

Selected Internet Platform Variables Application Competencies Required By Secretaries for Information Administration In Federal Universities In Nigeria

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ABSTRACT

The purpose of the study was to determine the internet tools application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria. Seven specific objectives was identified, seven research questions was raised and seven null hypotheses was formulated to guide the study. The study adopted a survey research design and was carried out in the South-South zone of Nigeria. The population of the study was 1,026 secretaries from which 287 secretaries were sampled using the Taro Yamane formula. The secretaries were categorized into, administrative, personal and confidential secretaries. The instrument for data collection was developed by the researcher and titled Questionnaire on Internet Tools Application Competencies for Information Exchange (QITACLE). The instrument was face validated by three research experts from University of Uyo, Uyo. The reliability of the instrument was obtained using the Cronbach's Alpha test which yielded reliability co-efficient of .89. Out of the 287 copies of questionnaire distributed 277 were returned with valid data. This gave response rate of 96.51 percent. Mean statistic was used to answer the research questions and Analysis of Variance used to test the null hypotheses at .05 alpha level. The study revealed that all the internet tools application competencies identified by the study are moderately required by secretaries for information exchange. The study revealed from the hypotheses that skype and whatsapp competencies are significantly required while facebook are not significantly required for information administration by secretaries in Federal Universities of South-South Nigeria. Based on these findings, it was concluded that secretaries require internet tool application competencies for information exchange in Federal Universities in South-South, Nigeria. Based on this conclusion, it was recommended among others that University authorities and management of other organisations should train their secretaries and updates their knowledge and skills on internet tools application variables for information exchange c other secretarial functions such as video conferencing.

Key Word: Internet, Variables, Competencies, Tools, Administration and Secretaries

Introduction

The diversity of services and opportunities offered by the Internet implies that it is full of applications for carrying out various functions aimed at achieving stipulated objectives. Internet application, according to Habib, Enite and Aworo (2015), is a term used in the web industry to describe services which address scalability and performance. This application is a group of technologies that allow users to access information and communication over the

World Wide Web, thus, performing complex business processes on either the client or the server which are usually done through the aid of a secretary in formal organisations such as the university.

Before the emergence of information technology, secretaries functions were manually performed such that documents and records were maintained on papers, stored in files and drawers. These secretaries, according to Mayer (2013), are assistants to an executive, having the mastery of office skills and ability to assume responsibility without direct supervision. Generally, secretaries in organisations like Universities are categorized into three: administrative secretaries, personal secretaries and confidential secretaries. The secretaries in their respective categories perform related functions with centres on information exchange. The implication of this definition by Mayer is that the secretary displays initiative, exercises judgement and takes decisions within the scope of his or her authority. Unlike the administrative secretaries whose primary function is the writing of minutes of meetings of committees. Bankole and Babalola (2012) explained that the personal secretaries are fundamentally responsible for the processing, storage, retrieval, planning and scheduling of meetings and appointments; organizing and maintaining paper and electronic files; managing projects; and disseminating information using the telephones, mail services, web sites and e-mails.

The use of a variety of office machines suggests that administrative secretaries, personal secretaries and confidential secretaries often use computers to perform different tasks such as creating spreadsheets, composing correspondences, managing databases and creating presentations, reports and documents using desktop publishing software, digital graphics and most importantly the Internet (Bankole and Babalola, 2012). The primary function of an administrative secretary is to ensure that the administrative operations of the office run smoothly. They are also responsible for a variety of administrative aspects in addition to standard secretarial duties. The personal secretaries help in daily management, scheduling of meetings, correspondence, answering of phone calls, e-mailing and note taking. Confidential secretaries provide administrative and clerical support to the executive of a corporation. Their duties include following dictated instructions, taking minutes, transcribing documents, preparing confidential reports, writing letters and making travel arrangements. Hence, the Internet and its associated tools offer the secretaries the opportunity to increase efficiency and broaden the range of services they offer. Efficiency in this context is measured in terms of time, convenience, quality of output as well as reasonable cost spent in achieving desired result.

Increasing efficiency by secretaries demonstrates their competence in the use of Internet tools in the organization. Competence involves the incorporation of both theoretical and practical experience that makes an individual able and willing to take the right decision in daily working environment. Wojtezak (2000) added that competence is the possession of satisfactory level of relevant knowledge and acquisition of a range of skills that include interpersonal and technical components at a certain point in the educational process. Suffice it to state that the acquisition of knowledge, skills and abilities at a level of expertise sufficient to be able to perform appropriately a given task in a workplace is regarded as competence. Skill is described by Nkokelonye (2008) as the ability to put into use acquired competencies, attitudes, and behavior after an exposure to theories and practices fundamental in a field of study.

