incidentally exposed to news when they talk to their spouses. The illustrative remarks are as follows:

Uhuh...like, like hear from others. I always share some interesting stories I saw or hear with my husband yeah, just for fun. (R15)

Well, I mean there's been conversations with coworkers where we'll talk about if I've heard about it, or my husband will tell me about stuff that he's heard and then, so I'll learn that way. (R14)

The interview analysis indicates that there are two patterns of action once respondents come across news through conversation and radio. Some respondents said that they check the news stories that they are exposed incidentally on the Internet later. R14 stated that he checks those news stories on the Internet by going to Wikipedia and Google "probably...8 out of 10 times." Some respondents said they do not follow up the

incidentally exposed news stories on the Internet. R15 said that she just chats and gets information from her friend, but does not "want to explore more" because "that is just some interesting story."

f. Special places for incidental exposure to online news. Respondents reported that they have the special locations on the web they intentionally visit to be exposed to online news incidentally. These places included the following sites: Digg, Drudge Report, Yahoo!, Gawker, Slate (http://slate.com/), Boing Boing, StumbleUpon (http://www.stumbleupon.com/), and Google News Reader.

R11 said that she finds "the oddities, the stories" that she cannot find "elsewhere" in *Drudge Report*, where the headings are "inflammatory" and "obvious." She discovered *Drudge Report* a few years ago when her colleague was visiting this site. R14 stated that she visits the Yahoo! site because "they have just a ton of random links." She said she likes just "clicking on something" and finding "interesting things" that she "wasn't intending to read about."

Two respondents commented that they get incidental exposure to online news at crowd-surfing sites, such as Digg or Slashdot, where stories are listed based on the voting system from readers. R5 said he is "pretty much guaranteed" that he will find "something" he was "not expecting to find" at Slashdot. He commented that with Digg is "kind of a gamble" and he "never" knows what he is going to find there. He called these the two sites where he "encounters the most unexpected information." R10 reported that he experiences incidental exposure to online news at the affiliate websites of Slashdot, including "Big Money, The Root, and Foreign Policy."

Specific locations for incidental exposure to online news

In addition to the aforementioned two types of environments, respondents reported that they have specific locations on news sites where they get exposed to news incidentally (see Table 4-17). Think-aloud sessions revealed that the specific labels, specific design elements, and actual location of news stories on the websites serve as visual cues for the respondents to discover news incidentally. Some of these locations are related to the online news reading strategies presented in 2.2.3. Each of these themes is elaborated in the following pages, including descriptions from the interview responses.

The sections on news sites labeled "Most Popular," "Most Viewed," "Most Blogged," "Most talked about," "Most e-mailed" were mentioned a lot by respondents.

The following comments are illustrative:

Probably like the most viewed, or the most e-mailed because that's actually like why I sometimes go to it, cause like this will be a way to find a story that everyone else thinks is really cool and everyone's like e-mailing to each other and commenting on it. (R3)

Data analyses demonstrate that respondents look at the specific locations when they visit media websites, such as the websites of TV news outlets and newspapers:

... I think I showed you also, here, where they talk about, so like here, most viewed. And another place I actually look at is, ... So here, I hate to admit it but these sponsored things, you see here, at the very top, here's another place. (R6)

Table 4-17. Specific Locations for Incidental Exposure to Online News

Locations/Labels	Examples
Specific labels	Most popular
	Most viewed
	Most blogged
	Most talked about
	Most e-mailed
	Sponsored links
	Affiliate websites
	Customized
Specific design elements	Photos/pictures
	Font size
	Headlines
	Videos
Actual location	Right side
	Center
	Top
	Third column
	Bottom links

Respondents also mentioned the following design elements that help them to get exposed to news incidentally: photos, pictures, fonts, headlines, videos, sponsored links, and links to affiliate websites. The actual physical location of news elements appeared to have considerable impact on respondents' incidental exposure to online news.

Respondents reported that they get exposed to news on the specific locations on the website: right side, center, top, third column, and bottom links. The following comments are illustrative examples:

I watched this on the news the last night...so it's generally in the third column, somewhere down in here...(R11)

For instance, like on Wednesday, I went there and I didn't even realize that it was Earth Day, you know. So I got into looking and the bottom of *CNN* they have all these links ... and they have uh enviro-like science and the earth takes viewers on

a high-tech journey. So I click on it and cause you know, cause that's what people were talking about. But I didn't go there specifically for that purpose. And I just wanted to see what was going on in the world today. (R6)

In addition to the aforementioned themes, some respondents referred to the Internet as whole as a place to be exposed to online news incidentally. R13 said that he "runs into …a thousand headlines on the Internet" daily. R16 reported that she experiences incidental exposure to news "more on the Internet than it is in real life" because so much of "her social presence" is there.

2.3.4. How do respondents feel about incidental exposure to online news?

The researcher asked the respondents about their general feelings towards incidental exposure to online news after they shared their critical incident stories about this behavior. Nineteen out of 20 respondents said that they have positive feelings about this behavior and described their feeling as: "lucky," "exciting/excited," "happy," "wonderful," "fun," and "amusing." They said that they "love" and "enjoy" incidental exposure to online news.

Many respondents explained the reasons they have positive feelings about incidental exposure to online news. They used the following words and expressions to explain the reasons: "so," "because," and "when I find something." Seven respondents stated they have positive feeling about incidental exposure to online news because they like learning something new, acquiring knowledge, and finding missed stories. R10 said that she enjoys incidental exposure to online news because she loves learning something new as a result of this behavior. R2 compared incidental exposure to online news to the feeling of discovery of treasure:

I guess it's kind of the thrill of the chase, like you really discovered a treasure or something. Is it exciting? Yeah. I found something and I was like, how did I miss that, and why did I miss that and maybe I'm not, maybe I was being lazy that day or maybe I was too busy that day, I don't know. Uh yeah, it's kind of a thrill. (R2)

In two cases, respondents' favorable feelings towards incidental exposure to online news were explained by the fact this behavior is their main way to get informed about news. R14 said she does not search for news because she thinks mainstream media cover too many depressing stories. She mostly runs across news at the Yahoo! portal:

It's helpful because I'm not a person that searches for news. Um, I don't really go to news sites very often.... I don't take the time to really look at what's going on. Cause it's always so depressing. So I just try not to look. But I like the little headlines, that way if there's something interesting, then I'll listen.

Three respondents mentioned the different reasons they like incidental exposure to online news. R9 said that incidental exposure to online news serves as a "guide" for her path: "I really enjoy. Maybe it's meant to be. Like spiritual not spiritual...but maybe it was, to guide my path. But here, it's like relevant." R6 shared that his positive feeling toward incidental exposure to online news was from a "social point of view." He likes incidental exposure to online news because it helps him to "talk to people" who have "diverse backgrounds" so that he could have "conversations" with them in "daily life." R12 said incidental exposure to online news is fun and compared this experience to usage of an encyclopedia:

I guess I think it is fun. Um, it's like, looking something up in the encyclopedia used to be because you would get distracted on your way to find whatever you were looking for and say, oh, well I learned something about Spain. (R18)

Four respondents seemed to have mixed feelings about incidental exposure to online news. They commented that their feelings about this experience depend on what type of content they found incidentally. The illustrative remarks are as follows:

I think it's a positive thing in general. I mean, like it can be overwhelming, definitely, you can get sucked into it too much probably. But on the whole I think it's, I like it. (R13)

I love it, I mean, what serendipity, whatever, it's a wonderful thing. I probably will. I'm embarrassed now but I spend way too much time playing online, but frankly it's really useful and I don't think any of it's particularly gratuitous. I think it's pretty fun. (R11)

There was only one respondent out of 20 who had negative feelings about incidental exposure to online news. R20 said she is not "really happy" about this experience because she is "easily distracted" by it:

Yeah cause it's mostly things that you're not really sure if it's true, if it's actual or if it's just something, somebody's their slant on it, or something like that. I guess I just don't really have a lot of time to be thinking about uh, I don't know.

Her negative feelings about incidental exposure to online news were triggered by her thinking that she mostly finds unpleasant or doubtful information on the Internet.

2.3.5. What types of news do they find incidentally?

Twenty respondents reported 24 critical incident stories about their experiences of incidental exposure to online news (see Appendix I). R9 reported four different critical incident cases of incidental exposure to online news. One of them was dropped from the analysis since the reported information was not news, but a white paper on project management. R11 reported the two cases of incidental exposure to online news.

Twenty-three news stories reported in critical incident cases were analyzed in terms of their content, source, and geographical emphasis (see Appendix J).

The following nine themes were identified as topics of incidentally exposed news stories:

- Personal safety -5;
- Politics-5;
- Entertainment/leisure-4;
- Technology-3;
- Business-3;
- Crime-1;
- Education-1;
- Disaster-1.

In five cases respondents reported that they were incidentally exposed to online news stories on swine flu, which is categorized here under personal safety. Stories about swine flu were mostly related to spread of this disease. R18 was incidentally exposed to a news story about how an MU student was detected as having swine flu after he went back to China. She received this news story through e-mail.

Five respondents reported that they were incidentally exposed to news stories related to politics. Topics of stories included the following: gay marriage regulation in Iowa, Sarah Palin losing popularity, judicial nomination of Hamilton to the Supreme Court, the captain rescued from the pirates by Navy snipers, and a backlash on Mexican immigrants.

The reported news stories originated from the following sources:

- Local newspaper websites: *Columbia Daily Tribune*, *Indianapolis Star*;
- National newspaper websites: New York Times, Christian Science Monitor;
- Websites for specific communities (professional and ethnic): NING, Chinese community website;
- National TV websites: CNN, MSNBC;

- News portals: MSN, Yahoo!;
- Alternative online news sources: Digg, Boing Boing, News Match, The
 Morning News (http://www.themorningnews.org/);
- Radio;
- Other: Google reader, e-mail, spouse.

R9 reported that she was incidentally exposed to a news story about a TV interview with the musician Prince when her husband found the story on the musician's website and told her.

In terms of the geographical emphasis of the events described in the news stories, 2 stories were local, 12 were national, and 9 were international. The most apparent example of local news story was a story about the local woman who helps make connections between the local business community and newcomers to the Columbia, Missouri. The second local story was about a teacher making changes in the community (Indianapolis), where R8 previously lived.

The researcher paid close attention to media coverage of big events during data collection to see how these events could affect incidental exposure to online news by respondents. Seven respondents out of 20 paid attention to big stories widely covered by news media during the data collection period: news stories on the swine flu, about newly famous Scottish singer Susan Boyle, and the divorce controversy from the TV reality-show *John and Kate Plus* 8.

2.3.6. What is the connection between the incidentally exposed news and the readers' underlying needs or problems?

The researcher asked why respondents were interested in the news stories to which they get exposed incidentally. The purpose of this question was to investigate the connection between the nature of reported stories and respondents' underlying needs that might have caused them to pay attention to them. The following themes emerged from the analysis:

- 1. Followup of specific news stories;
- 2. Critical needs: urgent needs related to the respondent's work and personal life;
- 3. Hobby: related to the hobbies and interests of respondents;
- 4. Personal needs: related to the respondents' personal life and family members;
- 5. Professional needs: related to the respondents' professional development and work;
- 6. Values/beliefs: related to political, cultural, religious beliefs;
- 7. Curiosity: related to curiosity because of the oddity or sensationalism of the news stories;
- 8. Sense of community: related to the interests and values attached to specific communities, including ethnic, geographical, and professional communities;
- 9. Emotional connection: related to emotional attachment to the events happened in news stories.

In many cases, underlying needs could be explained by any combination of above mentioned themes. The analysis of each of the critical incident stories is presented in Appendix K.

Eleven out of 20 respondents stated that they followed up certain news stories with incidental exposure. In other words, respondents had long-term interest in specific stories, but they did not actively seek follow-up stories. Incidental exposure to online news helped them to continue their follow-up reading. The respondents mentioned that they followed up the following news stories with incidental exposure: stories about the You Tube situation in Saint Louis, the rescue of an American cargo ship captain by Navy

snipers, the spread of swine flu, the earthquake anniversary in China, former presidential candidate Sarah Palin's diminishing popularity, singer Susan Boyle, Pirate Bay, and the handling of swine flu cases in China. R11 said she was incidentally exposed to a news story at MSNBC about the backlash of negative "bashing" on Mexican immigrants. She said it allowed her to follow up stories that she heard on radio previously. She said she was "out of touch" since she was traveling lately.

In many cases, follow-up reading was related to respondents' other underlying needs. The data analysis shows that there is no single underlying need or background problem that served as a reason for respondents to pay attention to specific news stories to which they were incidentally exposed. The initial exposure to the story about the captain happened because R7 was following the story previously:

Because it was different than some of the other articles that have come out from the rescuing of the captain, there was some more detail that had come out. It kind of puts things in a different light than what I had been hearing from other news sources.

However, her underlying needs were related to her family connection with the military. She said that "anything relating to the military" catches her "attention" because her husband was in the military for 12 years and it is "very important" for her to "keep up with the military and what's happening there."

R19, whose major is in political science, said he was following the news stories about how the Chinese government was handling swine flu cases for the last few weeks. He said getting exposed to another news story on this topic helped him to understand about the situation better: "...it seemed to answer some questions that it you know, that I was thinking about for a couple of days." He said his incidental exposure to this story

was "kind of natural" because "China is always a big interesting case study for political scientists interested in democracy."

R17 said he ran into a news story about Susan Boyle, at the Yahoo! homepage because he heard about this story from his friend two days ago and was curious about this odd story. Susan Boyle is a Scottish singer who came to international public attention when she appeared as a contestant on the British reality TV program *Got Talent?* on April 11, 2009. He said this experience was "not great" because he does not care much about this story, but he wanted to be able to converse with others.

R13 said he found a news story about local currencies because he has been reading stories about how people create currency for themselves and distribute it however they decide to within a local small area and use that as a medium of exchange rather than using the global or national U.S. dollar. The story about local currencies attracted his attention because he is "involved in a project in Columbia about this topic." He also expressed his values regarding the support of a local currency by tying such currency to the ability "to survive without relying on the national infrastructure."

Four respondents stated that they were incidentally exposed to stories about the swine flu. However, each respondent seemed to have different needs for reading the given news story about this epidemic disease. R9 said she followed up the news story about the swine flu spread at *The New York Times* website because her colleague at work said that 20 people have died in Kansas City. In this case, the initial exposure to this story happened through personal communication. She said she heard about this story first time when she was driving home.

R11 said she followed up the swine flu story to check if she needs to buy groceries and other items to last two weeks. R13 said she also followed the "different swine flu news stories." She said she was shocked to get exposed incidentally to a very recent story about an MU student who had taken swine flu back home to China. She explained that she was "embarrassed" about this story because she felt that "it was a horrible way for MU to make the news," introducing swine flu to Asia.

In two cases followup was related to respondents' sense of community. R15, a graduate student from China followed up the news story about the first-year anniversary of the earthquake in China. She said she paid attention to this story because she "cares about people there" and wanted "to know their situation."

