



Self-Efficacy and Attitude towards Information Literacy Skills: A Study on Library and Information Science Students

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Abstract

The study discusses self-efficacy and attitude towards information literacy skills among library and information science students. Self-efficacy belief gives the base to human motivation, prosperity, and individual accomplishment. Individuals have minimal impetus to act, if they trust, that the task at hand, surpasses their abilities, to embrace and perform exercises to attempt and achieve their desired goals or deliver the desired results. Students' attitude towards information literacy skills is necessary. Attitude usually plays an important role in students' skill in a learned area. Hence, the steer in information literacy could be persisted on the attitude of students to be versed in their information literacy skills. The instrument used for data collection was questionnaire, 400 students of four universities were used for the study, mean was used to analyse the research questions. The population for the study is 757 while 400 students were sampled for the study. The study concludes that students of library and information science possess a high level of information literacy skills to exchange information with colleagues. It is recommended that students should be encouraged to have a positive attitude toward information literacy skills and interact with their peers in group discussions as it will increase their knowledge in studies.

Keywords: Self-efficacy, Attitude, Information Literacy Skills, Library and Information Science Students

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Introduction

Self-efficacy is a thought that one is capable of performing in a specific way or achieving certain objectives. It is a conviction that one is capable of playing the activities required to oversee planned circumstances. Students' usually judge their ability of learning based on specific learning outcome. As indicated by Bandura(1977), achievement is not just the possession of important skills, it additionally requires the certainty to utilize these skills adequately. As it is, taking in specific skills are not sufficient; people ought to create trust in the skills that they are learning. Subsequently, other than having information literacy skills, individual of the present social order should likewise feel equipped and certain about the utilization of these skills. Along these lines, accomplishment of self-efficacy beliefs is as vital as having information literacy skills. Tella and Tella (2004) states that Self-efficacy refers to a belief in one's ability to successfully perform a task.

Bandura(1997) characterizes self-efficacy as a belief in one's capacity to compose and execute the game-plan required to accomplish an objective. At the end of the day, individuals have a tendency to perform undertakings and exercises in which they feel skilled and confident, and maintain a strategic distance from the one's in which they cannot perform so well (Nina, 2008).

Self-efficacy belief concede to what extent people will continue, how flexible they will be even with the challenges and how much exertion they will put on any activity. People with high self-efficacy perception hope to succeed and will continue an activity until the point it is finished. Despite what might be expected, people with low self-efficacy recognition foresee disappointment and are more averse to continue doing testing activities. The higher the feeling of efficacy, the more prominent their effort, persistence and versatility which are two significant variables for information problem solving, self-controlled learning, and lifelong learning. Bandura(1997) opined that, people who build up a solid feeling of self-efficacy are ready to teach themselves when they need to act without anyone else's idea. This is why strong self-efficacy discernment for information literacy turns into a need to achieve lifelong learning (Kuranogu, Kukoyunlu and Umay, 2006).

Self-efficacy impacts human working, in spite of the fact that the knowledge and skills individuals have assume basic role in the decisions they make, individuals' level of inspiration, and activities are constructed more in light of what they accept than on what is fairly valid (Bandura, 1997; Nina, 2008). That is one motivation behind why self-efficacy is so imperative for lifelong learning. On the contrary, people who feel themselves capable and are sure about their information literacy skills readily attempt and effortlessly solve information issues. It is more probable others will keep away from and dither to have a go at solving of information issues in their hands. Since self-efficacy depends on self-perception with respect to specific behaviour, the construct is thought to be circumstance particular or domain touchy. That is, an individual may display elevated amount of self-efficacy inside one domain while showing low levels inside another domain (Tella, 2004).