Consequently, internet tools application competencies of secretaries could be seen as those relevant skills and knowledge acquired by secretaries to be able to effectively exploit in areas of search, retrieval and delivery using the various Internet tools. These competencies offer new roles and responsibilities to all the categories of secretaries. Akpomi and Ordu

(2009) added that such new roles mean that additional training, qualifications and skills are required from the secretaries. By acquiring these skills, a qualified secretary with wide knowledge of business insight, versatile knowledge in accounting, personnel, office practice, communication and knowledge of the operation of all departments within the organisation where he/she works is made. The wide knowledge by secretary implies that secretarial function is central in every formal organization. This is because, it provides information and communication support services on matters of routine and administrative issues.

To effectively perform the routine and administrative roles, there is need for acquisition of new skills by the secretaries especially with the emergence of information technology. Ajike (2015) observed that many office functions and secretarial duties which were previously done manually are now being done virtually through the aid of the Internet application. These functions which include letter preparation, storage and retrieval, sharing, sending and receiving mails have now been modified by the Internet and its associated applications while others are completely replaced. Hence, the diversity of services and opportunities offered by the Internet require the secretary to possess new skills and sub-skills to enable him/her to be relevant in management of information in the modern office. This statement further corroborates with the opinion of Atakpa (2010) that secretarial functions everywhere in the world have undergone a lot of technical changes. With various services available in the Internet, Bankole and Babalola (2012) identified the following applications as most important to a qualified secretary. These applications such as e-mail, World Wide Web (www), whatsapp, skype, facebook, file transfer protocol and twitter services etc form the basis of this study following the enormous roles internet tools play in information exchange in an organizations.

Skype is another Internet application tool required by the secretaries for information exchange in universities. Skype is a software that enables world's conversations. It is an Internet telephony protocol used to move encrypted voice over Internet Protocol (IP), voice over internet protocol (VOIP) traffic with skype members' computers. This tool among other things allows free video and voice one-to-one and group calls to millions of individuals for different purposes. Instant messages are sent with the aid of skype, while files could also be shared over the Internet. The application of skype to businesses makes virtual meetings possible for people in different locations. Thus, secretaries' competence in the use of skype will facilitate spread of information across the organisation and beyond. This will further enhance achievement of organisational goals (Monereo and Schrum, 2013).

Beyond the use of Skype is WhatsApp application, which is a smart phone application that enables people to share information directly via their phones. Since its introduction in 2009, the growth of WhatsApp has steadily increased, and as of April 2016, it numbers over a billion monthly active users While many alternatives to WhatsApp are currently available in different online application stores (for example Kik, Telegram, Line Messenger, BBM, WeChat) (Shlomo, Moshe, James and Schler, 2009). WhatsApp is currently the most popular messaging application with the largest name recognition, by far the largest user base, and the strongest corporate backing since its acquisition by Facebook in 2014, an internet tool required by the secretary to facilitate information exchange in universities. Besides, the WhatsApp application, facebook is another internet tool application required by the secretary for information exchange.

Facebook is a social networking website where users can post comments, share photo, graphs and post links to news or other interesting content on the web, chat live and watch short form videos. Facebook is not a static social network, it consistently changes and evolves in order to adapt to its users' needs and global technological developments. Facebook with its unique features, it has become a viable platform that the secretary should utilize in the

exchange of information in the universities, a dependable platform which individuals, government, corporate bodies and organisations including universities utilize for information dissemination. At present, individuals, organisations utilize this medium to advertise, recruit staff and promote their businesses. In this regard it has become imperative for secretaries in the universities to acquire the required competencies for the application of this all important internet tool to enhance the exchange of information in the universities.

Statement of the Problem

In contemporary times, the Internet is generally acknowledged by scholars as an indispensable tool for information exchange in organisations due to its speed, accuracy, reliability and high precision. Thus, with the help of Internet, information is generated by secretaries with fewer mistakes and promptly delivered to designated departments. Although, the internet tools such as e-mail, world-wide web, twitter and facebook, among others, are aimed at facilitating information exchange. It is observed that they are not effectively utilised by most secretaries in universities due to poor perception of the tools. One therefore wonders whether they actually possess the required competence in the use of the Internet tools for information exchange in universities. It also goes to show that where the competencies are lacking, the overall objectives of the universities which are teaching, learning and research could be crippled. Thus, needs occur where investigation of the required competencies of secretaries in the application of internet variables for information exchange in Federal Universities in South-South Nigeria is required.