R16 said she was interested "in the fact" that Sarah Palin "was losing popularity" because the respondent "got sick of the stories" that talked about how great Sarah Palin was. The respondent lived in Alaska for sixteen years, and she had many insights about Sarah Palin.

For R4, the connections between incidentally exposed news stories and underlying needs were complex. He said he "came across" the story about the verdict of the Pirate Bay case in Switzerland. He said it was "actually news" that he "was expecting to come across at some point":

They announced in the end of last week, or over the weekend, the verdict in the Pirate Bay case in Switzerland, somewhere in Europe. The Pirate Bay is a giant torrent site that has lots of piracy and illegal download of TV shows and movies. Well they were on trial a month ago. The movie and recording industries had taken them to court to try to sue and to get them to stop... And they were fined several million euros and sentenced to a year in jail. (R4)

R4 seemed to have several underlying needs to follow up the news story about

Pirate Bay. He said this story is related to both his personal life and work. His values of trying digital products before purchase are expressed as: "I am of a mind of try before you buy. There are some movies that I will go out and purchase right away because I know that I'm going to want to see them" (R4).

On the other hand, he admitted that this verdict affects his work:

...the way that digital media is handled in the courts affects what we can do here on campus and it, the whole copyright. I need to know about the copyright issues, so I know what we can have on our server and what we can't and try to catch any potential issues before they become issues.

Incidental exposure by R5 to a news story about the merger of Oracle and Sun Microsystems was critical for his work. His morning hours were disturbed by this news story because he was "concerned about how it might impact" his project. He uses tools developed by Sun and he was worried about whether or not Oracle was "going to continue to invest resources into developing" the software he used.

R8 said he had a critical need to sell his house in Indianapolis. He stated that he reads the newspaper *Indianapolis Star* to make sure that "nothing bad is happening in the area" and to see that "people are starting to buy houses." His sense of community affected his choice of news story about a local school, where he worked before. He was worried about his former colleagues and thought about his new job security.

Two respondents explained about their underlying needs that affected their incidental exposure to news stories related to their values. R13 was interested in the news story about gay marriage regulation in Iowa because he is "libertarian" and believes that gay marriage is "going to be the next battle of civil liberties in this country." R14 shared that she tends "to be a conservative thinker when it comes to things like abortion." She

was concerned about President Obama's nomination of David Hamilton to the US Court of Appeals for the 7th Circuit because this candidate is "viewed as an extremely liberal person." She was concerned that "the way" Hamilton "votes on Supreme Court issues would affect, culturally... the environment" of her family and her "children growing up."

R10 was incidentally exposed to a news story about the South African president, who is a polygamist. The story was odd and he was curious about the story: "something just sort of interesting, and ended up reading that, just sort of tripping."

2.3.7. How do the respondents judge the credibility/quality of news stories to which they get exposed incidentally?

The researcher asked a number of questions about the credibility and quality judgments that respondents used for incidentally exposed news stories. However, in many cases these discussions led the respondents to share their quality and credibility judgments of online news in general and not specifically focusing on incidentally discovered news stories. Respondents used the expressions presented in Table 4-18 to discuss their credibility judgments with regard to incidentally exposed news stories.

Table 4-18. Expressions Used for Credibility Judgments

Quality of Writing	Design/Usability	Other
Sources of news	Layout	Validity
Well-written	Usability	Reliability
Low quality	Design of the website	Faith
Objective		Reasonable
Slanted		Trust
Fair		Integrity
Balanced		
Bias		
Twist stories		
Balance between bias and		
quality		
Wisdom of crowd		
For high-level audience		
Accuracy		

Source of news stories.

For the majority of respondents, the source seemed to be more important than the byline or authorship of the incidentally exposed news stories. Illustrative examples are as follows:

...I read all categories, but just keep in mind, where they're coming from when they're writing. Because sometimes it's fun, cause I think it's good, because we all come with some bias. So it's good to also read what other people are saying when they do have a bias even if it like makes you mad. So, uh, yeah, I think just being aware of where the person is coming from when they're writing. (R16)

... I never, very rarely look at who it's by. Very rarely. Yeah, so. But I care about who the story if it's from CNN or if I get this from the LA Times, like I would probably just disregard it. Because you know, they don't exactly go with my political beliefs, you know. (R6)

Half of the respondents reported that they look at the sources where news stories come from. One illustrative remark is as follows:

...If I find it from a valuable news source, like if I see it on CNN or NBC or then I'll probably take more stock in than if I found it on TMC.com. Cause I don't or people, like I don't, they're just gossip ads, I don't believe those." (R14)

R9 said she also looks at sources. Depending on the topic of the stories, she said she makes judgments about the news source. She thinks *The New York Times* is biased in its reporting of political news and stories about the war in Iraq: "...U.S. government is using newspapers as a tool to get people to buy into the war and, which they have done in past wars. Military advances..."

Objectivity and bias.

Respondents had mixed feelings on the objectivity and bias of news stories. R12 said he looks at the objectivity of the story he found: "Well I like for media to be objective and I don't feel that media is objective oftentimes, I think it's slanting, so finding something that I feel is objective is important."

R6 said he tries to weigh bias and quality in the incidentally exposed news stories:

Yeah, I care, but I…like for example, I'm aware *The New York Times* is high quality, but, usually the higher quality you get, usually not always…oh let me back up…because Glen Greenwald has a news website slash blog and his is very high quality and very unbiased…so I guess I would get both quality and bias. Although bias isn't part of quality…but it's not totally. So I kind of weight both when I'm looking at a story, like *Huffington Post*—low quality, high bias, *New York Times*—high quality, medium bias, Glenn Greenwald—low bias, high quality, so the more that I can get to low bias, high quality, the more I really, whenever I, I don't even care what the title says, I see that site, I'm like oh, let me go read what they have to say.

R17 said she is incidentally exposed to news stories at the Yahoo! portal although she knows that they are "not high quality," to keep her "updated about something."

Many respondents shared that there is no way to get unbiased stories. R13 said that "no one" is "balanced" and unbiased because that is "how people perceive the

world." R14 said she "never totally" trusts media because she is "familiar with the twist, with how they [journalists] twist stories around" since she has worked for the news industry before.

Reliability.

A few respondents reported that reliability is the main criteria for judging credibility. R18 said that "perception of the reliability of the site that it is on, more so than anything else" helps her determine the credibility of the news story to which she is exposed incidentally. She believes "in everything MU tells." She explained her judgments as follows:

...if it's an academic institution and things like that I probably have more faith in it, than um, the other ones, I look at the articles I've read the first few times I go there and whether or they seem reasonable or whether they seem biased and in fact, if I've got a track record of them seeming reliable.

R12 said he "processes in his mind" by "thinking about" what he has already read in the news and what he has "discussed with other people" to judge about the quality of the incidentally discovered news stories.

Quality of writing.

A few respondents reported that they judge incidentally exposed news stories by the quality of the writing. R10 said he does not surf the Internet for "celebrity gossip" and he pays attention to the quality of writing in the news stories he is exposed incidentally:

I prefer, um, better written material. Most of the stuff that I stumble on is usually fairly high level to begin with...Um, the stuff that I generally read is targeted either for a fairly high level or at the very least a very interested audience that will take the time to read it well. So I feel like the standards are high, so the writing I feel is fairly good. (R10)

The researcher asked the respondents how much it matters whether the incidentally discovered story is written by professional journalists or not. Many respondents claimed that the news stories do not need to be written by professional journalists to be credible. R16 said that people "don't necessarily have to be paid to tell a news story." She said "if a mom was talking about how her kid was taken away by such and such" then it is "still" news, because it is coming from a "certain perspective" that needs to be taken into consideration.

Four respondents claimed that they have more trust in stories coming directly from people, not through media and journalists. R20 and R13 said they like getting news directly from people who are involved in the event or problem. R13 said he mostly is exposed to news incidentally on Twitter and Boing Boing. He said he likes the Boing Boing site because he "literally" reads about "what is happening in real time" from people on the Internet. He shared his recent experience of getting news about swine flu stories at Twitter from one guy who is "posting" about the case. He said "people are literally just talking about the topics and their perspective" where they are coming from rather than "being hidden behind this mask" of "fair and balanced" with media. He thinks those stories he found on Twitter and Boing Boing are more credible because they come from the people who are from the places where news events are taking place as opposed to CNN, which uses "their filter of perception" with "many layers of interest involved" in it.

R5 said he believes more in the "wisdom of crowds" than in the "wisdom of a single journalist." For this reason, he noted that he likes reading comments on news stories.

Design and usability of news sites.

Two respondents said that the design and usability of news websites affects their judgment about the credibility of incidentally discovered news stories. R15 said that "layout is an element" in judging the quality of an incidentally exposed story. R6 said he does not go to read news stories at poorly designed websites: "...I think if I were to go to a site that's clearly like very, if the website's like very poor, I'll assume that it's a very poor quality. Um...like the news source as well."

Summary

This chapter presented the study findings according to the stages of data collection and the sources of data. The first part of this chapter presented findings from Phase I (Web survey) with frequency distributions analysis in SPSS. The second half of this chapter covered findings from Phase II (interviews) pertinent to the research questions. The following chapter will present discussions of findings in the light of the theoretical frameworks employed in the study.

CHAPTER 5. Discussion

This study was conducted to explore the information behavior of online news readers and to provide an initial understanding of their behavior with regard to incidental exposure to online news. The study was intended to contribute to the knowledge base about the complex process of information seeking behavior and opportunistic acquisition of information in the news reading context.

The study addressed the two main research questions:

- 1. What are the characteristics of online news reading in the context of people's everyday life information seeking behavior?
- 2. What are the characteristics of incidental information acquisition in the context of online news reading?

This chapter provides a brief summary of findings and discusses the findings in the light of the theoretical frameworks employed in this study: the Everyday Life Information Seeking model (ELIS), Uses and Gratifications (U&G), and the Information Encountering (IE) model. The final part in this chapter presents a model of online news reading behavior and the types of online news readers based on the findings of the present study.

1. Online News Reading Behavior in Light of the ELIS Model

The Everyday Life Information Seeking (ELIS) model guided the present study in exploring the online news reading behavior of news readers. Savolainen (1995) operationalized a "way of life" by focusing on an individual's time budget, consumption

models, and the structure of hobbies. He said that "way of life" could be seen as a "value-based tendency to prefer or avoid various things as suggested by the concept of habitus" (p.267). The present study's results confirm that time availability and nature of hobbies/interest are important factors that affect online news reading behavior. However, there was no strong indication of the consumption model's influence on online news reading behavior except the fact that R20 does not have access to the Internet at her job due to the additional cost.

The interview analysis revealed the following emerging themes that could be placed under "way of life": nature of the work, access to the Internet and time spent on the Internet. Nature of the work covers the workplace environment and the freedom to browse the Internet. The online news reading behavior of the respondent who works in a technology-rich environment with open Internet access was much different than the behavior of the respondent who does not have access to the Internet during the day because of her job.

Savolainen (1995) operationalized "mastery of life" with two main dimensions that indicate qualities of problem-solving behavior: cognitive v. affective and optimism v. pessimism. Further, he explained that cognitive orientation emphasizes an analytic and systematic approach to problems whereas the affective orientation refers to its exact opposite: an emotionally laden and rather unpredictable reaction to issues at hand. It was difficult to apply "mastery of life" with the given two dimensions in the investigation of online news reading behavior of respondents. There was no strong indication of the usage of news reading for solving problems at hand as suggested by the ELIS model. However, the following themes emerged for "mastery of life" from the present study:

- Feelings about control (how much power people have over the news events);
- Feelings about making changes;
- Feelings about the impact of others and events;
- Feelings of hopefulness;
- Feelings of helplessness.

Respondents shared that their news-source selection depends on their feeling of control over the events covered in the news. They did not talk much about solving personal or work-related problems but expressed concerns about not having enough power or control over the events being reported by the news media. For this reason, some respondents do not read international or national news, preferring to focus on local news, where they perceive more control.

The ELIS model distinguishes the two types of information behavior: orienting v. problem-solving behavior. Savolainen (1995) distinguishes two dimensions in ELIS: seeking of orienting information concerning current events and seeking of practical information for solutions of specific problems. The findings of this study show that people read news mostly for orienting needs. Job-related needs influence their news source and story selection. People select news stories and sources that meet their job-related needs. There was not much indication of problem solving from news reading. Online news reading mostly seemed to happen for orientation purposes.

It was difficult to separate work-related needs from hobbies and personal needs in an online news reading context. During their news reading on the Internet, respondents found news or information on both sides. R4 said he has a strategy of keeping stories related to his personal interests in Google Bookmark. R6 also keeps them as unread and reads them after work. Respondents reported that they use different ways to keep news stories for future reading.

1. Behavioral Aspects of Online News Reading Behavior

The ELIS model provides a broad context for the exploration of the online news reading behavior of respondents from a holistic perspective covering social, behavioral, cognitive, and affective dimensions. This exploratory study confirms that the information behavior of online news readers is complex and that it is not easy to separate behavioral, cognitive, affective, and social parts since all of them are interwoven.

The study revealed many different behaviors associated with online news reading.

In terms of access to online sites, there were four main patterns visible in respondents' behavior:

- Direct visits to news sites;
- Subscriptions to news;
- Receiving news in e-mail;
- Customization of news streams.

Direct visits to online news sites could happen in multiple ways: memorization of the URL, bookmarking the URL, using Google search, keeping links to news sites in personal sites or blogs, and following links from e-mail, social networking and other sites.

Subscription-related behaviors included subscribing to online newspapers, podcasts, RSS feeds, Twitter, and becoming fans of news organizations on Facebook.

Online news readers use different strategies to customize news they receive. They customize browser toolbars by placing their favorite sources on them. Some people use

their personal websites and blogs with RSS feeds to tailor the news streams coming to them. Few respondents reported that they customize their I-Google homepages. Thinkaloud sessions during the interviews revealed detailed elements of the behavior taking place during the online news reading process. These behaviors included opening tabs, tab switching, skipping the homepages of newspapers' websites, clicking on the specific spots on the news sites, such as "most popular," "most viewed," top stories, and reading highly voted stories on crowd-surfing sites. People not only browse and read news online, but they also save some stories and sites for future reading. They use various strategies to do so, such as marking stories with "unread" labels, and using social bookmarking tools. Although news reading and browsing are not usually purposeful activities, respondents still try to keep their mental focus on what they are doing. Some of these activities included opening new tabs for incidentally exposed news stories or selected news stories and coming back after their browsing or searching.

The findings of the present study demonstrate that it is hard to differentiate searching from browsing behavior in an online news reading context. Most respondents said that they usually browse for news and they do not search. However, think-aloud sessions revealed that they search for interesting and relevant news during the browsing of news websites.

Many respondents stated that they follow the same routine of reading news online at specific times every day and monitor news throughout the day. There were indications that online news reading mostly happens on a habitual basis without conscious decisions. This habitual type of reading supports Savolainen's (1995) statement that habits of information seeking form a part of "mastery of life" and that they are rooted in an

unconscious level and not wholly subject to reflection. It is also in the line with James's (1914) statement that habit reduces many actions to automatic responses that require no intellectual energy.

