A SYNTHETIC REVIEW PAPER ON QUALITY IN E-PUBLICATION ON READER’S SATISFACTION

Kamal Kant
Research Scholar, Jai Narain Vyas University.

Received: September 04, 2018 Accepted: October 21, 2018

ABSTRACT
Publications that are published absolutely in electronic format, adopting an innovative way to communicate scientific information to the research community are termed as e-publication. This paper is a result of a study has been conducted on the quality of information provided in e-publications. This investigation applied a standard research method to analyse the quality of e-journals. Concept of quality of e-publications holds great importance and generally discuss about the conception of information quality needs to be placed in a better frame. Quality of e-journals demands a sound philosophy of information to assist in framing superior information quality in a broader abstract light. Relevant literature on the e-publication quality has been reviewed. The study examine the Quality of e-publication, dimensions of information quality and information quality have been analysed and summarized the findings. This paper presents a conceptual framework in which the author reviews the available literature on quality in e-publication. Based on the results some suggestions have been made to improve the quality of e-publications.

Keywords: Electronic publication, IQ criteria, IQ trade-offs.

INTRODUCTION
There are many things that need to be considered while selecting the information for e-publications, at the time of information selection an individual must pay attention not only on the quantity but also on the quality of the available information. People do not consider any irrelevant information rather they seek the best information available to fulfil their purpose. E-Publications (EP’s) offer a strong possibility of improving quality information along with surplus dimensions in an economical way. Thus, EP’s enables the information to increase its scope and reach an extensive variety of users as compared to paper-based publications (publications). EP’s are beneficial not only to the users/readers but they offers a wide variety of advantages to publishers, libraries and organizations as a whole. EP’s enables the publishers to potentially reduce the publication costs, increase the quantity of information that can be incorporated in a publication, and actualize new ways to the organize and demonstrate information. Also, readers are provided with an opportunity and facility to cooperate, customize and make individual corridors and information levels. They are also given the chance to include simulations and tests and to visualize the impact of full-colour diagrams and audio-visual.

After the diffusion of World Wide Web in the 1990's the academic journals industry dramatically changed. This transmission of World Wide Web readily empowered electronic publishing and it has entered an surroundings that are based on sequential problems and reinforced the skilled restructuring drive that promotes free e-journals. These modify were prompt over the last ten years in many facets of journals, yet the estimated departure of out-dated periodical and their publishers (Odlyzko 1996b) has not followed.

To promote these efforts, this paper offers asystem for comprehending and understanding the quality of information in e-publication. Due to this action, it represented that information excellence in quality is circumstantial to the any specific state of affairs in which the information is being circulated.

“Though product quality and Information quality differs a lot, yet the analysis of information quality usually counter parts product quality. This paper will define IQ as information that is ‘acceptable’ as suggested by (Huang, Lee, and Wang 1999, 43.). In the case of this study, the researcher used academic research”.

Two insights that are taken from: information quality related review of literature is identified as useful for this work. They are:

"IQ, resembling product quality, is consists of several, often conflicting criteria".

"IQ usually includes adjustments between and amongst the various quality criteria and IQ is often dependent on its intended use".
The further section continues to investigate the literature, regarding the above mentioned “two characteristics: IQ criteria and IQ tradeoffs”.

IQ Criteria

Eppler (2002) “identifies 20 conceptual frameworks for information quality rooted in specific domains that were published between 1989 and 2000. The domains range from databases to web pages. (Eppler 2002, Table 11, 78.) Eppler (2002) orders its quality criteria into four dimensions: relevant information, sound information, optimized process, and reliable infrastructure. This assembling is based on the media philosophy of Schmid and Stanoevska-Slabeva (Schmid & Stanoevska-Slabeva 1999). Other IQ examiners have executed almost same exercise”. 同意程度