Purpose of the Study

The main purpose of this study was to determine internet tools application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria. Specifically, the study sought to determine:

1. skype application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria.
2. whatsapp application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria.
3. facebook application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria.

Research Questions

The following questions were raised to guide the study;

1. What are the skype application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria?
2. What are the whatsapp application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria?
3. What are facebook application competencies required by secretaries for information exchange in Federal Universities in South-South, Nigeria?

Research Hypotheses

The following null hypotheses were formulated and tested at .05 level of significance:

- H₀₁ There is no significant difference in the Mean ratings of administrative secretaries' personal secretaries and confidential secretaries on their skype application competencies required for information exchange in Federal Universities in South-South, Nigeria.

- Ho₂ There is no significant difference in the Mean ratings of administrative secretaries' personal secretaries and confidential secretaries on their WhatsApp application competencies required for information exchange in Federal Universities in South-South, Nigeria.
- Ho₃ There is no significant difference in the Mean ratings of administrative secretaries' personal secretaries and confidential secretaries on their facebook application competencies required for information exchange in Federal Universities in South-South, Nigeria.

Design of the Study

The research design that was adopted for this study was the descriptive survey research design. According to Ali (2006), this design attempts to use the data obtained from a sample in an investigation to document, describe and explain what is in existence or non-existence, or the present state of a phenomenon being investigated. This design therefore is considered most appropriate for the study since the researcher will exploit the information that will be obtained from the respondents in drawing inference of the current state of what is being studied.

Population of the Study

The population for the study comprised 1,026 secretaries in six federal universities in South-South, Nigeria. The Universities include, University of Uyo, University of Calabar, University of Benin, University of Port Harcourt, Federal University, Otuoke and Federal University of Petroleum Technology, Effurum, Delta.

3.4 Sample and Sampling Technique

The sample size for the study consisted of 287 respondents made up of 110 administrative secretaries, 90 personal secretaries and 87 confidential secretaries. The sample size was statistically determined using Taro Yamane formula. The sample was selected using a combination of cluster and stratified sampling techniques. The population was first clustered into six federal universities. The population was then stratified into three categories as administrative secretaries, personal secretaries and confidential secretaries. Finally, based on the population of administrative secretaries, personal secretaries and confidential secretaries available in each of the six federal universities, a proportionate sample was calculated for each strata for each university. Thereafter, balloting was used to select the required sample from each strata in each of the federal universities. The population and sample distribution for each strata in each of the federal universities in South-South Nigeria.

Instrumentation

Instrument for data collection for the study was the researcher-made structured questionnaire titled, 'Questionnaire on Internet Tools Application Competencies for Information Exchange' (QITACIE). The questionnaire comprised of two sections. Section A contained the demographic characteristics of the respondents. This section contained the categories of secretaries. Section B consists of 61 items that sought to provide information on the various internet tools application competencies required by secretaries for information exchange in Federal Universities in South- South Nigeria. These internet tools competencies were on facebook, skype and whatsapp, file transfer protocol and twitter application competencies. The items were designed on a- 5 point rating scale of very highly required (5), highly required (4), moderately required (3), lowly required (2), and very lowly required (1).

Validation of the Instrument

The questionnaire instrument was given to three education experts for face-validation. Two of the experts were from Department of Vocational Education, and one from Department of Curriculum Studies, all from the University of Uyo. These experts were requested to read the items of the instrument one after the other, make corrections, indicate the suitability of the items, language used and the arrangement of the items in logical and chronological sequence having attached the research questions, hypotheses and objectives of the study as guide. Their comments, suggestions, corrections and other inputs were integrated in the instrument and used for the final copy.