Habits of online news reading or online news reading behavior were visible in terms of the following factors:

- Time (when people read news online): early in the morning before they start their job or in the evening (those who do not have Internet access during day);
- Frequent monitoring a few times a day (to get over boredom, to have break from work);
- Incidental exposure to online news.

There were strong indications that online news reading behavior is not only an individual process, but that it is also affected by society, culture, and other people. According to the ELIS model, culture is an important factor that influences the information seeking behavior of people. Many respondents in this study supported this notion stating that they read news to be able to converse with others. This is why they look for visual cues on the news websites marked as "most read" and "most viewed" and so on. Another group of people read news following the wisdom of the crowd, reading news on sites such as Digg. These findings related to the social aspects of online news reading support the Purcell et al. (2010) study, which found that news consumption is a "socially-engaged and socially-driven activity," especially online (p.4). This report states that news is becoming "a shared social experience as people exchange links and recommendations as a form of cultural currency in their social networks" (p.40).

2. Uses and Gratifications of Online Media

U&G theory provided foundations for the interpretation of the findings of the qualitative study to understand the news reading needs of respondents. The findings of this study show that news reading is not only a leisure activity. People have different needs and gratifications related to online news. The following themes emerged from the analysis with regard to the needs for online news reading: monitoring news, work- or profession-related needs, hobby- or interest-related needs, social needs, spiritual needs, and needs related to getting over boredom or having a break. These needs are similar to the findings from Perse & Dunn (1998), McQuail et al. (1972), and Purcell et al. (2010). Perse & Dunn (1995) found that people using computers for electronic communication satisfy the following needs: learning, entertainment, social interaction, escapism, passing time, and habit. McQuail et al. (1972) categorized media audience needs and gratifications into four groups:

- 1. Diversion–escape from routine and problems, emotional release;
- 2. Personal relationships—social utility of information in conversations, substitute of the media for companionship;
- 3. Personal identity or individual psychology–value reinforcement or reassurance; self-understanding; reality exploration and so on;
- 4. Surveillance–information about things that might affect one or will help one do or accomplish something. (p. 140)

According to Purcell et al. (2010), news meets a mixture of social, civic, personally enriching, and work-related needs in people's lives. The study found that 72% of American news consumers consume news to talk to their family, friends, and colleagues. The study indicated that 61% of them said they often find information in the news that helps them to improve their lives, and that 44% of Americans stated that news

provides a relaxing diversion or personal entertainment. Only 19% of them reported that they need to follow the news for their jobs.

Monitoring news and profession-related needs could be explained with the group of needs in the surveillance group. Respondents stated needs to monitor news on natural disasters, earthquakes, or snow storms, along with professional needs to catch up with technology or other work-related news on business, banking, economics, the school system, and so forth.

Diversion needs were visible in many cases. Respondents stated that they browse online news to have a "mental break" or get over "boredom."

People have different news reading behaviors based on context. The findings of the present study demonstrate that online news reading behavior is not constant, but varies depending on many factors. The same individual can show active, passive, and habitual news reading behavior along with incidental exposure to news in the different situations and times of the day. Online news reading behavior is based on life and mood situations and could be dissimilar in different situations for the same individual. These findings support Ruggiero's (2000) description of the scale of active v. passive behavior with Uses and Gratifications (U&G) theory.

3. Incidental Exposure to Online News

Both survey and interview analyses demonstrate that most respondents experience incidental exposure to online news. The majority of the survey respondents indicated that incidental exposure to online news is their typical behavior to get informed about the news events. Of the survey respondents, 75% said they "very" or "fairly" often come across interesting news stories online when they browse the Internet for other purposes

than news reading. These findings are similar to the Purcell et al. (2010), which found that eight in ten online news users (80%) reported that they experience "serendipitous" news consumption at least a few times a week, including 59% who said that this consumption happens every day or almost every day (p.29).

The present study used Erdelez's (2004) Information Encountering (IE) model to explore incidental exposure to online news. The model provided theoretical and methodological foundations to study the nature of incidental acquisition of information in an online news reading context. It was useful to apply the definition of information encountering developed by Erdelez (1997) as a starting point for this study and for engaging the respondents in a discussion of their incidental exposure to online news.

Respondents shared different perceptions about their incidental exposure to online news. They discussed their experiences in three different contexts: news reading context, non-news reading context, and Internet in general. Both survey and interview analyses in this study confirm that incidental exposure to news is becoming a habitual means of consuming news for many people. It is challenging to understand this behavior since it is already a part of the interwoven nature of people's information practices in their everyday lives.

Most respondents defined incidental exposure to online news as finding "unusual," "weird," "interesting," "bizarre," "unexpected," "outrageous," "off the wall," "wildly different from the usual stream of information" news while they were doing their habitual reading of online news. These definitions of incidental exposure to online news partially confirm Erdelez's (1997) definition of information encountering, which is based on "memorable experiences of accidental discovery of useful and interesting

information" (p.412). However, the respondents perceived incidental exposure to online news not only during the active news reading process but also during other habitual reading behavior. This part does not conform with Erdelez's (1997) definition of information encountering, which mainly focused on active search for information. The findings of this study demonstrate that online news reading happens mostly in a habitual way, and people still feel that they are exposed to interesting or unusual news incidentally. Only a few respondents clearly tried to distinguish incidental exposure to online news based on the context. R5 and R17 think that finding unexpected news during news reading is not considered incidental exposure to online news. R17 said finding news in a non-news reading context, such as shopping online, chatting with friends, or doing something on the Internet is "accidental" discovery of news. Their perceptions are close to Erdelez's (1997) definition of information encountering.

The findings of the present study suggest that the perception of incidental exposure to online news could be explained by two main dimensions: awareness and intentionality. There were only a few respondents who seemed to experience incidental exposure to online news unintentionally or on an unconscious level. R1 said that she had not thought about incidental exposure to online news before she was asked during the interview. She said incidental exposure to online news was "happening" to her all along and it is "not anything new." Other respondents were more aware of their incidental exposure to online news. These respondents said that they "intentionally" go to certain websites to discover news "unintentionally." The places where respondents go for this purpose were mostly online news sites, not affiliated with traditional media, such as *Drudge Report*, Gawker, Yahoo! portal, Digg, Boing Boing and StumbleUpon. This type

of intentional visit to experience incidental exposure to online news indicates that this behavior might be turning into a habitual type of news reading for many respondents.

Background and foreground problems and the IE model proposed by Erdelez (2004) were also helpful in investigating incidental exposure to online news. The notion of background and foreground problems for information encountering was applied to the exploration of underlying needs for incidental exposure to online news. The findings of this study suggest that there could be a number of interwoven underlying needs or background problems competing in the minds of people when they are incidentally exposed to online news. People could have not only one, but many foreground problems, such as writing programming codes on one monitor and browsing news on the second monitor. These findings support Erdelez's (2004) statement about how individual's information needs are based on their background problems:

At any point in time a person will have a number of discrete problems (on various subjects, with various levels of specificity, urgency, complexity, etc.) and information needs based on these problems. However, due to limitations of human perceptual system that is engaged when people seek information, and priorities people assign to their problems, a person typically attends only to one problem at a time. (p. 1015)

The four dimensions proposed by Erdelez (1995)—environment, user, information encountered, and information need addressed—were valuable elements for designing the research instruments and data analysis for this study. The following paragraphs will discuss findings of the study related to incidental exposure to online news in these four dimensions.

Environment dimension of incidental exposure to online news.

Erdelez (1995, 2004) looked at both the physical environment and the online environment in her studies. According to the present study, the five main environments where respondents experienced incidental exposure to online news include the following: websites of traditional news media organizations, e-mail, non-media sources on the Internet, non-Internet sources, and social networking sites.

The findings of this study suggest that incidental exposure to online news is not limited to activities on the Internet. In many cases, the starting point for incidental exposure to online news can happen outside the Internet, most frequently through personal communication and radio. People followed up the stories on the Internet that they heard in their physical environment. These findings suggest that online information activities, including incidental information acquisition, cannot be separated from an individual's everyday life information seeking behavior. The online portion of the environment for incidental exposure does not provide the full picture of people's information behavior. The researcher attempted to explore the type of media behavior (active, passive, ritualized) during which people were most likely experience incidental exposure to online news. As discussed earlier, the notion of dividing news reading behavior into active, passive and ritualistic categories was very challenging. According to the findings of the present study, incidental exposure to online news could happen during any of these three types of behavior.

User dimension of incidental exposure to online news.

The user dimension in Erdelez (1995) study encompasses behavioral, cognitive, and affective elements of information encountering. The present study also attempts to look at these elements of incidental exposure to online news.

All interview respondents, except one, had positive feelings about their experience of incidental exposure to online news. They described their positive feelings as: "lucky," "exciting/excited," "happy," "wonderful," "fun," and "amusing." They said that they "love" and "enjoy" incidental exposure to online news. These findings support the Erdelez (1995) and Isen (2004) studies. Respondents mostly recalled their positive experiences of incidental exposure to online news. This recall of positive experiences could be explained by Isen's (2004) study in the cognitive psychology field. Isen hypothesized that the enhancing influence of positive effect on cognition, including openness to information reception and greater levels of aspiration and exploration, may be related to neurotransmitters like dopamine being present in greater quantities during positive affect states (p.430). Positive feelings have the power to "cue positive material in memory...making it more likely that positive material will 'come to mind.'" (Isen, 2004, p.417). The evidence overwhelmingly demonstrates that "common positive feelings are fundamentally involved in cognitive organization and processing." (Isen, 2004, p.417)

It was difficult to separate the affective state resulting from incidental exposure to online news from cognitive behavior. This complexity could be supported by Nahl's (1998) study. The author explained how affective filters work during the browsing process in the following statement:

The searcher's affective filters are set to keep out or let pass anything that is felt to be not relevant to the currently defined search topic. The affective filter delineates the scope of the cognitive content for inclusion or exclusion within the query formulation. For instance, when browsing, what we are interested in determines our intention, our strategy, and our execution, consequently what we ignore or don't notice, what we look at more closely, where we stop, and what we click. (p. 60)

Respondents mentioned a number of reasons why they have positive feelings about incidental exposure to online news. Seven respondents stated that they liked incidental exposure to online news because it allowed them to learn something new, to acquire knowledge, or to find missed stories. Four respondents had mixed feelings about incidental exposure to online news. They commented that their feelings depended on what type of content they found. They said that incidental exposure to online news could be "overwhelming" and they could "get sucked into it too much."

There was only one respondent out of 20 who had negative feelings about news encountering. R20 said incidental exposure to online news "wastes her time because she is "easily distracted" by various information on the Internet.

Information dimension of incidental exposure to online news.

Erdelez (1995) divided information encountered by respondents into problem-related and interest-related categories. Problem-related information was useful and applicable to some identifiable problem areas of the users in her study. Interest-related information addressed the areas of general interest or concern. Erdelez (1995) stated that the usefulness of interest-related information was vague and was described as potential since the respondents did not have prior seeking experience related to that information.

The analysis of 24 critical incident stories revealed that respondents' background problems, which caused them to experience incidental exposure to a given news story, included the following needs:

- 1. Following up specific news stories;
- 2. Critical needs: related to respondent's work and personal life;

- 3. Hobby: related to hobby and interests of respondents;
- 4. Personal needs: related to respondents' personal life and family members;
- 5. Professional needs: related to respondents' professional development and work;
- 6. Values/beliefs: related to political, cultural, or religious beliefs;
- 7. Curiosity: related to curiosity because of oddity or sensationalism of the news stories;
- 8. Sense of community: related to the interests and values attached to specific communities, including ethnic, geographical, and professional communities;
- 9. Emotional connection: related to emotional attachment to the events in news stories.

The complexity of the interwoven information needs of respondents suggests that it is difficult to separate their information needs into only problem-related or interest-related needs. In many cases, underlying information needs for incidental exposure to online news could be explained by any combination of the aforementioned themes, which in turn, could belong to both interest-related and problem-related needs.

Due to the specific focus on news, the present study looked at the topic of a given news story, its source and geographical emphasis to discern an informational dimension. The topics of incidentally exposed news stories were categorized into nine groups: personal safety, politics, entertainment/leisure, technology, business, crime, education, and disaster. News stories related to swine flu cases were important topics for respondents' personal safety. Political content included news stories about gay-marriage regulation in Iowa, Sarah Palin, the judicial nomination of Hamilton to the US Supreme Court, the captain rescued from the pirates by navy snipers, and the backlash against Mexican immigrants.

In terms of geographical emphasis, the majority of incidentally exposed news stories were national stories, followed by international stories. Only two stories in critical incident cases were local news.

Information needs dimension of incidental exposure to online news.

Erdelez (1995) discussed present, past, and future needs with regard to encountered information. The majority of information needs in her study were present needs, which means that users encountered information from their to-do lists, but not information pursued at the time of the information encountering. Erdelez's (1995) study did not provide situations with past information needs and only a few cases of future information needs.

The focus of the present study was not specifically to examine the aforementioned three types of information needs. However, it could be concluded that there were many indications of future information needs in critical incident stories. Many respondents reported that they saved the incidentally exposed news stories for future reading and sharing with others. There were only two cases when the incidentally exposed news stories were related to the present needs of respondents. The present needs were followed by specific actions, such contacting the person mentioned in the business news story for R1 and posting a question to the technology forum about the merger of two software companies for R5. For future study, clearer definitions are needed to distinguish present, past, and future information needs.

4. Discussion about Methodology for Studying Incidental Exposure to Online News

The findings of the present study support studies by Erdelez (1995, 1997, 2004), Williamson (1998), and Heinström (2006) in terms of the methodological challenges of investigating incidental acquisition of information. The ambiguous nature of incidental exposure to online news, which mostly happens on an unconscious level, was a big obstacle for this study. Most respondents did not have problems sharing their perceived incidental exposure to online news. However, there were a few respondents who admitted that they did not think about this behavior before the interview. Many respondents used the word "probably" to share their perception of incidental exposure to online news. Evidently the questions regarding respondents' perceptions of their incidental exposure to online news were difficult to answer. R9 said incidental exposure to online news happens "pretty frequently" and it "just happens" sometime. She admitted that "it is hard to think of how, what happens" because of the media-rich environment both at her home and workplace. R2 said that "it is a hard question because news encountering happens not on a regular basis."