Self-efficacy is the belief that one is fit for performing in a specific way to accomplish certain objectives (Ormrod, 2006); an individual's belief in himself to achieve desired results (Bandura, 1997). A solid feeling of self-efficacy would upgrade one's achievement and individual prosperity. This idea has been connected in an assortment of fields, since its presentation in 1977 (Waldman, 2003). Results deciphered as effective raise self-efficacy; those translated as disappointments low it down (Pajares, 1997). Regardless of the prior, it is appropriate to confer that self-efficacy is not identified with actual skill level, but rather is pertinent in deciding to what extent an individual continues in a task or activity, and whether the assignment will be done by any stretch of the imagination (Bandura, 1997). Self-efficacy in information literacy skills would have any kind of effect in how an undergraduate feels, considers and acts over the course of their learning. To be sure, there are research confirmative examples, Pajares (1997); Pintrich and Garcia (1991) who cushion self-efficacy in information literacy skills in relation to academic accomplishment. Students who are certain about their information literacy skills expect high academic results; the inverse is valid for the individuals who do not have the confidence (Pajares, 1997). Studies have additionally exhibited a connection between attitude, self-efficacy and skillfulness, that, positive attitude grounded in self efficacy will create a high proficiency in information literacy skills (Correia, 2002; Owusu-Ansah, 2003).

To work successfully, information literate people need the conviction of being equipped for performing undertakings viably and such individual's self-efficacy should supplement the

qualities of his effort or services rendered. Thus, students' attitude towards information literacy skills is necessary.

Attitude has developed to allude a man's psychological and neural state (Breckler and Wiggins, 1989, p.407), as a modern idea started towards the beginning of the twentieth century. Before this point, attitude was a physical idea utilized by specialists to portray the stance of stationary figures, on-screen characters and artists (Shrigley, Koballa and Simpson, 1988). After progression in sociologies; it inquires about, the mental importance outperforming the physical stance proposition. Shrigley, Koballa and Simpson's (1988) viewed attitude as mental idea and an evaluative quality to depict the enthusiastic readiness of people in learning emergency. The willingness to have a positive concept in the learning situation may help the students in gaining a positive feedback in the task being practiced. Thus, a positive attitude towards information literacy skills will earn student's an edge in their skills proficiency.

As indicated by Dillard (1993), there are a few conceptualizations of attitudes in sociology to explore. The idea of attitude has been connected to emotional, behavioural and cognitive procedures (Breckler and Wiggins, 1989, p.408). In this way, the meaning of attitude ought to comprise affective, emotional and cognitive parts (Rokeach, 1968; Azjen, 2005, p.20). Thus, attitude is recognized as a difficult task for researchers. However, scholars have been able to define attitude from their various perspectives. Ajzen (2005), opined that attitude, has an effect for or against an emotional object. Fishbein & Azjen (1975) defined attitude as, a learned predilection to act, consistently in favourable or unfavourable way with reference to a given aim. Attitude is a general and continuing positive or negative inclination about a few people, protest, or issues with regard to the particular circumstances (Petty and Cacioppo, 1981, p.7). In another vain, Eagly and Chaiken (1993) introduced a more comprehensive definition by considering three noteworthy parts of attitude to be specific, tendency, entity (or state of mind protest/attitude), and assessment. They characterized attitude as an emotional propensity that is enunciated by assessing a specific substance with some level of favour or disfavour. Comparative corrections to these definitions by different researchers kept on populating attitude literature, however, behaviour, cognition and emotion stayed center to every definition. It is imperative to acknowledge the fact that if students have a stable emotion, behaviour and cognition such students will attain competence in information literacy skill.

Information is an important factor in improving student's self-efficacy and attitude in the investigation of library and information science, subsequently, it has for quite some time been sloughed to comprehend the components that impels an information searcher towards finding applicable information. Focal point of this study has been on the factors that assume critical roles in information utilization; the procedure of information inquiry, retrieval and continuous learning. These examinations are given more significance today on account of the developing impact of information and communication technology, (ICT) on information administration (Owusu-Ansah, 2003).