Likewise, we can also refer, “for instance, (Lee et al. 2002), where they arranged quality criteria obtained from seven different studies into four dimensions: Intrinsic IQ, Contextual IQ, Representational IQ, and Accessibility IQ. These dimensions can also be portrayed in an accompanying way: intrinsic suggests that information possess quality in its very own right; contextual emphasizes the prerequisite that IQ must be considered inside the setting of the task that needs to be done. Representational and accessibility highlights the significance of computer systems that store and give access to information”. They also arranged criteria from many other studies in line with “these four dimensions. One of the investigation that they portray is (Delone& McLean 1992), which was introduced earlier. They additionally describe an early study by Robert Zmud (Zmud 1978), which originates much before the computerization drive. Yair Wand & Richard Wang (1996) officially expressed four IQ dimensions: correctness, unambiguousness, completeness, and meaningfulness by means of a philosophical method” (Wand & Wang 1996).

“”

IQ Trade-off

“it can be viewed that at the criteria level, it is stress-free to observe the tradeoffs between the criteria. For instance, comprehensiveness and conciseness might just be inversely related. Similarly, security and accessibility might be hard to deliver simultaneously, as could be correctness and currency. The tension between the criteria is often resolved within a community (invisible college, in this study) and the information’s use. For more on the trade-offs between criteria, see: (Ballou & Pazer 2003), which models the trade-off between completeness and consistency or (Ballou & Kumar Tayi 1999), which incorporates an equation based model that enables information administrators to weight quality criteria, contingent upon the unique situation. Their model characterizes the factor: Anticipated quality (AQ(J<K:L)) as the quality of dataset J on dimension K resulting from undertaking project L. They write: The people who are responsible for maintaining data quality can attempt projects impacting the quality of different datasets, however might also impact the different dimensions of data quality in varied ways. It is very conceivable that endeavours to enhance the nature of a specific measurement reduced the quality on another dimension; an instance is the trade-off between accuracy and timeliness. (Ballou, Wang, & Kumar Tayi 1998)”.

INFORMATION QUALITY

“in the world of information quality, the terms of information quality and data quality (DQ) are often used interchangeably. Tayi and Ballou define data quality as fitness for use (Tayi & Ballou, 1998). W. E. Deming, who is one of the best known pioneers in the field of quality, stated that “Quality can only be defined in terms of the agent” (Fisher, Lauria, Smith, & Wang, 2008). Wang and Strong adopted TQM approach to data quality and applied advanced statistics to describe correlations among data quality dimensions (Wang, 1998). Four categories of data quality dimensions are proposed as following (Wang, 1998) (Fisher, Lauria, Smith, & Wang, 2008)”.
Intrinsic IQ reflects the intrinsic nature of data, which means that the quality of the data is knowable only from its use (Fisher, Lauria, Smith, & Wang, 2008).

Contextual IQ means that the quality of data is best determined in the context where it is to be used (Fisher, Lauria, Smith, & Wang, 2008).

Representational IQ describes the presentation and usability of data (Fisher, Lauria, Smith, & Wang, 2008).

Accessibility IQ includes the IQ dimensions of access and security. Access and security reflect the availability of the data as well as its level of protection from unauthorized access (Fisher, Lauria, Smith, & Wang, 2008).

**TEN DIMENSIONS OF INFORMATION QUALITY**

1. Relevance – The first dimension of information quality is relevance, it is termed as the key component as identifying whether the information addresses its customers’ needs or not is of utmost importance. If the information fails to meet customers or readers needs then it will be considered inadequate irrespective of its high rating among the remaining nine dimensions. Being less relevant to a user or reader doesn’t categorise the information as of reduced quality. It just implies that the information belongs to a diverse information class this can also be understood in a way that an android smartphone and an apple phone are both members of different classes of mobile phones. Depending upon the situation, some cases require less relevant information and that might actually be quite good for that. Only important thing that matters is to make the customer understand and comprehend the information and how well he can use the information accordingly (Miller, 1996).
2. **Accuracy**- Accuracy is another key dimension of information quality. Accurate information holds the fundamental grounds of quality information and hence accuracy seems very obvious information quality dimension. Effectively, information meant to serve diverse set of functions demands different levels of accuracy and in fact the information can be specific. Problem of information inaccuracy and all related problems might occur in several information systems. The problem is prominent and is discussed by many experts right from designing to application to support. Here a very less known fact is that the data is conceivable over accurate when its amount of accuracy go beyond its customer’s computing kills. Accuracy maintenance increases the total cost related with the information system, stresses system reliability. Bringing accuracy creates a lot of confusion which derives wastage or neglecting of the quality information.