The wording of the interview questions asking respondents about their incidental exposure to online news was very important. The researcher used the different words to ask about this behavior. The questions were gradually modified from the first interviews to the last interviews. It was a bit difficult to conduct interviews with the first few respondents. In the beginning, respondents were asked to share their "most recent" or "most memorable" experiences of finding "unexpected news" on the Internet. Starting from the fourth and fifth interviews, the researcher started asking respondents to share

their experience of getting exposed to news online unintentionally. In most cases, it took a certain amount of time to reach the same level of understanding of what is meant by "incidental exposure to online news." The researcher allowed the respondents to describe their online news reading behavior and incidental exposure to online news based on their own perceptions. At the same time, the researcher tried to reach a consensus about the meaning of incidental exposure to online news with the active interview approach. Many respondents admitted that they did not think about or notice this behavior before the interview, although they were constantly experiencing it. Taking the approach of the active interview, suggested by Holstein & Gubrium (1995), helped the researcher to engage the respondents in talking about their online news reading behavior and to ask them to construct the meaning of various aspects of incidental exposure to online news. The interviews were treated as collaborative efforts, where the interviewer and the participant worked together to create meaning from the experience of the complex and invisible nature of the incidental acquisition of information in an online news reading context.

All techniques employed in the interview process were helpful in exploring online news reading behavior and incidental exposure to online news. A critical incident technique with explication interviews seemed to be an efficient way to capture and study incidental exposure to online news. The researcher used the active interview method in addition to other techniques. The initial goal of using think-aloud sessions was to capture incidental exposure to online news in live moments during the interview. There were only a few cases during think-aloud sessions when respondents reported that they were exposed to news incidentally. Think-aloud sessions seemed to be limited to capturing

incidental acquisition of information when the respondents were interviewed in a controlled environment. Respondents seemed to be forced to think about the opportunistic behavior of incidental exposure to online news consciously when they were asked to report about the live moments of experiencing it. However, think-aloud sessions allowed the researcher to capture many detailed behaviors completed by respondents during online news reading, such as tab opening and switching, as well as looking at the specific elements and locations on the online news sites.

5. Online News Reading Behavior Model

This study confirms that online news reading is a complex behavior, one well worthy of academic attention. With the numerous technological advancements in news delivery, people have much more flexible and rich media environments, as compared to traditional broadcast media, which follow a pre-determined schedule to disseminate news. Interview respondents stated that they are inundated with media, "soaked in media," "constantly being shot with news," and living in an "attention deficit disorder society" overloaded with news and information. They called the Internet an "interwoven network of news and information." It is apparent from the present exploratory study that due to the Internet's nature as an information-rich environment, it is becoming complicated to differentiate the types of information and information sources the Internet contains. Ambiguity and difficulty with the definition of news were visible in the following words used in the definition of news by many respondents: "anything," "whatever," "all," "general." The following quote demonstrates the challenges of differentiating news sources because of the blurring lines between media channels:

Yeah, so I guess I considered that Internet too. But Democracy Now, is really good, um, that's probably the best news out there, because she's an excellent journalist. Oh, cause I considered it Internet too because we get it through the Internet, but it's um, I can say it's Internet, but we watch it on our TV, it's through the i-tunes podcast, you can, um, get, if you have a Apple TV you can watch it on your TV, so we watch Bill Moyers and he's an excellent, excellent journalist and we watch Democracy Now with Amy Goodman, she's really good and I think now there's a PBS program that's an audio podcast. But I considered all those Internet too. (R16)

This exploratory study revealed that people perceive news differently than before. The traditional notion of news, that lands at people's front doors or that comes on their TV screens at scheduled times, is only a portion of the contemporary definition of news. The findings of this study suggest that while some respondents still keep the perception of news as tied to traditional media, another group holds a much broader perception of news that goes beyond what is reported by professional journalists. This second group of respondents considered "all of the Internet" as news. Some of them said that "anything that enhances their understanding of events happening in the world" is news. There were a few cases when respondents considered information they obtained at professional social networking sites as news. Respondents used the following descriptions to differentiate news from other types of information on the Internet: balanced, not sensational, not slanted, enhancing knowledge, objective, interesting, true, and fact based. Utility of news in their perception was explained by learning, filling a knowledge gap, having impact, utility of information obtained from news, proximity, currency, and affective features. Most respondents stated that they do not pay much attention to bylines or who wrote news stories. Many respondents said that news stories do not need to be written by professional journalists. However, they cared about the source of news or brand of news media organizations. Respondents reported that they read a wide range of online news

sources from the websites of traditional news organizations, such as *The New York Times*, *The Washington Post*, and local newspapers, to the crowd-surfing sites, such as Digg.

Some respondents also preferred to read news on portals and alternative news sources, such as Yahoo! and Gawker. A number of respondents perceived news in terms of information related to their work and professional needs. Non-native speakers of English stated that they mostly get news in their own languages from the websites of home countries.

This study revealed that it is complex to differentiate news reading behavior into active, passive, or ritualistic behavior as suggested by Nguyen (2008). The same individual can demonstrate and experience different behaviors. These behaviors can change depending on individual, social, affective, and other factors. For example, R11 set up her own personalized website with links to different news sites. She checks it several times a day. Her behavior related to setting up the page was active or purposeful, but when she goes to this site she does not have any specific goal. She monitors news several times a day by visiting her personalized site, which could be considered a ritualistic behavior. On the other hand, she experiences incidental exposure to online news by looking at her Web browser's customized toolbars. She clicks on those toolbars passively to take a break from her work, which is her passive news reading behavior.

Most people do not spend much time intentionally seeking news. They are exposed to news incidentally on their way to check their e-mail, much like being exposed to news in the physical world while going to the store to pick up something. The Internet is a huge place where they could easily discover news accidentally without making much effort. These findings support the Purcell et al. (2010) study about online news

consumers. According to this report, people's news consumption is based on "foraging and opportunism" (p.2).

Based on the findings from the present study, online news reading behavior could be illustrated with the model in Figure 5-1. This model, which is based on the ELIS model, aims to demonstrate where incidental exposure to online news could be placed in everyday life media usage. It shows how different news reading behaviors could change from one to another for the same individual over time. The most typical way for online news reading to take place is in a habitual or ritualistic way. People have established habits of visiting news sites, getting subscriptions with Google News reader, or receiving e-mail links from others. During this habitual news reading behavior and other non-news related activities on the Internet, readers could get exposed to news incidentally (big news events or something related to their core needs or problems), which could lead to more active searches for news on the given topic of their interest. Active news reading could also lead to incidental exposure to online news. For example, R17 reported that she incidentally gets exposed to online news at the Yahoo! portal, and it is her main way to be informed about news events. Incidental exposure to online news could gradually become a habit for readers. The connections and shifts among different news reading behaviors are marked with arrows on the model. News reading behaviors, including habitual, incidental, and active are drawn with the circles. The sizes of the circles demonstrate the prominence of each behavior in the overall news reading behavior of readers. Habitual news reading is a dominant behavior for readers. Therefore, it is represented with the biggest circle.

Four main factors could affect online news reading behavior: "way of life," "mastery of life," values, and external factors. "Way of life" could be defined by four elements: workplace, interest/hobby, access to the Internet, and available time. Time could also include how frequently a person accesses the Internet. "Mastery of life" could be defined by a person's feeling of control or power over the events taking place and the feeling of making changes.

External influence from social events taking place, culture, and where a person lives could play an important role in news reading behavior. Big news events, social influence from other people, and culture could affect all three types of news reading behavior.

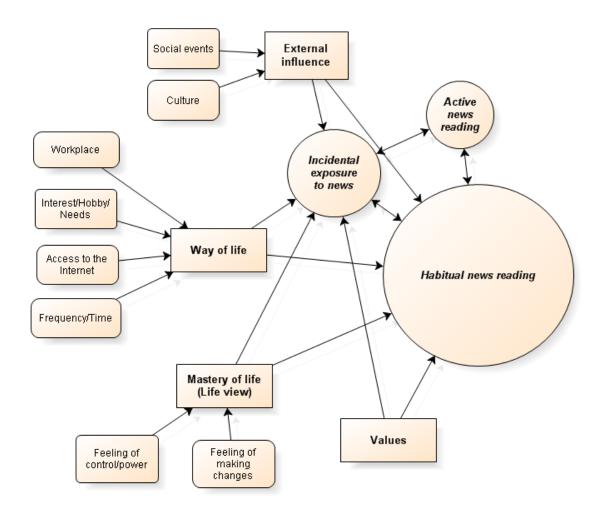


Figure 5-1. Online News Reading Behavior

6. Types of Online News Readers

No matter what their perception of news was and which news websites they visited, most respondents reported that they have established habits or rituals of monitoring news. This behavior went from the extreme of relying on incidental exposure to news to heavy and active reading of news. Based on this exploratory study online news

readers could be divided into the following groups: avid news readers, news avoiders, news encounterers, and crowd surfers (see Table 5-1).

Avid news readers.

These readers might be coming from the core group of newspaper readers, who have lifelong habits of reading news. This group of readers relies on traditional news sources, including the websites of local, national or hometown newspapers. Based on this group, it could be concluded that newspaper readership did not disappear. They only changed their medium of reading, switching to online versions. Avid news readers seemed to have higher trust in mainstream media.

News avoiders.

This group of news readers does not care much about the general news events covered by the mainstream media. They mostly focus in their job and hobby/interest related areas. The mainstream media do not meet their news or information needs. They mostly visit alternative news sources or aggregate websites and they do not go to the websites of mainstream media. A few respondents from technology areas stated that media are always behind in reporting technology news, which is changing rapidly. The respondents in this group try to avoid news because it makes them to "feel depressed" and they feel "bad about not having control" over the events covered in media. However, they end up getting incidentally exposed to general news at different spots on the Internet, including their professional network sites.

News encounterers.

There was a group of respondents who mostly rely on incidental exposure to online news as their typical way of getting informed about news events. Compared to

avid news readers and news avoiders, they do not have an established habit of checking certain news sources on daily basis. Their online news reading is random and depends much on the stories they encounter in different contexts, both online and in their physical environments with radio and personal communication. Incidental exposure to news is their main habit of reading news.

Table 5-1. Types of online news readers

Types of online news readers	Source they mostly read.	Frequency of news reading (high, medium, low)	News attitude	Perception of news encountering
Avid news readers	Traditional news sources Broad news	Daily visits, monitoring a few times	Higher trust of media	In news reading context
News avoiders	Nontraditional media sources or alternative news sources (they encounter news from traditional media) Mostly focused on their job and hobbyrelated areas in news source and story selection	Daily visits, monitoring a few times	Low trust of media	Broad: during other unrelated activities
News encounterers	Different sources	Random	Mixed feelings	Broad: during other unrelated activities
Crowd surfers	Crowd-surfing sites	Daily visits	Believe in masses not in media filter	

Crowd surfers.

This group of readers relies on crowd-surfing websites in their terms. They like reading "newsworthy" stories voted on by visitors to the site rather than relying on the

stories selected by news media. They check if there is any spin in news stories covered by mainstream media. They trust the "wisdom of crowd" rather than the viewpoints of journalists. The notion of "the wisdom of the crowd" would raise many questions about the credibility of news stories and trust of media.

7. Fragmentation of Audience

Respondents' tendencies to have subscriptions to news of their interest and to follow cues on the news sites marked as "most read," "most popular," or most voted raises a similar question to that raised by Chaffee & Mezger (2001) and Havick (2000). They noted that enhanced control over what to read on the Internet provides an opportunity for online news readers to pursue their own interests. On the other hand, they said that this opportunity might fragment media audiences. Katz (1996) cautioned that individually tailored media use "seems to be fast displacing national comings-together, and pleasure seems to be pushing public affairs ever more out of sight" (p.25). Findings of the present study support this claim partially. News avoiders seemed to be uninterested in general news, focusing instead on their narrow interests and relying on alternative sources of news. On the other hand, the rich information environment lets people discover news incidentally no matter whether they are interested in general news or not. In this sense, all types of online news readers seemed to be aware of the main events happening in society. For example, R10 reads blogs on topics that are interesting to him. However, he prefers to read professionally written news pieces for more personal and citizenship-related interests. He does not read news on MSN and Yahoo! portals compared to many other respondents. He said the following:

Things that are personal interest and things that are maybe pretty esoteric, those I'll read just about anything that is written. But for things that are of more personal and citizenship oriented interests, uh, those, I'll usually follow if they're professionally written. I find the writing quality for blogs very...it's too widely, over too many broad topics to really make the jump that they can be regularly used for good information. (R10)

These findings support Lee's (2009) study and Purcell et al. (2010). Lee (2009) studied incidental exposure to news comparing public agenda with media agenda. Incidental exposure to online news could help people get informed about important news on public affairs, overcoming the fragmentation of audience tendency. According to Purcell et al.(2010), the process of news consumption by Americans is based on "foraging and opportunism," which is essential to forming public opinion and creating informed consensus (p.2).

Summary

This chapter discussed the findings of the study in the broader context of human information behavior research and mass communication studies with the theoretical frameworks of the Everyday Life Information Seeking (ELIS) model, the Uses and Gratifications (U&G) theory, and the Information Encountering (IE) model. The researcher proposed an online news reading behavior model based on the findings of the study. The chapter also presented the four main types of online news readers that emerged in the present study. The following chapter will present implications and limitations of the study along with the suggestions for future studies.

CHAPTER 6: Conclusion

This chapter presents the implications and limitations of the study. It also proposes potential directions for future studies both in general online news reading behavior and in incidental exposure to online news.

1. Implications of the Study

The findings of this study demonstrate that news media organizations need to come up with better business models for keeping existing readership and attracting more news consumers. Mass media and communication researchers need to investigate more about how media can expand their news services to all four types of news readers proposed in the present study. Mainstream media outlets should think about how they could improve the perceived trust in news across all four types of news readers, along with discovering the sites on which they may be able to post their stories and links to their stories. Media outlets could try to entice readers with interesting headlines, images and other elements. The present study indicates they should promote their stories on digital crowd-oriented websites. Another important finding from the present study is that most respondents did not care much about the source of information, which raises the question of how to help people to be more information literate in an online environment with plethora of information. More analysis of online news reading behavior could also be beneficial in educating the public on information literacy and in providing insights about the credibility of online sources.

Understanding online news reading behavior, including incidental exposure to online news, may help media practitioners and other information agencies working to

disseminate information and news for citizens. The proper structure and design of information sites and the placement of important news stories at appropriate places would help to promote a democratic society, encouraging people to hear and see news not only from like-minded people, but also from opposing views. It will be especially important for media organizations to place links to their important stories in different corners of the Internet, where people could get exposed to news incidentally. This way, the media industry could expand from its core consumers, reach a broader audience, and fulfill its role in promoting the public discussion of important issues.

2. Limitations of the Study

Due to the complex nature of incidental exposure to online news, the researcher modified interview questions related to this behavior. Inconsistent questions about incidental exposure to online news, especially in the first few interviews, might have affected the respondents' descriptions of their experiences. It was a process of conducting a grounded theory type of study where the researcher could modify interview questions to get better responses to the given questions. It was a constructive process of understanding the nature of news encountering in this study.

Findings of this study are limited because of the exploratory nature of the study and sampling. Recruitment of the survey respondents through the website of a local newspaper, affiliated with one of the most prestigious journalism schools in the country, skewed the sample to a group of highly educated and dominantly white respondents. The respondents' online news reading behavior and incidental exposure to online news in the present study are not generalizable to the overall population of the US.