The information condition of the 21st Century blossoms with few abilities that are fundamental for lifelong learning. All things considered, the concept of information literacy (IL), which evolved with the coming of information and communication technology had developed and has come to realization and fortified to end up perceived as basic literacy for the 21st Century (Bruce, 2002). Webber and Johnston (2002) characterize information literacy as "the reception of proper information conducts to get, through whatever channel or medium, the information very much fitted to information needs, together with basic consciousness of the significance of astute and moral utilization of information in the society".

There are numerous meanings of information literacy, the American Library Association (1989) furnishes the world with a basic and direct conceptualization of information literacy. Individual must have the capacity to perceive when information is required and should find, assess and utilize the required information. The librarians and information professionals have increased interest in information literacy (Virkus, 2003). This has been shown through various activities, conferences, workshops, work gatherings and adjustment of information literacy competency measure by professional associations, establishments and nations (Maughan, 2001; Virkus, 2003). Information literate people are the ones who have figured out how to learn, how learning is composed, how to discover information and how to utilize information. They are set up for lifelong learning (Maughan, 2001).

Information literacy would empower an undergraduate to see, encode, translate, hold and utilize viable information or learning materials. Through Information literacy, students turn out keener and more adaptable in looking for and utilizing information. As of late, Information literacy has been recognized as a key to graduate result and a necessary piece of undergraduate curriculum module (Radomski, 2000; Wright and McGurk, 2000).

Information literacy is the key ability required for lifelong learning as well as for accomplishment in the information based social orders. An Information literate person knows how to learn and is fit for proceeding with lifelong learning. Information literacy is the term connected to the ability of information problem solving skills (American Library Association, 2000). The utilization of skills, information problem solving, as it were, information literacy skills turn into the vital scholarly element of any person's life. Information literacy consolidates the capacity to perceive when information is required and afterwards start seeking techniques intended to find the required information. It incorporates assessing, combining, and utilizing information properly, morally, and lawfully once it is gotten to from any media, including electronic or print sources. It likewise incorporates conveying and sharing the consequences of the information problem solving endeavours, precisely and inventively over the scope of information designs and assessing how well the final item settles the information issue and how fitting and effective are the means taken to achieve the coveted result. Moreover, an informative person devises systems for refreshing self-produced knowledge and perceives the principles of academic flexibility and impartial access to information (Association of College and Research Libraries, 2000; American Association of School Librarians and Association for Educational Communications and Technology, 1998)

It is on this note that the study seeks to examine library and information science students' self-efficacy and attitude towards information literacy skills in South South Nigeria.

Statement of the Problem

Observation has shown that students' use of library is on the decline and this decline has posed some concern as to why students are not using the library. Consequently, some scholars have ascribed the reasons to include their information literacy level, their self-efficacy and attitude toward information literacy skills. Students' in most cases believe in their self-efficacy (Brosnan, 1998; Koch, 1999; Breivik, 2002; Correia, 2002). This has resulted in some significant outcomes on their capacity to perceive and source for pertinent information; their ability to find, assess and viably use information in libraries or some other information system. Studies have also demonstrated that positive attitude towards information literacy is a precondition for the acquisition of information literacy skills (Radomski, 2000; Owusu-Ansah, 2003), thus, establishing the fact that self-efficacy and attitude are factors that may influence the level of information

literacy. However, existing literature has shown that most studies in the knowledge area have been carried out in developed nations, not much has been done in the developing countries especially in Nigeria. Consequently, in order to determine how these variables, interact in our local setting, this study will investigate library and information science students' self-efficacy and attitude towards information literacy skills in South South Nigeria.

Research Questions

The following research questions were formulated to guide the research study:

- I. What are the information literacy skills possessed by library and information science students in South South Nigeria?
- II. What is the attitude (cognitive or affective) of library and information science students toward information literacy skills?
- III. What is the level of self efficacy of library and information science students toward information literacy skills?