3. **Timeliness**- Need of timely information still holds its importance. This definition inherently comprises of a dynamic process in which old information is being replaced by the new information. Cycle time of information can be defined as how rapidly new information can be prepared and served to its customers for their use. Both timely and accuracy dimension works simultaneously. Due to rapid change in technology and competitive environment changes the idea of what is timely is also continually varying and being reconsidered. Currently, time-sensitive rivalry and the corresponding decrease in tasks process durations have powered an interest for timeless information.

4. **Completeness** – If the information is incomplete it will definitely cause customers misleading. A person holds different perspective and hence information considered complete for one person might be incomplete for another an example for this is watching 9 written horizontally from its left to right, for left person it is six and for right person it is nine and they both are correct at their places. Alike accuracy, completeness of information which exceeds a customer’s computing ability might be considered too complete.

5. **Coherence**-Consistency of information is another dimension that needs to be addressed properly. How well information goes inline together logically and is confirming with itself is coherency of information. Factors that cause information for being illogical and incoherent are irrelevant data, confusing methods, or unclear plan than creates confusion in the minds of the customers and results in rejection of information message. Even though information can be honestly incoherent, incoherent information typically shows a fault in accuracy or timeliness dimensions.

6. **Format**-Next is information format; this refers to a method of presenting information to the customer. Information format has two components first is its primary form and second is its background for analysis, which is occasionally stated as its frame. Also, two main factors on which an appropriate format for information depends are who the customer is and why he needs the information (use). For instance, an accountant who wants to make a graphical summary of 25 pages of data, for a presentation to top management for sales purpose, might prefer using only multi color pie charts (Miller, 1996).

7. **Accessibility**-Accessible means it can be used where required. Accessibility relies upon the customer and even on the explicit conditions for that customer. For maintaining information quality timeliness and accessibility should go hand in hand with each other. Timely information without accessibility/that is inaccessible and accessible information that is not timely/ obsolete fails to fulfil a requirement of information that customer's needs.

8. **Compatibility**-to reword an “acclaimed line, no information is an island”. “Information quality falsehoods not just in the nature of the information itself, yet additionally by the way it very well may be joined with other information and conveyed to a customer, this regularly includes systems working cooperatively with each other”. The correct information design improves information quality by making the information appropriate for upgraded use. Quality engineering suggests a dynamic structure that can develop with changing customer’s prerequisites. This is important when organizations must use their information base to grow new items and administrations and also improve their manufacturing and the management forms.

9. **Security**- “Information security has been a stepchild of the information technology revolution”. Information security being an imperative feature was usually added on after information development was completely done or being ignored overall. Two main features of information security are to safeguard the information from people (logical security) and to safeguard the information from natural disaster (disaster recovery planning). Logical security depends on logical obstructions such as password, data encryption and transaction verification, alongside human
carefulness. Second disaster recovery planning comprises of safeguarding information and confirming that suitable reinforcement and substitute processing methods are set up (Miller, 1996).

Validity-At the end check on information validity is performed i.e. whether information can be verified as being perfect and meeting suitable standards associated with all the other dimensions viz. accuracy, timeliness, completeness and security. The most widely recognized type of validity check is inspecting information, either as a continuous practice or as a component of a special task. Inspecting can reveal botches and is an acknowledged proportion of information quality. A conspicuous model is the corporate fiscal summary, which to gain credibility must be reviewed by an independent person. Though, similarly as quality can’t be examined into manufactured items, quality can’t be evaluated into information item.