Since data collection took place on the testing laptop and computer in the lab, there were some limitations for respondents to show their news reading behavior naturally. Most respondents did not have a problem using the test computer and describing their behavior. However, a few respondents were not able to show their setup for browsers and tools they use for online news reading. R20 was not able to show or explain how she uses her toolbar for alerts. R3 also had difficulties showing how he sets up his toolbar, but he sent the image from his Mac laptop after the interview. The researcher was aware of this potential problem. However, it was too complicated to ask the respondents to get access to their computers and to get permission to install the Morae Recorder. This problem should be taken into account in future studies on the information behavior of online news readers.

There were certain indications of the impact of big news events covered in news media on the critical incident stories reported by respondents. The researcher was cautious about this effect and tried to collect data within a short of period of time.

However, the researcher was unable to fully control the time frame for data collection and the exposure of respondents to constantly changing world and national events covered in news media and the Internet. Seven respondents out of 20 paid attention to hot stories widely covered by news media during the data collection period: news stories on swine flu and sensational stories about the singer Susan Boyle and the divorce of American reality-show family Jon and Kate Gosselin. This kind of sensational and emergency type of story might have complicated the exploration of connections between the incidentally exposed news stories and underlying needs of respondents. In future studies, researchers could eliminate sensational stories, while investigating the underlying

needs or background problems, to decrease the effect of big events covered by news media.

Despite think-aloud sessions, the most parts of data collection were based on the subjective feedback of respondents about their online news reading behavior and their incidental exposure to online news. Researchers could use different research methods, such as diary writing, in addition to think-aloud and critical incident techniques, to study the opportunistic acquisition of information, including incidental exposure to online news.

3. Future Studies

Savolainen's (2008) model of everyday life information practice might provide a great potential theoretical framework for studying online news reading behavior since news reading is not an active information search, but mostly happens on a habitual basis. This model distinguished three main modes of information practice, accomplished in the context of the world of daily life: information seeking, information use and information sharing. The context refers "to the totality of experiences" of both individual and interpersonal actions (p.64).

Future studies could focus on online news reading behavior among representatives of different social classes, occupations, and generations. Savolainen (1995) mentioned that the generation to which individuals belong naturally could add more to social classes. The potential avenues for future research could focus on the social and affective dimensions of online news reading behavior, collaborative information seeking behavior, the credibility of online information, digital literacy, the impact of

social media on digital society, information literacy, and information access in digital environments.

Another interesting direction for studies on online news reading behavior could be usage of the Diffusion of Innovations theory to understand the differences among the behaviors of people based on their adaptation and usage of technology in online news reading. A close study of the early adopters of online news readers could reveal a lot about how they utilize different tools to meet their news needs. This type of study could be useful not only for online news system designers, but also for non-technology-savvy readers.

It should be noted here that it was labor-intensive work to cover both online news reading behavior and incidental exposure to online news in a single study. Future studies should focus separately on each question. Due to the enormous amount of data collected with this mixed method study, video files were not analyzed. The analysis was conducted on the transcripts of the audio during think-aloud sessions. Thorough analysis of video sessions from the think-aloud part should reveal much more nuanced information about the online news reading behavior of respondents and their incidental exposure to online news. Deeper analysis of audio and video sessions with respondents could be more beneficial to explore affective and cognitive characteristics of online news reading behavior and incidental exposure to online news.

The present study shows that human information behavior and library and information science theories could be valuable for studying media audiences since people's perception of news is very broad and goes beyond the traditional definition of news. People have a hard time distinguishing different types of information, including

news, because of the blurring lines between different types of information and information providers, and because of the increasing number of blogs and other types of information written by ordinary people. It might be informative to study the design and news content of alternative news sources online and see why they attract news readers. Many mass communication studies may be limited to studying the online versions of traditional news sources. Content analysis could be conducted for alternative news sources and compared with Web analytics to see what stories are attracting more readers.

Collaborative news reading behavior and a preference for visiting crowd-surfing sites rather than traditional news media websites shows the phenomenon of how society, culture, and individuals affect information seeking behavior or information practice in general, not only in the context of news. On the other hand, the behavior of following certain cues on the news sites raises important questions about gatekeeping and agendasetting in online news media. With the rapid development of the Internet and social networking sites, ordinary people seem to be turning into gatekeepers, a role traditionally assigned to journalists and mainstream media outlets. Social behavior or collaborative news reading behavior online would be rich topics for future studies. Inquiries in this realm should explore the mechanism of marking stories on news sites with tags such as "most read." Who decides to mark and put the list of stories under these "most" categories? Does it happen automatically? How often is the list of most viewed stories updated? Is there any editorial involvement in choosing these stories as "most" read? On the other hand, studying collaborative news reading from the user side could enrich media audience studies. Who comes to the news sites and affects the marking process of

"most read" stories? Who follows these cues? All of these questions should be important material for future studies.

Future studies should also continue to investigate the connection between the types of online news readers proposed by this study and the types of information encounterers described by Erdelez (1995).

Appendix A: Survey instrument with informed consent form

Welcome Page

Dear Participant,

You are invited to participate in the study: Incidental exposure to online news in everyday information seeking context, being conducted by Borchuluun Yadamsuren, doctoral candidate of the School of Information Science and Learning Technologies at the University of Missouri (MU). Please use the survey buttons below, not your browser controls, to navigate. "Back" will take you to the previous page, "Next" advances the page, and "Exit Survey" exits the survey. You are free to move back and forth between pages to adjust your answers.

However, once the survey is submitted ("done") you will not be able to make any changes.

Please read and respond to the following Informed Consent page, which is a legal requirement of my university. You will then be able to continue with the survey.

Informed Consent

University of Missouri supports the practice of protection for human subjects participating in research. The following information is provided for you to decide whether you wish to participate in the present study.

The purpose of this study is to explore information behavior of news readers, more specifically how stumble upon news on the Internet unexpectedly. You will be asked some questions about your general news reading behavior and your experiences of incidental exposure to news on the Internet. The planned time frame for the survey is about 5-10 minutes. The first 100 respondents who complete all questions in this survey will get a coupon for a free cup of coffee at Kaldi's in Columbia, MO.

While the study involves minimal risks to you, the following procedures will be taken to protect against all potential risks:

- 1. Your participation in this study is voluntary.
- 2. You have the right to withdraw from the study any time with no questions asked and no repercussions. If you decide to withdraw, all of the pertinent data will be destroyed.
 - 3. You have the choice of omitting any question/s you choose not to answer.
- 4. Your responses made during the online survey will be available only to the student researcher. The information you contribute will be strictly confidential. Neither your name nor the names of your team members or leaders will be associated with any write up of the information gathered in the focus group.

- 5. Your permission is requested to allow the online survey results to be used in the presentations at professional conferences and printed in professional publications.
- 6. Copies of any resulting publications, such as journals article submissions, will be available to you upon request.
- 7. If you have any questions about this research study, please feel free to contact Borchuluun Yadamsuren at 573-884-1737 or by e-mailing her at by888@mizzou.edu. My dissertation supervisor, Dr.Sanda Erdelez, will also be available for questions by calling 573-882-3258 or by e-mailing her at erdelezs@missouri.edu. For additional information regarding human participation in research, please feel free to contact the UMC Campus IRB Office at 573-8820-9585.

Sincerely, Borchuluun Yadamsuren Doctoral candidate 111 London Hall Columbia, Missouri 65211 E-mail: by888@mizzou.edu

Phone: 573-884-2737

Do you agree to participate in this survey?

- Yes
- No

Incidental exposure to news

- 1. News can be found in unexpected contexts.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 2. Sometimes I stumble upon interesting information on the Internet even though I am not consciously looking for it.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree

- 3. I have stumbled upon online news at times when I was browsing the Internet for other purposes than news reading.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 4. I often lose track of my work on the Internet because I follow interesting links to other websites.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 5. I have come across an interesting news story at times when I am browsing the Internet to read news.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 6. I often come across useful information when I am not looking for it.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 7. I often stumble upon unexpected news story when I search the Internet for specific news stories.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 8. I like to click on the different links on the websites and find interesting information.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree

- Strongly Agree
- 9. I stumble upon unexpected news story when I search the Internet for non-news related information.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree

News Reading Behavior

10.	In an	average	week,	about hov	v many	days	do	you	read	online	news	?

- None
- One
- Two
- Three
- Four
- Five
- Six
- Seven
- 11. Please mark how often do you use the following sources to get informed about news events.

Always Sometimes Rarely Never

newspapers

magazines

TV

Radio

Internet

Friends

Other

- 12. Please type the name and address of your top five favorite online news sites
- 13. How much attention do you generally pay to online news? (Choose all applicable answers)
 - A lot of attention
 - Some attention
 - Only a little attention
 - No attention at all
- 14. Why do you read news? (Choose all applicable answers)
 - to be informed about events happening

- to have conversation with others
- for leisure
- for my work/career
- other _____
- 15. Which device do you use to read online news? (Please choose all that apply)
 - Laptop
 - Desktop at office
 - Desktop at home
 - cell phone
 - public library computer
 - other (please specify)

Online News Reading Behavior

- 16. I subscribe to free e-mail alerts of general news
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 17. I subscribe to free e-mail news alerts related to my own interests only.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 18. I set up personalized page offered by Internet services and online news providers
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 19. I set my favorite news home page as the default front page of your browser
 - Strongly Disagree
 - Disagree
 - Neutral

- Agree
- Strongly Agree
- 20. I use search tools to find news of my interest.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 21. I get updated news from the Internet several times a day.
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 22. I visit a number of sites for the same news item
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 23. I get audio news on the Internet in addition to reading
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 24. I get video news on the Internet in addition to reading
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 25. I click on links to related stories for in-depth coverage (including background information)
 - Strongly Disagree

- Disagree
- Neutral
- Agree
- Strongly Agree

26. I participate in online news polls

- Strongly Disagree
- Disagree
- Neutral
- Agree
- Strongly Agree
- 27. I find other perspectives from alternative sources (outside the news mainstream media)
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 28. I go to an information exchange site to express my opinions on news events
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 29. I receive links to news stories from my friends and colleagues
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree
- 30. I read weblogs
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree

- 31. I subscribe to RSS (really simple syndication) feeds
 - Strongly Disagree
 - Disagree
 - Neutral
 - Agree
 - Strongly Agree

Demographic data

- 32. What is your gender?
- Male
- Female
- 33. Your age:_____
- 34. How would you describe your race/ethnicity?(This information will be used for statistical purposes only)
- White
- African American
- Hispanic
- Asian American/Pacific Islander
- American Indian
- Other (please specify)______
- 35. Which of the following categories is closest to your TOTAL HOUSEHOLD's income for the past year? (Please remember this information will be used for statistical purposes only)
- Less than \$10,000
- \$10,000 to less than \$20,000
- \$20,000 to less than \$30,000
- \$30,000 to less than \$50,000
- \$50,000 to less than \$100,000
- More than \$100,000
- 36. What is your highest level of completed education?
- High school or less
- Some college
- Four year college degree
- Some graduate work
- Graduate or professional degree
- 37. How would you describe your employment?

- Employed full time
- Employed part time
- Retired
- Student
- Not employed

Internet and computer usage

- 38. I use computers.
 - Excellent
 - Very Good
 - Good
 - Fair
 - Poor
- 39. I use the Internet.
 - Excellent
 - Very Good
 - Good
 - Fair
 - Poor
- 40. When I think about my experience with computers, I consider myself:
 - Excellent
 - Very Good
 - Good
 - Fair
 - Poor
- 41. When I think about my experience with the Internet, I consider myself:
 - Excellent
 - Very Good
 - Good
 - Fair
 - Poor

Invitation for further study

I may invite you to participate in a short (30 min) interview about your online news reading behavior. The Interview will be scheduled at your convenience. Please provide your name and contact information.

1. Contact information	
Name:	
City/Town:	
ZIP/Postal Code:	
E-mail Address:	
Phone Number:	
Thank way	
Thank you	
Thank you very much for particip	ating in my study. First 100 respondents who
completed the survey will be given a coup	oon to get a free cup of coffee at Kaldi's in
Columbia, MO. Please make sure to leave	e your e-mail address below.
Your e-mail address:	
Address:	
E-mail Address:	

Appendix B. Screenshot of the banner at the newspaper website



Appendix C: Interview questions

People read news on the Internet in different ways. In most cases, we have certain goals to find specific news related to our interests. However, we may also accidentally stumble upon unexpected news on the Internet unintentionally.

Take a moment and try to recall your most recent experience of stumbling upon a news story online.

1.	When did this event of stumbling upon unexpected news on the Internet happen? Probe:todayyesterdayless than a week agomore than
a w	veek ago
2.	Describe what happened? (for example, provide the context of the event, what type of news story you found, where did you find this story, what were you doing, what site you were visiting? Etc.)
3.	Why did this news story get your attention?
4.	Can you describe how you felt and what you were thinking about <u>immediately</u> before the moment you stumbled upon the news story on the Internet?
5.	Can you describe how you felt and what you were thinking about <u>immediately</u> after that event occurred?
6.	What did you do after you stumbled upon this news story? [Probe:
_	I went deeper down to other links to find relevant stories
_	Sent the story to my friends
-	Saved the story and moved back to my original work
-	Did not go back to my original work
-	Do not remember]

7. What did you do with news story that you stumbled upon? (i.e. did you use it

in some way)

- 8. Describe how often do you stumble upon news stories on the Internet?
- 9. Describe when do you stumble upon news stories on the Internet?

Additional probing questions:

- How does incidental exposure to unexpected news stories online happen?
- How much they are aware of IIA? Do they perceive it is a typical behavior?
- In which type of media usage pattern (active, purposive, or ritualistic) people are more likely to experience incidental exposure to online news?
- Where do they incidentally discover online news? (online media sites, non-media sites, search process, browsing, social networking, or in a physical world, what kinds of news do they find incidentally)
- What is the connection between the encountered news content and the readers' underlying needs or problems?
- What causes them to follow links with incidental exposure?
- What are their value judgments for the news item they discovered incidentally?
- How do they feel about finding online news incidentally?