Purpose of the Study

The study focuses on library and information science students' self-efficacy and attitude toward information literacy skills in Universities in South South Nigeria. The main objectives are to:

- I. find out the information literacy skills possessed by Library and Information Science students in Universities in South South Nigeria.
- II. find out the self-efficacy, attitude (both cognitive and affective) of the library and information science students toward information literacy skills in South South Nigeria.
- III. identify the level of self-efficacy, attitude of the LIS students towards information literacy skills in South South Nigeria.

Research Design

The study adopts the descriptive survey design because it aims at collecting data on, and describing systematically, the characteristics, features and facts about the study; namely the self-efficacy and attitude towards information literacy skills among Library and Information Science students. Fraenkel and Wallen (2000) opined that, descriptive survey tends to describe the state of affair using a survey and it deals with numerical value or rather everything that can be counted and studied. Consequently, descriptive survey is suitable for this type of study because it involves conducting a survey and analyzing numerical data.

Population of the Study

The population for this study is 757 which are 400 level students from the Department of Library and Information Science. This is drawn from four Universities in South-South, Nigeria offering library and information science, namely Department of Library and Information Science. It also includes Ambrose Ali University, Ekpoma, Department of Library and Information Science, Delta State University, Abraka, Department of Library Science, University of Uyo, Uyo and Department of Library and Information Science University of Calabar, Calabar. The study was targeted at 400 level undergraduate Bachelor Degree students of 2015/2016 academic session.

Sample and Sampling Technique

The sample size of the study is 400 respondents representing 52.8% of the population selected from four universities using final year (400 level) students of LIS. The stratified random sampling technique was used to select the respondents from the population. According to Uzoagulu (1998), no fixed number or no fixed percentage is ideal, rather it is the circumstance of the study situation that determines what number or what percentage of the population should be studied (sampled).

Research Instrument

The questionnaire titled "Information Literacy Attitude and Self Efficacy Questionnaire" (ILASEQ) was used as the research instrument for this study to evoke information from the respondents within the selected universities. The questionnaire is divided into four sections A - D. Section A covers the bio-data of respondents. Section B - D of the questionnaire was designed to draw out information on the level of information literacy, perceived self-efficacy, attitude towards information literacy and information literacy skills of undergraduate students of Library and Information Science.

Method of Data Collection

Copies of the questionnaire were sent out to various library schools in the four universities. The researcher employed the service of four Research Assistants to administer the questionnaire one-on-one to the students and their responses were collected immediately. This method was preferred to achieve a high response rate and reduced overhead costs.

Method of Data Analysis

The study involved research questions. The descriptive statistics were employed in the analysis of the data collected. Descriptive statistics such as mean was used to analyze the data collected for the research questions.

Answering of the Research Questions and Discussion of the Findings

Research Question One: What are the information literacy skills possessed by Library and Information Science students.

Data in Table 1 provide answers to this question.

Table 1: Information Literacy Skills possessed by the Students

	Information Literacy Skills	Mean
1	I am able to define my specific information needs	3.39
2	I can clearly define concepts of a topic	3.31
3	I understand the need to use information to undertake everyday task	3.39
4	I have the ability to use several reference sources to increase familiarity with a topic	3.28
5	I have ability to select materials and summarize in my own words for my use	3.41
6	I understand the nature of information freely available on the internet	3.29
7	I have ability to take notes from print and electronic source by printing or saving to disk	3.17
8	I can use Truncation search techniques	2.74
9	I can use Boolean search techniques	2.72
10	I can limit online search by fields	3.00
11	I can use mailing list to obtain and exchange information	3.12
12	I can use discussion groups to obtain and exchange information	3.42
13	I can use news groups to obtain and exchange information	3.32
14	I am able to recognize accurate and complete information	3.35
15	I am able to use information in critical thinking and problem solving	3.32
16	I am able to access sources of information including computer based and other technologies	3.23
17	I can effectively use the library card catalogue to search for specific library materials	3.17
18	I can integrate new information into an existing body of knowledge	3.14
19	I can organize information for practical application	3.32
20	I can use web addresses to search the internet	3.31
21	I am able to use information ethically and legally	3.30
	Average mean	3.22
	Criterion mean =	2.50

With an average calculated mean of 3.22, it shows that the Library and Information Science students in universities possessed information literacy skills such as the use of discussion groups to obtain and exchange information (mean= 3.42) and the ability to select materials and summarize in my own words for my use (mean = 3.41). This is because the average statistical mean is higher than the criterion mean of 2.50.