Validity is a resultant dimension as opposed to all causal dimensions of information quality. Despite the fact that validity might be high, other vital measurements might be low and generally speaking, the information might be of low quality. At last, improving the structure and continuous activity of the human and mechanical information framework is the only way to quality maintenance of information (Miller, 1996).

REVIEW OF LITERATURE ON E-PUBLISHING
Electronic Publishing has been widely supplanting the ordinary publication of books, articles, journals and other printed productions. An Innovative advance in PC and information has continued the electronic publishing activities.

1. As stated by Hawamdeh and Hart (2002), “electronic publishing is comparatively a naïve terminology and holds different meaning to different people, where it has been characterized from a wide variety of views. Results and discoveries from few journal articles on subject related to electronic publishing has demonstrated that there are different terminology that is being used to display the latest publication though alike in its perspective. Few writers have used these terms ‘electronic journal publishing’, ‘electronic scholarly publishing’ or ‘academic e-journal’ when making their papers on publishing scholarly articles electronically in their journal papers”.

2. Open e-Book Forum (2000) stated that electronic publishing is the art of distributing Writing Work in digital form; CDs, DVDs and Web sites. Currently this definition witnessed small reforms as now, electronic publishing is defined as “the publication and broadcasting of information or knowledge in and via all electronic medium (eg. CD-ROM, DVD-ROM, online blogs, online portals, books on mobile applications etc.)”.

3. Graham (2001) According to him electronic publishing is all about publishing articles and writing material using the tools of technology. This notion is then backed up by Palmer et al (2000), he quoted that “the digital and technological revolution possess rapid data” diffusion abilities to varied locations breaking all geographical boundaries has gifted the prospects to publish all the literary work and information electronically. In line with these notion and opinions, “Haigh (1997) has also stressed on technology competencies to back up high data broadcast of information retrieval and information processing in electronic publishing”.

4. Brownriggand Lynch (1985) adopted an altogether different strategy to characterizing an electronic publication. Their savvy article started by making a reasonable qualification between e-publication and dissemination of information. The writers recognized what they called Newtonian (Gutenberg/paper-based) publishing and quantum-mechanical (electronically transmitted) publishing. They presumed that a lot of what is right now named electronic publishing is really conventional Gutenberg-style publishing did by present-day techniques. Their research was that electronic publishing is a delivery channel: that publication is an activity and process instead of an object. This thought appears to have some legitimacy.

5. Latamore (2011) has done an investigation on benefits of electronic publishing over paper printing. He saw that one of the biggest depletes on corporate assets efficiency still be the perpetual dependence on paper documents. Thirty years after the computer transformation put processing power in the hands of for all intents and purposes each representative, all documents are made electronically. However paper records are wherever in workplaces today and official are even known to print their email.
6. **Arora (2001)** completed an examination on EP diagram, he saw that revolution has quite recently started, and is experiencing a procedure of adjustment. Writers, distributors, clients, and curators are barely starting to exploit possibilities of electronic media. He infers that the progressing shift towards EP is relied upon to proceed.

7. **Kist (1989)** "characterized electronic publishing as the application by publishers of a computer-supported process, by which they discover, catch, store, and refresh information content so as to spread it to a selected viewers ". Kist brought up that this definition sees no difference amongst the assembling procedure and the scattering procedure. Not exactly 10 years prior the term electronic publishing distinguished an action that is presently alluded to as desktop publishing, in which information is put away and organized electronically, yet made and disseminated by customary paper-based strategies. Kist asserted that the term electronic publishing (which can incorporate any single angle digital storage, creation, or transmission of a publication) is currently so wide that it is typically insignificant”.

8. “**Eysenbach (2000)** identified e-publishing in different forms of ‘electronic’ which alludes to data or information that is kept only in PC’s and ‘publication’ which signifies ‘making public’. Due to the reason that these days information dissemination is widely and easily disseminated to public with the use of digital technology like using CD-ROM or Internet (e.g.: mailing list, websites, etc.)”.