Reliability of the Instrument

The reliability coefficient of the instrument was determined using Cronbach Alpha technique. The instrument was tested on 30 secretaries from University of Port Harcourt, Rivers State who were not used in the main study. Cronbach Alpha technique according to Ojo (2001), is suitable for instrument reliability because it takes care of both variances and proportion of correct and incorrect responses in the items. The overall Cronbach's alpha for the instrument = 0.89

Method of Data Collection

The researcher with the aid of two research assistants who were briefed on the purpose of the study administered the 287 copies of the questionnaire to the secretaries at their various institutions. While the researcher covered University of Uyo, the research assistants covered the other five universities. The administration of the questionnaire lasted for three weeks and completed copies were retrieved on the spot or a call back basis depending on the convenience of the respondents. Out of 287 copies of instrument administered, only 277 were adequately collected, which represented 96.51 percent return rate. The copies not returned and those not completely filled were discarded through recycling.

Method of Data Analysis

The Mean statistics was used to answer the research questions, while the one way analysis of variance (ANOVA) statistics was used to test the null hypotheses at .05 level of significance.

Results

This section presents results of the findings based on research questions and hypotheses.

Research Question 1: What are Skype application competencies required by secretaries for information exchange in Federal Universities, South-South Nigeria?

The summary of data analysis related to Research Question 1 is presented in Table 4.5.

Table 1 Mean and Standard Deviation of Responses on the Skype Application Competencies Required by the Secretaries for Information Exchange. (n=277)

S/N	Items	\bar{X}	SD	Remark
1.	Ability to conduct video conferencing	2.70	0.63	MR
2.	Understanding the university conversation platform	2.88	0.64	MR
3.	Ability to connect to video conferencing	3.03	0.66	MR
4.	Knowledge to disseminate information through the university platform	3.00	0.72	MR
5.	Awareness of chart use.	2.84	0.71	MR
6.	Awareness of instant messaging.	2.67	0.69	MR
7.	Knowledge of grouping messages from different sources.	2.84	0.65	MR
Cluster Mean		2.85	0.32	MR

MR = Moderately Required

The data in Table 1 shows that the mean responses on all the seven items as well as the cluster mean fall into the category of 2.50 and 3.49. This implies that all the seven Skype application items are moderately required by secretaries for information exchange in Federal Universities in South-South Nigeria. The result indicates that the standard deviation ranged between 0.32 and 0.72 indicating that the respondents were not divergent in their responses.

Research Question 2: What are the Whatsapp Application Competencies Required by Secretaries for Information Exchange in Federal Universities in South-South Nigeria?

Data analysis related to Research Question 2 is summarized in Table 2.

Table 2 Mean and Standard Deviation of Responses on the Whatsapp Application Competencies Required by the Secretaries for Information Exchange. (n=277)

S/N	Items	\bar{X}	SD	Remark
1.	Ability to create whatsapp.	3.06	0.66	MR
2.	Knowledge of registration.	2.83	0.77	MR
3.	Knowledge of updating of membership.	2.68	0.79	MR
4.	Ability to manage size and length of text received	2.83	0.78	MR
5.	Ability to sent messages.	2.93	0.77	MR
6.	Ability to manage large conversation group.	3.11	0.73	MR
7.	Ability to operate the smartphone without difficulty.	2.97	0.77	MR
8.	Ability to store message.	2.91	0.79	MR
9.	Ability to analyse.	2.95	0.78	
Cluster Mean		2.92	0.45	MR

MR = Moderately Required

The data in Table 2 shows that the mean responses on all the nine items as well as the cluster mean fall into the category of 2.50 and 3.49. This implies that all the nine Whatsapp application items are moderately required by secretaries for information exchange in Federal Universities in South-South Nigeria. The result indicates that the standard deviation ranged between 0.45 and 0.79 indicating that the respondents were not divergent in their responses.

4.1.7 Research Question 3: What are the Facebook Application Competencies Required by Secretaries for Information Exchange in Federal Universities, South-South Nigeria?

Table 3 Mean and Standard Deviation of Responses on the Facebook Application Competencies Required by the Secretaries for Information Exchange. (n=277)

S/N	Items	\bar{X}	SD	Remark
1.	Ability to create a profile.	2.94	0.74	MR
2.	Ability to create an account on the facebook.	2.84	0.73	MR
3.	Ability to post things on their status.	2.63	0.71	MR
4.	Ability to update.	2.89	0.78	MR
5.	Ability to reply messages.	3.09	0.74	MR
6.	Ability to post pictures.	2.95	0.71	MR
7.	Ability to post texts.	2.91	0.72	MR
8.	Ability to comment.	2.99	0.72	MR
Cluster Mean		2.91	0.44	MR

MR = Moderately Required

The data in Table 3 show the mean responses on the Facebook application competencies required by secretaries for information exchange in Federal Universities in South-South Nigeria. As shown, the mean responses on all the eight items as well as the cluster mean fall into the category of 2.50 and 3.49. This implies that all the eight Facebook application items are moderately required by secretaries for information exchange in Federal Universities in South-South Nigeria. The result indicates that the standard deviation ranged between 0.44 and 0.78 indicating that the respondents were not divergent in their responses.

