

John Doe

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An Overview of the Online Search Behaviors of Health Information Seekers

The Internet plays an instrumental role in our daily lives, providing a means to connect and communicate with others instantaneously, as well as a portal into the vast amounts of information available online. In this study, I aim to examine how individuals interact with health information on the Internet. Given the Internet's dynamic nature, this area of research is fairly recent and has not received much attention compared to other branches of media and communication studies. This topic is relevant nonetheless as it presents a trend on the rise; additionally, analyzing the motives and search behaviors of consumers seeking health information online can result in the creation of tailored quality and reassurance measures for health websites, help websites accommodate those with lower internet literacy, and encourage search engines to highly rank accurate health websites rather than more popular websites.

This study will be centered around how individuals with different participation levels in online activities seek and respond to health information on the Internet. To reinforce these ideas I will be consulting multiple sources including Susanne Baumgartner and Tilo Hartmann's work on health anxiety and online information (2013), as well as Vladan Starcevic and David Berle's review of cyberchondria (2013). Studies on the act of looking for health information online have suggested connections between search skills and the accuracy of results; therefore, I will further explore that arena by hypothesizing that the more Internet proficient an individual is, the more likely he or she is to seek health information online. I will be probing into my research by asking the question "How does Internet literacy influence health information seeking behaviors and health anxiety?" To answer this question, a quantitative online survey will be carried out on a convenience sample using Likert scale type

questions. The results of this study are likely to help readers glean into the different factors influencing online health information searches, and may be of practical importance for search engines and health websites.

Literature Review

The Internet provides quick and easy access to a wealth of information; therefore, it is only natural that individuals with health concerns seeking immediate answers will resort to the Internet, where answers and possibilities are infinite. Normally, the multidimensional layers of information on the Internet are an advantage to users, but those looking for a justification behind an ache or bruise will only have their worries intensified when faced with all the illnesses Dr. Internet will voluntarily diagnose them with, depending on how precise their search was, and how wisely they navigate through the result jungle.

According to a PewResearch Internet Project survey conducted in 2012, 72% of Internet users have searched for health information online. The motives and effects of these search patterns have not yet been analyzed sufficiently as they are relatively recent (Starcevic and Berle 205), but such behavior is likely to influence patient-doctor relationships, perceived health status, and health anxiety levels (Xiao et al. 420; Baumgartner and Hartmann 3). Most individuals looking for online health information begin by utilizing search engines, and a minority start at specific websites (Muse et al. 190; Starcevic and Berle 206). Kitchens, Harle, and Li stated that the quality of online information varied depending on the health topic; moreover, first page search engine results were of high quality, although less than half were certified (457). Conversely, Baumgartner and Hartmann found that the bulk of online health information was unreliable and of low quality (2), a position also supported by Muse et. al whose paper adds that users often fail to check for basic quality indicators, such as source and date (190).

Xiao et al. found that users with high-speed Internet tend to be more Internet proficient and consequently have a higher tendency to look for health information online compared to users with low-speed Internet (422). Duerson analyzed online “operational and formal skill” (69) sets among Internet users based on age and level of education, and found that those with higher levels of education experienced less issues while navigating through the Internet (68). Interestingly, older participants were less likely to visit unreliable websites or click on search results not pertinent to their health search (Duerson 68). After considering Duerson’s study, it is important to note that Muse et al. found that search engine inquiries often retrieve results containing mild to severe health conditions, which triggers most users to delve deeper into their search and access irrelevant yet worrying information (190). Similarly, Starcevic and Berle’s paper is in agreement with Duerson, establishing that most users click on frightening or even disturbing results (208).

Xiao et al. stated that individuals seek online health information based on their different information needs, such needs may encompass looking for medical advice, emotional support, seeking preventative measures, or reaching out to others with shared medical experiences (418). The substantial amounts of health information readily available on the Internet are a mixed blessing, while some users may conduct a quick search to alleviate their worries, others may become trapped in the endless cycle of clicking through one link to another. Individuals with higher levels of health anxiety tend to resort to the Internet for reassurance more often than others (Starcevic and Berle 208); however, they often differentiate between high and low quality health websites (Baumgartner and Hartmann 209). Although individuals with higher levels of health anxiety can identify high quality sources, Muse et al. found that they were more distressed by their findings than those with low anxiety (193). Starcevic and Barle stated that low anxiety individuals are reassured by their results and anxiety decreases after a quick search, whereas high anxiety individuals have

their anxieties escalated and either avoid further searches or continue looking for information (208). Muse and colleague's research supports the latter statements, and adds that high health anxiety individuals tend to look up health information more regularly, and spend more time conducting their search (193).

Studies have analyzed the quality of online health information, the resulting health anxiety, as well as certain skill sets used to attain such information. A limited amount of literature examines how Internet literacy can influence the results of an online health search. Certainly not all users fall prey to low quality information or faulty search engine results; therefore, it is important to determine what types of users engage in different online search behaviors. One way of doing so, and what I aim to accomplish in my research, is testing against Internet literacy and inspecting how differences in Internet skills influence search behavior and resulting health anxiety. Internet literacy may be established by assessing Internet access, Internet speed, daily Internet use, and other online activities.

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