9. “Libraries are increasingly proposing publishing services as part of their work with their communities. Recently, there has also been a pronounced interest in providing electronic publishing (e-publishing) services (LaRue, 2012)”.

10. **“Kesim, Mehmet AU - Yildirim, Hakan PY 2017**. The development of new technologies advances in web technologies and the ease in design for mobile devices has allowed e-books to naturally evolve into interactive e-books. The development from printed books to e-books, and from e-books to interactive e-books is also a current issue for the field of open and distance education. When the concept of e-books first emerged, there was no unique definition of this concept. Researchers merely referred to e-books as the digitalized states of regular books. With the development of new technologies, e-books are now capable of providing feedback to learners, giving rise to interactive e-book technologies through the enrichment of content. Interactive e-books have been rapid and effective in catching up with technological developments”.

11. “According to Lancaster, the term electronic publishing refers to the generation of publication in electronic form or at least with the aid of electronics. its developments can be traced back to the early 1960s”.

**REVIEW OF LITERATURE ON QUALITY INFORMATION**

“At the point when information is utilized to convey and exchange thoughts, it is critical that the information can be relied upon, which means normally that it is of good quality. Not at all like the individuals who are in the job of purposely dispersing disinformation, are information experts keen on offering access to and utilizing information of high quality. Individuals in the information production-organization-retrieval-use jobs have long supported in the interest of information quality and are properly worried about the structure and upkeep of frameworks and administrations that give access to information of good quality”.

1. While it seems that the nature of information is—or ought to be—an issue of worry to the populace everywhere, it must "likewise be recognized that there is a peril of a few issues being, at any rate to some degree, the formation of over-passionate information pros, looking for issues to which they can give the solutions" (Bawden & Robinson, 2009, p. 181).

2. “The idea of information quality regularly goes unclear in these investigations; researchers in the territory ordinarily take note of that ‘quality is a subtle idea’ (Fink-Shamit and Bar-Ilan, 2008) and rather express an arrangement of characteristics that make up information quality”.

3. “**Chesney (2006)**, for example, noticed that information with high quality is typically considered to have a few or the majority of the accompanying attributes: Latest, relevant, exact, monetary for the current reason, timely and justifiable to the individual who needs it. **Arazy and Kopak (2011)** requested that understudies rate information in terms of quality (e.g. exactness, culmination, objectivity, and portrayal), and **Rieh (2002)** drew on past research on significance to search for goodness, efficacy, precision/legitimacy, recency, perceived quality, genuine quality, expected quality, power, and consistency”.

4. Unfortunately, “the vast majority of the writing on information quality throws a fairly tight reasonable net when it problematizes the idea. Information quality is frequently characterized
or conceptualized as a characteristic quality that information itself has paying little respect to circumstance and setting; it is expected that information quality can be surveyed dependent on an assessment of the information itself. While talking about extraneous characteristics, answers to questions, for example, who said it? Who composed it? What is the source of this information? (Fink-Shamit and Bar-Ilan, 2008) are accepted to flag the dimension of information’s quality (e.g., The creator is a specialist, so the information must be legitimate)

5. “This paper investigates how the quality of certain attributes of e-commerce systems — such as information quality, system quality, and service quality — can be leveraged to enhance business benefits as indicated by customer commitment and customer retention. This study argues that relationship quality, a concept encapsulating the ideas of both trust and satisfaction, is crucial for transferring attributes of e-commerce systems into business benefits. A research model of relationship quality in e-commerce was built, drawing upon information systems and marketing literature (Chhikara, Ankit 2015)”.

REVIEW OF LITERATURE ON QUALITY OF E-PUBLISHING

All in all, what these writers recommend is the information distributed by recognized publishing houses, through recognized production channels, has experienced a companion audit or a publication procedure, and in this way should be considered of high quality. The contention is that somebody at some place has chosen that the information is of high quality and that we, the information customers, require not scrutinize the information’s quality in light of the fact that well-known institutions have made a decision about the information’s quality.