These findings mean that the students of Library and Information Science possess information literacy skills. These findings are supported by Hall and Pinker (2007) studies on dependence, coupled with easy access to technology, which points toward students spending substantial quality of time on the Internet/online to access information. This is in agreement with the findings of Valentine (1993) that students of tertiary institution look for the fastest way that would lead to satisfactory results when doing research, going for electronic information sources as their online library to get information that can help them in their assignment.

Research Question Two: What is the attitude (cognitive or affective) of library and information science students towards information literacy skills?

Data in Table 2 provides answer to this question.

Table 2: Attitude of Students toward Information Literacy Skills

	Cognitive Attitude	Mean
1	Information literacy has positively affected my Peer influence	3.52
2	I believe information literacy will enhance my academic performance	3.58
3	I believe it is easy to be information literate	3.53
4	I think possessing information literacy skills is prestigious	3.45
5	I feel possessing information literacy skills is an idea	3.45
6	Possessing information literacy skills makes me confident	3.52
	Affective Attitude	
1	I believe information literacy will make me comfortable with library and information systems	3.47
2	I think information literacy skills are valuable to my academic success	3.64
3	I believe information literacy skills will facilitate easy communication of information	3.27
4	I believe information literacy will facilitate information discovery	3.32
5	I feel information literacy will improve my access to a vast information base	3.42
6	I think information literacy is a necessary skill in my academic pursuit	3.49
	Average Mean	3.47
	Criterion mean =	2.50

With an average calculated mean of 3.47, Table 2 shows that the library and information science students in universities have a positive attitude (both cognitive and affective) towards information literacy skills. This is because the average calculated mean of 3.47 is higher than the criterion mean of 2.50.

These findings mean that student's literacy and information skills are influenced by their attitude, either cognitive or affective. Furthermore, the result reveals that LIS postgraduate students possessed moderate level of information literacy skills. This study is supported by Sumpter (2006) who found that LIS postgraduate students demonstrated high proficiency in information literacy knowledge, and that they may have gotten the right attitude towards information literacy skills. The result of this study agrees with that of Anunobi and Obiora (2015), Irawati (2009) and Singh (2005). Anunobi and Obiora (2015) found that LIS postgraduate students demonstrated high proficiency in information literacy skills as a result of their cognition and affection towards information literacy skills. Irawati study also grouped the students' information literacy skills as very good owing to their attitude to possess the skills. Finally, Singh study found that graduate students met Association of College and Research Libraries (ACRL) standards. In other words, meeting the ACRL standard means that the students possessed high level of information literacy skills.

Research Question Three: What is the level of self-efficacy of library and information science students towards information literacy skills?

Data in Table 3 provides answer to this question.

Table 3: Self-efficacy of the Students towards Information Literacy Skills

	Self-efficacy	Mean
1	I am proficient in using the computer	3.33
2	I have good knowledge of computer software and applications	3.15
3	I am capable of locating information from any information source	3.31
4	I am proficient in using varieties of library and information systems	3.08
5	I have good knowledge of information systems technicalities	3.05
6	I am proficient in using information systems user interfaces	2.97
7	I am conversant with varieties of information formats	3.04
8	I have a good knowledge of information network environment	3.04
9	I am proficient in navigating online for information	3.25
10	I can use the library catalogue effectively	3.05
11	I am conversant with information indexes	2.96
12	I am conversant with information abstract	3.01
13	I am conversant with bibliographic information	3.12
	Average Mean =	3.10
	Criterion mean =	2.50

As per Table 3, with an average mean of 3.10 which is greater than the criterion mean 2.50, the students' level of self-efficacy is high.