Appendix D: Interview analysis steps

Phase	The nature of the	Goals	Method or	Outcome
	analysis		technique	_
I	Note-taking and initial analysis of each interview	- to capture the first impressions and initial analysis - modify the questions based on each interview, especially how to ask questions about IE - Fix any problems with data collection methods and technology - Select the next respondents properly to include the variety of people	Open coding	-Document created for each interview with the detailed description about the respondents and the highlights from the interview on the important questions - Modification of the instrument, interview questions - Affected the selection of next respondents
Π	Reading the transcript of each interview on the paper	- More detailed reading and analysis of interviews after the interviews were transcribed fully - Look for emerging themes	Open coding -Used the concepts from ELIS and IE model for coding -Used the interview questions for coding	 initial code table started writing down about the decisions for inclusion for each node coding on the paper copy writing down thoughts and interpretations on the paper
III	Reading the transcript again to code in NVivo	- To get better sense of each interview transcript - Conduct more deeper analysis of each interview - Add/revise coding - Look for emerging themes	Open coding and axial coding Constant comparison	-revised coding table - more emerging themes

III	Coding in NVivo	- More detailed reading and analysis of interviews - Used the concepts from ELIS and IE model for coding - Used the interview questions for coding - Look for emerging themes	Open coding and axial coding Constant comparison Also conducted the detailed analysis of critical incident cases and preference of news sources by each respondent using Sonnenwald's information horizon method	-transcripts were imported into NVivo - creation of free nodes - creation of tree nodes for more complicated concepts - modification of some free nodes to tree nodes - the number of emerging themes was recorded
IV	2 nd round coding in NVivo	-Check the consistency in coding -double checked all nodes and fixed any problems with my previous codingApply the latest coding decisions to all interviews analyzed in the beginning stage of previous phases -Make sure to code them with codes emerged at the later stage of the analysis	Open coding and axial coding Constant comparison Checked the initial analysis of critical incident cases and preference of news sources by each respondent using Sonnenwald's information horizon method.	- Consistent coding through all interviews - Finalized copy of the coding table

V	Node analysis (including free and tree nodes)	- Select the most important nodes directly related to my RQs - Analyze each node and categorize bigger concepts to more detailed structure	Axial coding Constant comparison	 List of the nodes pertinent to RQs Consistent coding for all free and tree nodes Start writing Findings and discussions
VI	Node analysis (individual node analysis)	Used the NVivo functions to check the number of references for each interview Checked if all interviews are coded with appropriate nodes. This way I checked to make sure that earlier interviews were coded with the emerging themes. Compared the chart graphs before and after axial coding. Uncoded unnecessary quotes and coded the missed parts to the appropriate nodes	Axial coding Constant comparison	Consistent coding for all free and tree nodes Data analysis and writing
VII	Individual node analysis	Textual analysis to write findings	Axial coding	Data analysis and writing process

Appendix E: Coding sheet

Nodes	Which	Explain how the	Where does this
	RQ does	researcher coded	node come
	it relate?		from?
perception_news	RQ1	How did respondents define news? (their perception)	Emerging theme
ELIS	RQ1	How news reading and source selection could be explained from the ELIS perspective?	ELIS
way_of_life	RQ1	How respondents' way of life affect news choice and news reading behavior of people?	Emerging theme
mastery_of_life	RQ1	How the feeling about power and the ability to make changes on the news events affect respondents' news reading? What sources do they read, what topics they are interested in etc.	Emerging theme
News_emotions	RQ1	How respondents' news reading is affected by emotions and feeling? (emotional characteristics of news reading)	Emerging theme
affective_behavior	RQ1	How emotions and affective side influences respondents' news reading behavior?	ELIS
News_sources	RQ1	What sources people use to get informed about news events? (RQ1)	ELIS
News_avoidance	RQ1	Descriptions where respondents talk about how they try to avoid news	Emerging theme
tab_use	RQ1	Descriptions about how respondents use tabs in the browsers for news reading	Emerging theme
Online_news_reading	RQ1	Actual behavior of how people read news online	Behavioral aspects

Online_news_reading/order		When respondents say that	
ed_reading		they have ordered routine of	
cu_reading		checking the certain number	
		of news sources (behavioral	
0.11	D 0 1	aspect)	
Online_news_reading	RQ1	When respondents open the	
/tab_switching		several different tabs in the	
		browser and switches	
		between them (behavioral	
		aspect)	
Online_news_reading/savin	RQ1	When respondent shares his	
g_for_future_reading		experience of marking	
		stories as "unread" and	
		bookmarking	
Online_news_reading	RQ1	When respondent reads	
/customization	I.Q1	news with customization,	
Customization		,	
		such as Google News	
0.11	D 0 1	Reader etc	
Online_news_reading /	RQ1	When users' news source	
sense_of_community		selection is influenced by	
		his/her sense of community	
Online_news_reading /place	RQ1	Place, where respondents	emerging
- Work (R2)		read online news	
social_networking	(not	How respondents use social	emerging
	directly	networking sites?	
	related to		
	my RQs)		
Favorite_news_topic	RQ1	What topics respondents	
Tuvome_news_topic	11.21	like reading in news?	
News_reader_types (tree	RQ1	Types of news readers	
node)	KQ1	Types of news readers	
node)			
Navya raadan tymaa/alamaiat	DO1	Dandora who shoot nove	
News_reader_types/alarmist	RQ1	Readers, who check news	
		for preparedness (natural	
		disaster, health concerns	
-		etc)	
News_reader_types/avoider:	RQ1	Readers who try to avoid	
- negative		news because of different	
emotions		reasons	
News_reader_types/transmit	RQ1	Respondents who share	
ter	_	news with others through	
		different channels:	
		Facebook, e-mail etc	

News_reader_types/wired_n	RQ1	Readers who mostly rely on	
ews_reader	IVQ1	the Internet for their news	
ews_reader			
1	DO1	consumption	
news_attitude	RQ1	How the respondent feels	
		about news in general?	
		(their attitude)	
cell-phone-reading	RQ1	When users described how	
		they use their cell phone	
		(iPhone) for news reading	
Search	RQ1	When users described about	
		search behavior in online	
		news reading context	
Social_behavior (tree node)	RQ1	Social aspect of news	
Social_behavior (tree node)	IQ1	reading	
Social behavior/shoring	DO1	Ÿ	
Social_behavior/sharing	RQ1	When respondents share news with others (e-mail,.	
		` '	
		personal communication,	
		social networking sites etc)	
Social_behavior/	RQ1	when respondents expressed	
need_to_converse		that they read news to be	
		involved in social	
		conversation	
Social_behavior/educate and	RQ1	reads news to educate others	
impact others		and have impact on their	
		lives	
Social_behavior/follow	RQ1	When the reader follows	
others		what other are reading in the	
		society, and the digital	
		crowd	
cognitive_behavior:	RQ1	cognitive aspect of news	
cognitive_benavior.	IQ1	reading	
Цотородо	DO1		
Homepage	RQ1	What is the homepage of	
Canaa of a service '	DO1	respondents?	
Sense_of_community	RQ1	When their behavior was	
		related to sense of	
		community (being informed	
		about their home country,	
		culture, getting news in their	
		own language)	
Online_news_types	RQ1	different types of online	
		news as defined by	
		respondents	
		•	
	1	201	

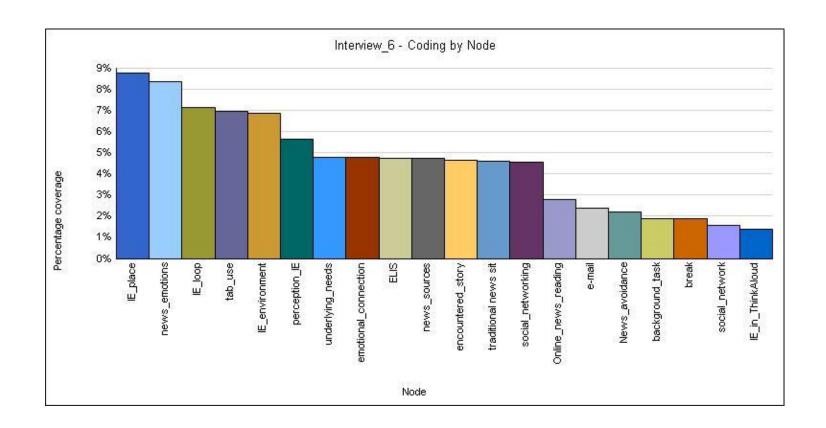
Online_news_types/google_	RQ1	Description about Google	
news		news	
preference_criteria_online	RQ1	when respondents talked	
		about why they prefer	
		certain online websites or	
		resources over other media	
		types	
U&G	RQ1	Uses and gratifications of	
		reading online news	
technology_problem		When the respondent	
		expressed the problem with	
		technology, computer,	
		mouse etc during the think	
		aloud session.	
Usability		when respondents	
		mentioned about the	
		importance of design and	
		usability of news sites that	
		eventually affect their	
1 1 1 1	DO2	selection	TF 1.1
background_task	RQ2	What was the respondent	IE model
		doing when he/she stumbled	
		upon news story described in the critical incident?	
hadronovad to dr/habit			
background_task/habit		habit-based news reading	emerging
		served as a background task	
background_task/break		or activity read news to have break	emerging
background_task/break		from their work/distract	emerging
		themselves from their work	
background_task/		when the respondent	IE model
non_news_related_task		described non-news related	IL MOUCI
non_news_related_task		activity or task as a	
		background task when they	
		encountered news online	
encountered_story	RQ2	the nature of encountered	IE model
		story (described in critical	
		incident story)	
IE_place	RQ2	websites, where the person	
_r		encountered news	
		(described in a critical	
		incident story)	

underlying_needs	RQ2	Underlying needs or values related to the news story they encountered	Emerging theme
underlying_needs/follow_up		when the respondent followed up the story, which he/she read in the past	
underlying_needs/critical_n eeds		The encountered story is critical to the respondent's lifestyle, work etc	
underlying_needs/emotional _connection		the respondent made emotional connection with his/her own life, family, work etc	
underlying_needs/social_ne eds		need to meet people in the community	
underlying_needs/ values		Respondents talk about their values when they explain why the encountered story got their attention	
underlying_needs/work_nee ds		When the respondent had needs related to their work/job needs	
underlying_needs/sense_of_ community		When the respondent had needs to be informed about the events in his/her home country (immigrants' needs)	Emerging theme
underlying_needs/curiosity		respondent read the encountered story because of curiosity (controversial issue)	
perception_IE	RQ2	How respondents perceive and define information encountering in news reading context	Emerging theme
IE_loop	RQ2	Whether the respondent comes back to the original task or wanders off to the different sites on the Internet?	IE model
Feeling_about_IE	RQ2	How the respondent feels about IE in general?	
IE_environment	RQ2	Where respondents usually encounter, stumble upon news on the Internet	

IE_environment/social_net	RQ2	social networking sites are	emerging
work		described as an environment to encounter news online	
IE_environment/traditional news sites	RQ2	news sites associated with traditional/ professsional news media organizations, such as CDT, Missourian, CNN, ABC etc	emerging
IE_environment/e-mail	RQ2	encounter news in e-mail environment	emerging
IE_environment/bumping places	RQ2	Places (websites or news sources) where people come expecting to be bumped into unexpected news stories (<i>Drudge Report</i> etc)	emerging
IE_environment/other places	RQ2	Non-Internet places, where people encounter news (radio, workplace, conversation with others in physical environment etc)	emerging
IE_environment/design_ele ments	RQ2	When the respondent mentioned about not specific spots on the websites, but about certain design elements of the website	emerging
IE_environment/specific spots	RQ2	Specific spots on the websites where readers encounter news (top parts, visuals, headlines, certain columns etc)	emerging
IE_environment/ links to stories	RQ2	The respondent receives the link to stories from other people and follow them	emerging
IE_environment/Internet	RQ2	when the respondent refers to the Internet in general for IE	emerging
IE_environment/ ethnic_community	RQ2	when respondents encounter news on their ethnic websites or portals (mostly in different languages)	emerging
IE_environment/blogs R4- blogs	RQ2	when people encounter news on different blogs	emerging

IE_in_ThinkAloud	RQ2	Cases where respondents encountered news during their think aloud sessions	IE model
IE_actions	RQ2	What the respondents did after they encountered news accidentally on the Internet? (actual actions)	Emerging
Feeling_crit_incident	RQ2	How the respondent felt about stumbling upon the given news story described in the critical incident story?	emerging
credibility_story	RQ2	How much the respondent cares about credibility/quality of story they found?	emerging
Frequency_IE	RQ2	How often the respondent experiences IE?	emerging
Feeling_before	RQ2	How the respondent felt immediately before encountering the given news story described in critical incident case?	emerging
Feeling_after	RQ2	How the respondent felt immediately after encountering the given news story described in critical incident case?	emerging
Ideal_environment	RQ2-IE	How respondents described the ideal environment for news reading, where they could encounter news?	IE model
CIS	RQ2	Critical incident stories-tree node	_
CIS/encountered_story	RQ2	The nature of the story they encountered	emerging
design_critical_incident	RQ2	What design elements caught the attention of respondents in the critical incident story?	emerging

Appendix F. Chart of nodes for interview #6



Appendix G: Example of triangulation

	Similarities	Differences
Online	-subscription to news	Interview percentage was higher for (trends
news	-e-mail alerts	with quantitative data):
reading	-setting up personalized pages	-Alternative news sources
options	-getting updated news several	-blog reading
	times a day	-RSS subscription
	-visit number of websites for	
	same news	Interview respondents (qualitative data):
	-get audio news	-do not search for news
	-click on the links for related	-do not setup favorite news page as their
	stories	homepage
	-get news from alternative	-do not watch video news (they did not
	sources	mention)
	-use social networking sites	-there was no indication of participating in
	-receive the links to news	online polls
	stories from other people	Interview data added:
	-read blogs	Interview data revealed much more detailed
	-subscribe to RSS	information about online news reading
		behavior, which would not have been visible
		with survey data:
		-crowd-surfing sites
		-sites with unexpected news
		-sites from home countries
		-perception of news was much broader than trad
		news. The survey questions were designed
		mostly for traditional news consumption
		options.
		-detailed information about habits of online
		news reading (time, location, routines,
		monitoring etc)
		-customization options to get news
		-becoming fan of news organizations on
		Facebook
		-incidental exposure to online news
		-online news reading behavior during browsing
		(tab switching, tab opening, clicking on the
		specific locations, saving for future reading)
		-social, affective, and cognitive dimensions
		were revealed from interview data. These data
		will be very difficult to capture with survey data

Appendix H: Overview of interview respondents' demographics

Code	Gender	Age	Ethnic group	Occupation	Major/field	Hobby
R1	F	29	Indian	Homemaker	Innovation and design	Reading, making friends, watching movies and surfing the Internet
R2	F	54	African Ameri- can	Admin at the local bank	Finance	Reading, likes fiction, biography, best-sellers, fiction. Likes going to library
R3	M	19	White	Undergrad student	Journalism	Environment, hiking, biking, outdoors
R4	M	28	White	Programmer at the university	Computer/ technology	Internet, computer games, clicking through the articles and reading random things at Wikipedia
R5	M	32	White	Project coordinator at the university, Doctorate	Educational technology	composing and playing music, restoring classic motor-scooters and skateboarding.
R6	M	26	White	Doctoral student	Educational technology	Likes playing sports, being active, going for bike rides
R7	F	41	White	Prevention technician at the insurance company	Student at the college	Cooking, baking, and crochet
R8	M	38	White	Public school consultant at the university program	Education	reading on the Internet and playing with his children