1. “Lucassen and Schraagen (2011, p. 1232) bring to light, this point when they locate that, Online information is not less reliable, as such, but users ought to know about the likelihood of experiencing low-quality information.”

“The peril of experiencing such low-grade information was reduced in the last days when the confirmation of information reliability was for the most part executed by experts. It is interesting that examinations of the quality of information appear to be pretty much too aimlessly acknowledge those foundations’ decisions of quality, and recognize the thought of information quality as a test just in circumstances where those institutions are missing”.

2. “Arazy and Kopak (2011)” recommend that with the “lessening of customary door keeping on the ‘information production side (e.g. publication and friend audit forms), increasingly more of the accessible content is gotten from sources with blended, and now and again questionable, provenance”.

3. “Lim (2009) discovered that college students use Wikipedia and have a positive experience doing as such, however, they inclined not to hope to locate the best information there. Lim’s attention isn’t on the quality of information in Wikipedia fundamentally, however on how the students ‘see its information quality’. He found that while the students held a moderate discernment with respect to the information quality— or did not see Wikipedia’s information quality profoundly— they some way or another knew to be wary about its information quality”.

4. “Stvillia, Twidale, Smith, and Gasser (2008) were progressively idealistic about Wikipedia’s information quality in their investigation of Wikipedia editors’ understanding and treatment of information quality”.

5. “Luyt and Tan (2010) concentrated on one proportion of quality of Wikipedia articles, in particular, the reference and quotation practice. While not talking specifically about the thought of information quality, Lankes (2008) needs to move the comprehension of the validity of information from its present site in ideas of power to an increasingly unique position of consistency”.

6. Savolainen (2011) parts “the exercise in balancing control into two segments, quality and validity, by limiting information quality to the message’s information content and information believability to the characteristics of the writer of the message”.

7. As Andersen (2006) displays, some work in “information education will in general limit itself to details and a restricted spotlight on library systems, yet the idea of information proficiency, he contends, should be considered in a more extensive setting”.

CONCLUSION

E-publications have emerged as a boon to research and development sector in education. They uncovered several outstanding opportunities and possibilities for science and technological libraries in research and development institutions. This new concept of E-publishing holds a wide scope and a strong potential of offering quality information. There are many benefits and disadvantages of E-publications, researchers and
users are required to identify a balance of the factors that would ensure the success or failure of electronic journals. Also, budgetary constraints are required to be kept in mind essentially to evaluate each e-journal to justify the expenditure made on them. E-publication is a gift to research and development sector given by the technology. E-publications should be promoted in all colleges and institutes so as to provide relevant information efficiently to the users.

“Those best-printed means is usually one that is right, genuine, reliable, and of high quality. The evaluation of information quality, in any case, go into an intricate web which must mull over the sender’s purpose and knowledge; the inter textual learning about the topic; the societal, social, and logical realities about the topic; and the per user’s exercises and interests. To overlook any of these segments neglects the genuine multifaceted quality of the issue, and to disregard that intricacy risks the presenting solutions and thoughts that don’t address the real problems in question”.

By positioning the concept of information quality inside a theory of information, a superior verbalization is accomplished for what is implied by information. To understand the concept of information quality, we have to comprehend what is implied by information.

The present paper has investigated “the quality of information by e-publications, to build up a structural comprehension in which information is seen as a sign to encourage the substituted production of significance. In this sense, meaning and information turn out to be firmly connected ideas—information quality turns into a result of how much the exchange and creation of significance have been effective. Grice’s realistic theory of language shows a system through which to measure such achievement. Applying his conversational proverbs to the appraisal of information quality, we find incredible assets that uncover in detail how information quality is a situational and logical concept”.

REFERENCES


http://repository.um.edu.my/87/6/Chapter%202%20Literature%20Review.pdf


Lancaster, F.W. the evolution of electronic publishing. Library trends, 43 (4), spring 1995, 518-27