This finding means that students possess a greater self-efficacy towards information literacy skills. This thought is upheld by Okello-Obura and Magara (2008) that students are increasingly anticipated to utilize electronic information resources while at the university. To make use of the developing scope of electronic resources, students must obtain and practice the abilities and skills important to practice them. Thachill (2008), likewise states that electronic resources and the new models of education have created considerably more prominent requirement for reference and guidance. Thus, student's information literacy skills will increase their academic performance in library and information science.

Conclusion

It can be seen that the students of library and information science possesses a high level of information literacy skills to exchange information with other colleagues. It can also be agreed that, there is a significant relationship between the level of self-efficacy of library and information science students in South-South Nigeria and their information literacy skills. This implies that an increase in the self-efficacy of the students may lead to a corresponding increase in their information literacy skills. The study concludes that attitude and self-efficacy of the students significantly predicts information literacy skills amongst library and information science students in South South Nigeria.

Recommendations

The accompanying recommendations were made to improve library and information science students' self-efficacy and attitude towards information literacy skills in South-South Nigeria;

- i. Information and communication technology approaches must not only be exclusively planned in the libraries but a section should be provided for the use of information technology accessories in the library to increase the students' attitude towards information literacy skills.

- ii. Students should be encouraged to have positive attitude towards information literacy skills and to interact with their peers in group discussions as it will increase their knowledge and skills in their studies.

References

- Ajzen, I. (2005). *Attitudes, personality and behavior*. NY: Open University Press.
- Anunobi, C.V., & Obiora, K.U. (2015). Information Literacy Competencies of Library and Information Science Postgraduate Students in South East Nigeria Universities: A Focus on the Knowledge and Skill Level. *Information and Knowledge Management*, (5)2, 20-30.
- Information Literacy Competency Standards for Higher Education (2000). Retrieved from www.alair.ala.org
- Presidential Committee on information literacy*(1989). Retrieved from <http://www.tulips.tsukuba.ac.in.jp/dspace/bitstream/2241/102592/21p-7.pdf>
- Information Literacy Competency standards for higher education* (2003). Retrieved from: <http://www.alair.ala.org>
- Bandura, A. (1977). Self-efficacy: toward a unifying theory of behavior change. *Psychological Review*, 84, 191-215.
- Breckler, J. S., & Wiggins, E. C. (1989). On defining attitude and attitude theory: Once more with feeling. In A. Pratkanis, J. Breckler, A. Greenwald (Eds.), *Attitude structure and function* (pp.407- 425). NJ: Lawrence Erlbaum Associates, Inc.
- Breivik, P. S. (2002). Information Literacy and the Engaged Campus. Giving students and community members the skills to take on the internet. *American Association of Higher Education Bulletin*, 53(1), 3-6.
- Brosnan, M. J. (1998). The impact of computer anxiety and self-efficacy upon performance. *Journal of Computer Assisted Learning*, 14(3), 223-235.
- Bruce, C. (2002). *Information literacy as a catalyst for educational change: A background paper*. (White paper prepared for UNESCO, the U. S. National Commission on Libraries and Information Science, and the National Forum on Information Literacy), Retrieved <http://www.nclis.gov/libinter/infolitconf&meet/papers/bruce-fullpaper.pdf>
- Correia, A. M. R. (2002). *Information Literacy for an active and effective citizenship*. (Paper prepared by UNESCO for Information Literacy Meeting of Experts, Prague, Czech Republic).Retrieved from <http://www.nclis.gov/libinter/intolitconf86mett/papers/brucefullpaper/pdf>.
- Dillard, J.P. (1993). Persuasion past and present: Attitudes aren't what they used to be. *Communication Monographs*, 60, 90-97.
- Eagly, A. H., & Chaiken, S. (1993). *The psychology of attitudes*. Orlando, US:Harcourt Brace Jovanovich College Publishers.
- Fishbein, M., & Ajzen, I. (1975). *Belief, attitude, intention, and behavior: An introduction to theory and research*. Reading, MA: Addison- Wesley.
- Fraenkel, J. R. & Wallen, N. E. (2000). *How to design and evaluate research in education* (4th ed.). Boston, MA: McGraw Hill, Inc.
- Irawti, I. (2009). *Information literacy competency of library and information science students at the Faculty of Humanities University of Indonesia*. Retrieved from <https://www.tulips.tsukuba.ac.jp/dspace/bitstream/2241/102592/21p-7.pdf>
- Koch, M. (2001). Information Literacy: where do we go from here? *Technos*,10(1),1-8.
- Kuranogu,S.S., Kukoyunlu, B. & Umay, A. (2006). Developing the information literacy self efficacy scale. *Journal of Documentation*, 62(6), 730-743.