R9	F	31	White	Program coordinator at the university	Library science	spending time with her family, reading, watching movie. Likes to read how to books, novels
R10	M	29	White	Government officer (land use planner)	Public administration	computer, movies, miniature role game, reading science fiction, biographies and any topic
R11	F	57	White	Librarian at the public university	Library science doctoral student	fiber arts, knitting
R12	F	47	White	Educator for public school	teacher	spend time with family, hiking, outdoor activities
R13	M	25	White	Web developer	Graduate student in computer science	biking, local music, hang out with friends
R14	F	28	White	Office support staff at the university	Education	Reading , learning piano, walking, likes to read Christian book
R15	F	26	Asian	Grad student (international student)	Educational technology	reading, dancing, and swimming and badminton and music. Likes to read o read novels and fairytales
R16	F	34	White	Doc student	Education and educational technology (special education)	Bike riding, socializing with people, outdoors
R17	F	25	Asian	Grad student	Educational technology	surfing the Internet, photography

R18	F	38	White	Assistant professor of at the university	Medical field	reading books, playing with children likes to read science fiction, historical Christian fiction.
R19	M	27	White	Grad student	Political science	Reading comic books, sports, TV, car racing
R20	F	53	White	Facilitator for dyslexia and autism program	Education, has degree in horticulture	outdoors, play with her grandchildren, baseball, horticulture

Appendix I: Analysis of critical incident stories

Case	When did it	Where did	Nature or	Background problem	Context	Emotions
# or R#	happen?	they find the story?	topic of the story?	or underlying needs (value, beliefs, etc)		
R1	Two months ago (could not remember her most recent experience, but remembered "memorable" experience)	Local newspaper website (Columbia Daily Tribune)	About the business lady who helps new comers to the city to make connections with other people	-need to make connections in the new city -her hobby to make new friends	News reading context	Strong-she was very pleased
R2	Did not remember when it happened	Local newspaper website (Columbia Daily Tribune)	YouTube situation in Saint Louis	Followed up the story from last year	News reading context	
R3	Week ago	New York Times online	Gay marriage in Iowa	Values and beliefs (libertarian)	News reading context	Strong (he was very happy)
R4	Earlier today	Boing Boing Ngadget and Gizmodo (did not remember which one)	Trial of the Pirate Bay in Europe. They were fined several million Euros and sentenced to jail.	Both of his work and personal needs. Work: wants to know what applications could run on the university server. Personal needs: likes to try free version of digital products	Ritualistic news reading context in the morning	

Appendix J: Analysis of news stories reported in critical incident stories

R	Content of stories	Frequency	Theme	Source where the story was found	Local	Na- tional	Inter natio nal
R9-3	Personal safety	5	Spread about Swine flu (H1N1)	New York Times online		X	X
R9-4	Personal safety		How swine flu was spreading rapidly	Radio		X	
R11-1	Personal safety		Top five things to panic about swine flu	MSNBC		X	
R18	Personal safety		MU student who had gone to China and taken the Swine Flu	E-mail link			X
R19	Personal safety		How Chinese Government handles swine flu cases	Christian Science Monitor online			х
R3	Government	5	Gay marriage regulation in Iowa	New York Times online		X	
R11-2	Government		Backlash against Mexican immigrants	MSNBC		X	
R12	Government		Judicial nomination of judge Hamilton	Automatic e- mail from News Match		X	
R16	Government		Story about how Sarah Palin is losing her popularity in Alaska	Digg		Х	
R7	Government		The captain was rescued from the pirates by navy snipers. He came home	Columbia Daily Tribune online (local newspaper)			X

R9-1	Entertainment/ leisure Entertainment/	4	A story about the musician Prince	Husband found the story about TV show on the musician's website		X	
	leisure		A story about newly elected president of South Africa who is a polygamist	The Morning News			X
R17	Entertainment/ leisure		Story about Susan Boyle	Yahoo!			X
R20	Entertainment/ leisure		A story about the celebrity family of Jon and Kate	MSN website		X	
R2	Technology	3	You Tube situation in Saint Louis	Columbia Daily Tribune online (local newspaper)		X	
R4	Technology		The verdict in the Pirate Bay case in Switzerland. The Pirate Bay is a giant site that has lots of piracy and illegal download of TV shows and movies.	Boing Boing			X
R5	Technology		Sun Microsystems was bought by Oracle	NING-social networking site			X
R1	Business	2	The lady from Columbia, who is paid by the local businesses to visit each new residence and share their business related information	Columbia Daily Tribune online (local newspaper)	X		

R13	Business		Story about the interview with Douglas Rushcroft, who advocated about local currencies	Google reader, which took the respondent to YouTube		х	
R14	Business	1	Probation of the MU Health center	Columbia Daily Tribune online (local newspaper)	х		
R6	Crime	1	11-year-old boy committed suicide because of bullying	CNN		х	
R8	Education	1	Teacher changes in the local school in Indianapolis	Indianapolis newspaper (local newspaper)	х		
R15	Disaster	1	The first year anniversary of earthquake in China	Chinese news site			X

Appendix K. Underlying needs for incidental exposure to online news

Cases	Underlying needs or problems	Topic of the story	Illustrative remarks
R2	Follow up	You Tube situation in Saint Louis	"Well, it just, eh, you know that basically last year's winner hadn't gotten their money and I'm like, well it was St. Louis, and I'm like well they haven't got their money and they getting ready to award this year, what's the deal?" (R2)
R9-3 R9-4	Follow up	Spread about Swine flu (H1N1)	" I hadn't heard of any deaths or even that it was so close to Missouri. So I went and checked, and it was on the front page, of course it's not here now, I wonder if it'sopinionbut they had an interactive map, they had an interactive map that showed where the outbreak had occurred and Kansas was the closest one to Missouri. So I e-mailed my colleague the link and said oh look, thankfully no one so far, it's not in Missouri. So she said she may have just misheard the news." (R9-3) "Um, well for one, I felt, you know, for especially a story of this severity, of people have fear of pandemic disease spreading throughout the globe I want to kind of say, no, stop the panic. Where one person is they look, you don't have quite the accurate information. And also, I've just became curious because it just a, it can impact so many people and I wanted to learn more about how is it transmitted, where is it happening, what's the official, what officials are doing about it." (R9-3)
R11- 2	Follow up	Backlash on Mexican immigrants	"Um, onhorrible backlash on Mexican Immigrants, um, that in fact their restaurants, in this case, it was some place in Texas, um, is showing a definite decrease in customers. And that's they can attribute that directly to some of the talk radio shows that are bashing." "I don't have a radio so I'm out of touch. This is Michael Savage and all these crazies talking about the

			immigrants just as some big plot to bring in this whole disease and terrifying us. It's terrifying"
R7	Follow up/personal needs	The captain was rescued from the pirates by navy snipers.	"Because it was different than some of the other articles that have come out from the rescuing of the captain, there was some more detail that had come out. It kind of puts things in a different light than what I had been hearing from other news sources." (follow up) "My husband's in the military and so anything relating to the military catches my attention. My husband was in for twelve years, my son is going to go in, in the fall. So keeping up with the military and what's happening there is very important to me." (personal needs)
R11- 1	Follow up/critical needs	Top five things to panic about swine flu	"I think it was just because I was just finding, trying to track down is there something else I need to do, and there isn't and I'm like okay fine. Because some people are saying you need to have two weeks of groceries and all of this stuff and somebody actually said I have heard this that you should have this back up in your home just for living in a northern state. We do have backups because of blizzards and all and floods, but they had suggested you needed to have an emergency set up at work in your car, and at home and I thought that was interesting. And I have not seen anything more on that story." (R11-1)
R15	Follow up/sense of community/ emotional connection	The first year anniversary of earthquake in China	"Mmmbecause I think I care about people there and I want to know their situation." (R15) "But that's really a big shock to China last year. So almost all the Chinese pay a lot of attention to this event." (R15)
R16	Follow up/sense of community	Story about how Sarah Palin is losing her popularity in Alaska	"Yeah, from Alaska, but I also was interested in the fact that she was losing popularity, cause I kind of got sick of the stories that talked about how great she was, I was like whatever, but this one was kind of different, I was like hmm, let me read about that." (R16)
R17	Follow up/curiosity	Story about Susan Boyle	"I didn't know about like Susan Boyle, who was an ugly woman you know, win a contest and become famous and I didn't know about it. And my friend, she was like home, she was showing me okay, here's something very interesting on YouTube, and that's why I know Susan Boyle and so one day, or one or two days

			later when I come up to you know, just to open the Yahoo! Homepage I see her there, a news article about her and I click on that. It's not that great, cause it's not what I care." (R17)
R4	Follow up/personal needs/Work needs/ critical needs/ values	The verdict in the Pirate Bay case in Switzerland. The Pirate Bay is a giant site that has lots of piracy and illegal download of TV shows	"it's nice to have this content out there and I think it should be out there because people areat least I am of a mind of try before you buy. There are some movies that I will go out and purchase right away because I know that I'm going to want to see them. And I'm saving five dollar rental fees by just purchasing. Whereas, there are some movies that I'll rent first before I decide to go out and buy and that kind of plays into this you can listen to at least part of the song before you purchase it and I think that sites like the Pirate Bay fill this need for video content, television shows and movies." (R4) "A little of both [personal and work needs]. I mean, cause changes in the way that digital media is handled in the courts affects what we can do here on campus and it, the whole copyright. I need to know about the copyright issues, so I know what we can have on our server and what we can't and try to catch any potential issues before they become issues?" (R4)
R19	Follow up/ Professional needs	How Chinese Government handles swine flu cases	"I guess it was justit seemed like a big story last week and the week before, so, uh, and it was something that, I guess, maybe a couple of days before that there were some stories online about how China was kind of, putting any Mexican national into quarantine and there was some criticism about that, which I thought at the time, was, was wrong, you know and it just seemed like another kind of the whole Chinese government you know action. But when I saw that article and I started to read it, it made more sense. Like I started to understand why the Chinese Government was acting the way it did. That's why I read it to just, it seemed to answer some questions that it you know, that I was thinking about for a couple of days." (follow up) "China is always a big interesting case study for political scientists interested in democracy and that. So, yeah. It's kind of natural to be drawn to that story" (work or professional needs)

R13	Follow up/Personal needs/ values	Story about the interview with Douglas Rushcroft, who advocated about local currencies	"there's this idea of local currencies and umpeople create a currency for themselves and distribute it however they decide to within a local small area and use that to exchange rather than using the global or national U.S. dollar and umI've been reading a lot about those kind of things so those have been interesting." (follow up) "I'm involved in a project in Columbia about this topic, we're doing the same thing ourselves and creating a local currency here" (personal needs) "Um, probably Twitter conversations, because there are a lot of really interesting people that I follow on Twitter, talking about ways to survive without relying on the national infrastructure." (values)
R18	Follow up/sense of community	the MU student who had gone to China and taken the Swine Flu	"Um, I guess, the ones that I've looked at most recently were the Swine Flu, the different Swine Flu news stories." (follow up) "Mmmmbecause of the immediacy of it, the way it was very current and whatever they had put into their little paragraph that they put on the initial page was interesting enough to make me want to keep going." "Um, I felt that it was a horrible way for MU to make the news. How embarrassing to be the people that introduced Swine Flu to Asia." (sense of community)
R5	Professional needs/ critical needs	Sun Microsyste ms was bought by Oracle	"Well I was concerned about how it might impact my project because the software we use is developed by Sun, with Oracle buying Sun, you know you don't know if they're going to continue to invest resources into developing that or change their you know?" (R5)
R14	Professional needs	Probation of the MU Health center	"Umcause I work for the department of surgery and um we're very closely related to the college of medicine. So I wanted to know why they were on probation." (R14)
R20	Professional needs	A story about the Jon and Kate family	"Interesting, yeah, yeah. And it had to deal with families and children, you know that's how I went from a degree in agriculture to a degree in education because of my interest in children." (R20)

R1	Personal needs/ critical needs/ hobby	The lady from Columbia, who is paid by the local businesses visit each new residence and share their business related information	"You know, I thought, because I am a newcomer, I didn't know anything. So I thought, it would be nice to meet up with somebody who is a resident here and somebody who can tell me about what this city has to offer for me, so I just thought, that, let's just give it a shot." (personal needs) "And it made more sense to me at that time because I was very new, I'd just come and I was looking to make friends and know about the place I would be living in." (personal needs) "I love reading, and I enjoy making friends." (hobby)
R6	Personal needs/ emotional connection	11-year-old boy committed suicide because of bullying	"I think just me personally I work with kids at my church you know. So I think yeah, I get, I think. The story was about something I have interest in, you know, helping little kids. So I think that was part of it."
R8	Personal needs/ critical needs/sense of community	Teacher changes in the local school in Indianapolis	"I have a home, a home I'm trying to sell in Indiana, so I read the newspaper often to hopefully, hear good news and not bad news stories. So we're hoping to sell our home and want to make sure, that nothing bad is happening in the area, and then hopefully we'll read that people are starting to buy houses. So that's what I was looking at." (personal and critical needs) "I used to be a teacher in Indiana, so I was interested in a story about, some teachers may lose jobs because of money, the budget, the economy and everything." (sense of community)
R9-1	Hobby	A story about the musician Prince	"it was more a friend, like my husband was looking at something on the internet, and oh there's a show, there's an entertainer that I like to watch, so then he showed me like on the website when it would be on television, that there was going to be an interview, so then I went to, I looked at the website and then there were links to that website to other articles about this entertainer."

R3	Values	Gay marriage regulation in Iowa	"Because I fancy myself a civil libertarian and I feel like that's going to be the next battle of civil liberties in this country. Like I'm definitely a liberal, so just to see how and I have a lot of gay friends too, so just to see how this whole thing's going to play out, I'm very interested in it." (R3)
R12	Values/ personal needs	Judicial nomination of judge Hamilton	"Well, because I tend to be a conservative thinker when it comes to things like abortion and things like that, and he is viewed as an extremely liberal, person, and I think the way he votes on Supreme Court issues would affect, culturally, um the environment of my family and my children growing up." (R12)
R10	Curiosity	A story about newly elected president of South Africa who is a polygamist	"I think it was in foreign policy, or was it in something else, about some newly elected president of South Africa, he's a polygamist and that was something just sort of interesting, and ended up reading that, just sort of tripping" "Because polygamy is not a common behavior among the leaders of the industrialized world. I mean, it's cultural for South Africa, or at least for the Zulu tribe, which I believe the current, this president is a member of you can see a case here from one of the princesses of Swaziland, which is one of the smaller independent nations inside the borders of South Africabut it just, it seems, that's what sort of brought me. It's like, you don't typically hear about that, you know, you'll here about, oh, scandal, mistress from so and so"

REFERENCES

- Agosto, D. E. & Hughes-Hassell, S. (2005). People, places, and questions: An investigation of the everyday life information-seeking behaviors of urban young adults. *Library & Information Science Research*, 27(2), 141-163.
- Ajzen, I. & Fishbein, M. (1980). *Understanding attitudes and predicting social behavior*. Englewood Cliffs, NJ: Prentice-Hall.
- Barwise, T. P., Ehrenberg, A. S. C., & Goodhardt, G. J. (1982). Glued to the box. *Journal of Communication*, 32(4), 22-29.
- Batley, S. (1988). *Visual information retrieval: browsing strategies in pictorial databases*. Paper presented at the Online Information 88 12th International Online Information Meeting.
- Bawden, D. (1986). Information systems and the stimulation of creativity. *Journal of Information Science*, 12, 203-216.
- Bentley, C. (2000). Make My Day: Ritual, Dependency and the Habit of Newspaper Reading. Unpublished Doctoral Dissertation. University of Oregon.
- Bourdieu, P. (1984). Distinction: A social critique of the judgement of taste. London: Routledge.
- Bunz, U. K. (2001). Usability and Gratifications-Towards a Website Analysis Model. Unpublished Ph.D. dissertation. Kansas University.
- Carey, R. F., McKechnie, L. E. F., & McKenzie, P. J. (2001). Gaining access to everyday life information seeking. *Library & Information Science Research*, 23(4), 319-334.
- Case, D. (2002). Looking for Information: A Survey of Research on Information Seeking, Needs, and Behavior: Academic Press.
- Case, D. (2007). Looking for Information: A Survey of Research on Information Seeking, Needs, and Behavior: Elsevier.
- Chaffee, S. H. & McLeod, J. M. (1973). Individual Vs. Social Predictors of Information Seeking. *Journalism Quarterly*, 50(2), 237-255.
- Chaffee, S. H. & Metzger, M. J. (2001). The End of Mass Communication? *Mass Communication and Society*, 4(4), 365 379.