- Maughan, P. A. (2001). Assessing Information Literacy among undergraduates: A discussion of the literature and the University of California Berkeley Assessment Experience. *College and Research Libraries*, 7(1), 71-85.
- Nina, S. (2008). *A study on student's use of library resources and self. efficacy.* (Master's thesis, Central Department of Library and Information Science, Library and Information Science. Tribhuvan).
- Okello-Obura, C. & Magara, E. (2008). Electronic Information Access and Utilisation by Makerere students in Uganda. *Evidence Based Library and Information Practice*, 3(3), 39-56.
- Ormrod, J. E. (2006). *Educational Psychology: Developing Learners.* New Jersey, Merrill: Upper saddle River.
- Owusu-Ansah, E.K. (2003). Information literacy and the academic library: a critical look at a concept and the controversy surrounding it. *Journal of Academic Librarianship*, 29(4), 219-230
- Pajares, F. (1997). Current Directions in Self-efficacy research. In M Maehr & P. R. Pintrich (eds), *Advances in motivation and achievement* (pp 1- 49). Greenwich, CT: SAI Press.
- Rokeach, M. (1968). *Beliefs, attitudes, and values: A theory of organization and change.* San Francisco, CA: Jossey-Bass.
- Shrigley, R., Koballa, T., Simpson, R. (1988). Defining attitude for science educators. *Journal of Research in Science Teaching*, 25(8), 659-678.
- Singh, A.B. (2005). A report on faculty perceptions of students' information literacy competencies in journalism and mass communication programs: The ACEJMC survey. *College and Research Libraries*, 66(4), 294-310.
- Tella, A. & Tella, A. (2004). Self Efficacy and use of Electronic Information as Predictors of Academic Success in Nigeria. *Electronic Journal of Academic & Special Librarianship*, 8(2). Retrieved from http://southernlibrarianship.icaap.org/content/v08n02/tella_a01.html.
- Thachill, G. (2008). Academic Libraries Redefined: Old Mission with a New Face. *Scroll*, (1)1, 1-6.
- Uzoagulu, A.E. (1998). *Practical guide to writing research project reports in tertiary institutions.* Enugu: John Jacobs Classic Publishers Ltd.
- Valentine, B. (1993). Undergraduate research behavior: Using focus groups to generate theory. *Journal of Academic Librarianship*, 19(5), 300-304.
- Virkus, S. (2003). Information literacy in Europe: a literature review. *Information Research*, 8(4), 1-159.
- Webber, S. & Johnston, B. (2003). Assessment for Information and Literacy: Vision and Reality. In A. Martin and H. Rader (eds) *Information and IT Literacy Enabling Learning in the 21st Century* (pp 101-11). London: Facet Publishing.
- Wright, L. C., & McGurk, C. (2000). Integrating Information Literacy: University of Wollongong experience. In Bruce, C.S. and Candy, P.C. & Helmut, K. (Eds.). *Information Literacy Around the World: Advances in Programs and Research* (pp 83-99). Wagga Wagga, Australia: Charles Sturt University.

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