- Corbin, J. M. & Strauss, A. L. (2008). *Basics of qualitative research: techniques and procedures for developing grounded theory* (3rd ed.). Los Angeles, CA: Sage Publications, Inc.
- Creswell, J. W. & Clark, V. L. P. (2007). *Designing and Conducting Mixed Methods Research*. Thousand Oaks, London, New Delhi: Sage Publications.
- Dexter, L. A. (1970). *Elite and specialized interviewing*. Evanston, IL: Northwestern University Press.
- Dey, I. (1999). *Grounding grounded theory: guidelines for qualitative inquiry*. San Diego: Academic Press.
- Donohew, R. L., Nair, M., & Finn, S. (1984). Automaticity, arousal, and information exposure. In R. N. Bostrom (Ed.), *Communication Yearbook* (Vol. 8, pp. 267-284). Beverly Hills, CA: Sage.
- Downs, A. (1957). An economic theory of democracy. New York: Harper.
- Erdelez, S. (1995). Information Encountering: An Exploration beyond Information Seeking. Unpublished Doctoral Dissertation. Syracuse University.
- Erdelez, S. (1997). Information Encountering: A Conceptual Framework for Accidental Information Discovery. In P. Vakkari, R. Savolainen & B. Dervin (Eds.), *Information seeking in context: Proceedings of an international conference on research in information needs, seeking and use in different contexts* (pp. 412-421). London: Taylor Graham.
- Erdelez, S. (2004). Investigation of information encountering in the controlled research environment. *Information Processing & Management*, 40(6), 1013-1025.
- Erdelez, S. (2005). Information Encountering. In K. E. Fisher, S. Erdelez & L. McKechnie (Eds.), *Theories of Information Behavior* (pp. 179-185). Medford, New Jersey: Information Today, Inc.
- Erdelez, S. & Rioux, K. (2000). Sharing information encountered for others on the Web. In L. Höglund & T. D. Wilson (Eds.), *The new review of information behaviour research* (Vol. 1, pp. 219-223). Cambridge, England: Taylor Graham.
- Flanagan, J. C. (1954). The critical incident technique. *Psychological Bulletin*, 51(4), 327-358.
- Flavián, C. & Gurrea, E. (2006). The choice of digital newspapers: influence of reader goals and user experience. *Internet Research*, 16(3), 231-247.

- Foster, A. & Ford, N. (2003). Serendipity and information seeking: an empirical study. *Journal of Documentation*, 59(3), 321-340.
- Fowler, F. J. (1995). *Improving survey questions: design and evaluation*. Thousand Oaks: Sage Publications.
- Glaser, B. (2000). The future of grounded theory. Grounded theory review, 1, 1-8.
- Glaser, B. G. & Strauss, A. L. (1967). *The discovery of grounded theory; strategies for qualitative research*. Chicago: Aldine Pub. Co.
- Havick, J. (2000). The impact of the Internet on a television-based society. *Technology in Society*, 22(2), 273-287.
- Heinström, J. (2006). Psychological factors behind incidental information acquisition. *Library & Information Science Research*, 28(4), 579-594.
- Holstein, J. A. & Gubrium, J. F. (1995). The active interview. Thousand Oaks: SAGE Publications.
- Horna, J. (1988). The mass media as leisure: A western-Canadian case. *Society and Leisure*, 11, 283-301.
- Isen, A. M. (2004). Positive affect and decision making. In M. Lewis & J. Haviland-Jones (Eds.), *Handbook of emotions*. New York: Guilford Press.
- James, W. (1914). *Habit*. New York: H. Holt and company.
- Jones, J. W. & Rosenfeld, L. B. (1992). From security to serendipity, or, how we may have to learn to stop worrying and love chaos. Paper presented at the ASIS Mid Year Meeting.
- Katz, E. (1996). And deliver us from segmentation. *Annals of the American Academy of Political and Social Science*, *546*, 22-33.
- Katz, E., Blumler, J. G., & Haas, H. (1974). Utilization of mass communication by the individual. In J. G. Blumler & E. Katz (Eds.), *The Uses of Mass Communications: Current Perspectives on Gratifications Research* (pp. 19-32). Beverly Hills, CA: Sage.
- Kluckhohn, C. (1942). Myths and Rituals: A General Theory. *The Harvard Theological Review*, *35*(1), 45-79.
- Koch, J. (2001). Hardwiring serendip. College and Research Libraries News, 62(7), 731-732.

- Kubey, R. (1986). Television use in everyday life: Coping with unstructured time. *Journal of Communication*, *36*(3), 108-123.
- Lee, J. K. (2009). Incidental Exposure to News: Limiting Fragmentation in the New Media Environment. Unpublished Doctoral dissertation. University of Texas at Austin.
- Levy, M. R. & Windahl, S. (1984). Audience activity and gratifications: A conceptual clarification and exploration. *Communication Research*, 11, 51-78.
- Lichtenstein, A., & Rosenfeld, L. B. (1983). Uses and misuses of gratifications research: An explication of media functions. *Communication Research*, *10*, 97-109.
- Lin, C. A. & Salwen, M. (2006). Utilities of Online and Offline News Use. In X. Li (Ed.), *Internet Newspapers: The Making of a Mainstream Medium* (pp. 209-225): Lawrence Erlbaum Associates.
- Lincoln, Y. S. & Guba, E. G. (1985). *Naturalistic inquiry*. Beverly Hills, CA: Sage Publications.
- Liu, Z. (2005). Reading behavior in the digital environment: Changes in reading behavior over the past ten years. *Journal of Documentation*, 61(6), 700.
- McQuail, D., Blumler, J.G., & Brown, J.R.. (1972). The television audience: A revised perspective. In D. McQuail (Ed.), *Sociology of Mass Communications* (pp. 135-165): Harmondsworth, England: Penguin.
- Nahl, D. (1998). Ethnography of novices' first use of web search engines: Affective control in cognitive processing. *Internet Reference Services Quarterly*, *3*(2), 51-72.
- Nahl, D. (2005). Affective Load. In F. Karen E, S. Erdelez & L. McKehnie (Eds.), *Information Theories* (pp. 39-44). Medford, NJ: Information Today Inc.
- Nguyen, A. (2008). The contribution of online news attributes to its diffusion: An empirical exploration based on a proposed theoretical model for the micro-process of online news adoption/use [Electronic Version], *13*. Retrieved from http://www.uic.edu/htbin/cgiwrap/bin/ojs/index.php/fm/article/view/2127/1952
- Nielsen, J. (1993). Usability engineering. Boston: Academic Press.
- Ognianova, E. (1997). Audience processing of news and advertising in computer-mediated environments. Effects of the content provider's perceived credibility and identity. Unpublished Doctoral dissertation.
- Olsen, J. (1994). Electronic Journal Literature: Implications for Scholars. London: Mecklermedia.

- Ouellette, J. A. & Woods, W. (1998). Habit and Intention in Everyday Life: The Multiple Processes by Which Past Behavior Predicts Future Behavior. *Psychological Bulletin*, 124(1), 54-74.
- Patton, M. Q. (2002). *Qualitative research and evaluation methods* (3 ed.). Thousand Oaks, CA: Sage Publications.
- Perse, E. M. & Dunn, D. G. (1998). The Utility of Home Computers and Media Use: Implications of Multimedia and Connectivity. *Journal of Broadcasting & Electronic Media*, 42(4).
- Purcell, K., Raine, L., Mitchell, A., Rosenstiel, T., & Olmstead, K. (2010). Understanding the participatory news consumer: How Internet and cell phone users have turned news into a social experience. Pew Internet & American Life Project. Retrieved from http://www.pewinternet.org/Reports/2010/Online-News.aspx
- Rice, R. E., McCreadie, M., & Chang, S.-J. L. (2001). Accessing and browsing information and communication. Cambridge, MA: MIT Press.
- Rios, M. L. & Bentley, C. (2001). *Use of Online News: Development of Habit and Automatic Procedural Processing*. Paper presented at the Association for Journalism and Mass Communication.
- Ross, C. S. (1999). Finding without seeking: the information encounter in the context of reading for pleasure. *Information Processing & Management*, *35*(6), 783-799.
- Rubin, A. M. (1984). Ritualized and instrumental television viewing. *Journal of Communication*, 34(3), 67–77.
- Rubin, A. M. (1986). Uses, gratifications, and media effects research. In J. Bryan & D. Zillmann (Eds.), *Perspectives on media effects* (pp. 281–301). Hillsdale, NJ: Lawrence Erlbaum Associates, Inc.
- Rubin, A. M. (1993). Audience activity and media use. Communication Monographs, 60(1), 98.
- Rubin, A. M. & Perse, E. M. (1987). Audience activity and television news gratifications. *Communication Research*, *14*, 58-84.
- Ruggiero, T. E. (2000). Uses and Gratifications Theory in the 21st Century. *Mass Communication & Society*, 3(1), 3-37.

- Savolainen, R. (2005). Everyday life information seeking. In F. Karen E, S. Erdelez & L. E. F. McKechnie (Eds.), *Theories of Information Behavior* (pp. 143-149). Medford, NJ: Information Today, Inc.
- Savolainen, R. (2007). Information Behavior and Information Practice: Reviewing the "Umbrella Concepts" of Information-Seeking Studies. *The Library Quarterly*, 77(2), 109-132.
- Savolainen, R. (2008). Everyday information practice: a social phenomenological perspective. Lanham, MD: Scarecrow Press.
- Savolainen, R. & Kari, J. (2004). Placing the Internet in information source horizons. A study of information seeking by Internet users in the context of self-development. *Library & Information Science Research*, 26(4), 415-433.
- Severin, W. J. & Tankard, J. W. (2001). Communication Theories: Origins, Methods, and Uses in the Mass Media: Longman.
- Sonnenwald, D. H. (1999). Evolving perspectives of human information behavior:

 Contexts, situations, social networks and information horizons. Paper presented at the Second International Conference in Information Needs, Seeking and Use in Different Contexts.
- Strauss, A. & Corbin, J. (1994). Grounded theory methodology: An overview. In L. Denzin & Y. S. Lincoln (Eds.), *Handbook of Qualitative Research* (pp. 273-285). Thousand Oaks, CA: Sage.
- Strauss, A. L. & Corbin, J. M. (1998). *Basics of qualitative research: Techniques and procedures for developing grounded theory* (2nd ed.). Thousand Oaks: Sage Publications.
- Swartz, D. (1997). Culture and Power: The University of Chicago Press.
- Tewksbury, D. (2003). What Do Americans Really Want to Know? Tracking the Behavior of News Readers on the Internet. *Journal of Communication*, 53(4), 694-710.
- Tewksbury, D., Hals, M. L., & Bibart, A. (2008). The Efficacy of News Browsing: The Relationship of News Consumption Style to Social and Political Efficacy. *Journalism & Mass Communication Quarterly*, 85(2), 257-272.
- Tewksbury, D., Weaver, A., J., & Maddex, B., D. (2001). Accidentally informed: Incidental news exposure on the World Wide Web. *Journalism and Mass Communication Quarterly*, 78(3), 533.

- Toms, E. G. (1998). *Information exploration of the third kind: The concept of chance encounters*. Paper presented at the CHI 98Workshop on Innovation and Evaluation in Information Exploration Interfaces.
- Urquhart, C., Light, A., Thomas, R., Barker, A., Yeoman, A., Cooper, J., et al. (2003). Critical incident technique and explicitation interviewing in studies of information behavior. *Library & Information Science Research*, 25(1), 63-88.
- Vermersch, P. (1994). L' entretien d'explicitation. Paris: ESF.
- Williamson, K. (1998). Discovered by chance: The role of incidental information acquisition in an ecological model of information use. *Library & Information Science Research*, 20(1), 23-40.
- Wilson, P. (1977). *Public knowledge, private ignorance : toward a library and information policy*. Westport, CT: Greenwood Press.
- Wilson, T. D. (1997). Information behaviour: An interdisciplinary perspective. *Information Processing & Management*, 33(4), 551-572.
- Windahl, S. (1981). Uses and gratifications at the crossroads. *Mass Communication Review Yearbook*, 2, 174–185.
- Wolcott, H. (1975). Criteria for an ethnographic approach to research in the schools. *Human Organization*, *34*, 111-127.

VITA

Borchuluun Yadamsuren was born in Baruun-Urt, Mongolia, the daughter of Yadamsuren Ish and Borgil Jodov-Ish. Upon completion of her high school degree from School No. 2 in Ulaanbaatar, Mongolia, in 1987, she attended the Novosibirsk State Technical University in Russia and pursued a degree in computer science.

After completing her bachelor's degree in 1993, she worked as a computer programmer for the Datacom company, the first Internet service provider in Mongolia. She started her writing career as a public relations officer at the same company, educating the public on computer and Internet literacy. She attended the journalism school at the national newspaper *Ardyn Erkh* in 1996.

She worked as an executive director of the first public Internet center in Mongolia, and as the editor-in-chief of a computer magazine in Mongolia. She established the Open Web Center, a resource center for non-profit organizations in Mongolia and served as an executive director of this center. Borchuluun earned a Master of Science degree in computer science from the Mongolian Technical University in 1999.

She received the Mongolian Professional Development Fellowship from the Open Society Institute to pursue her master's degree at the School of Journalism of the University of Missouri in 1999. She earned her M.A. degree in Journalism in 2001. She began her doctoral program in the winter of 2005 at the School of Information Science and Learning Technologies of the University of Missouri. During her doctoral study, she worked as a senior researcher for the Information Experience Laboratory.