H₀₁: There is no significant difference in the rating of administrative, personal and confidential secretaries on Skype applications competencies for information exchange.

The summary of analysis of variance of the mean rating of administrative, personal and confidential secretaries on the Skype application competencies required for information exchange in Federal Universities in South-South Nigeria is presented in Table 4

Table 4 Analysis of Variance of the Mean Rating of Administrative, Personal and Confidential Secretaries on their Skype Application Competencies Required for Information Exchange.

Source of valiance	SS	Df	Ms	F	P	Decision
Between groups	0.05	2	0.03	0.27**	0.79	NS
Within groups	30.72	284	0.11			
Total	30.77	286				

**Not significant at $p \leq .05$

The result in Table 4 revealed that the value of F-cal is 0.27 with level of significance (p) being 0.79. Based on the fact that the obtained p-value of 0.79 is greater than the stipulated alpha level of 0.05, this implies that the calculated f-value is not significant at 0.05 level of significance. Therefore, the null hypothesis is retained signifying that there is no significant difference in the mean rating of administrative, personal and confidential secretaries on their Skype application competencies required for information exchange in Federal Universities in South-South Nigeria.

H₀₂: There is no significant difference in the rating of administrative, personal and confidential secretaries on their whatsapp application competencies required for information exchange.

The summary of analysis of variance of the mean rating of administrative, personal and confidential secretaries on the Whatsapp application competencies required for information exchange in Federal Universities in South-South Nigeria is shown in Table 4.14.

Table 5 Analysis of Variance of the Mean Rating of Administrative, Personal and Confidential Secretaries on their Whatsapp Application Competencies Required for Information Exchange.

Source of valiance	SS	Df	Ms	F	P	Decision
Between groups	0.25	2	0.13	0.61**	0.54	NS
Within groups	58.01	284	0.20			
Total	58.26	286				

**Not significant at $p \leq .05$

The result in Table 5 revealed that the value of F-cal is 0.61 with level of significance (p) being 0.54. Based on the fact that the obtained p-value of 0.54 is greater than the stipulated alpha level of 0.05, this implies that the calculated f-value is not significant at 0.05 level of significance. Therefore, the null hypothesis is retained signifying that there is no significant difference in the mean rating of administrative, personal and confidential secretaries on their Whatsapp application competencies required for information exchange in Federal Universities in South-South Nigeria.

H₀₃: There is no significant differences in the ratings of administrative, personal and confidential secretaries on their facebook application competencies required for information exchange.

The summary of analysis of variance of the mean rating of administrative, personal and confidential secretaries on the Facebook application competencies required for information exchange in Federal Universities in South-South Nigeria is presented in Table 6

Table 6 Analysis of Variance of the Mean Ratings of Administrative Personal and Confidential Secretaries in their Facebook Application Competencies Required for Information Exchange.

Source of variance	SS	df	Ms	F	P	Decision
Between groups	1.24	2	0.62	3.10*	0.05	S
Within groups	56.49	284	0.20			
Total	57.73	286				

*significant at $P \leq .05$

The data in Table 6 revealed that the value of F-cal is 3.10 with level of significance (p) being 0.05. Based on the fact that the obtained p-value of 0.05 is equal to the stipulated alpha level of 0.05, this implies that the calculated f-value is significant at 0.05 level of significance. Therefore, the null hypothesis is rejected signifying that there is significant difference in the mean rating of administrative, personal and confidential secretaries on their Facebook application competencies required for information exchange in Federal Universities in South-South Nigeria. A post hoc test was conducted to determine the direction of the difference.

Table 7 Post-hoc Pairwise Comparison of the mean rating of administrative, personal and confidential secretaries on the Facebook application competencies required for information exchange

Dependent Variable: AV_Facebook

Groups	Mean difference	Standard Error	Sig
1 Vs 2	-0.04	0.06	0.75
1 Vs 3	-0.16	0.06	0.04*
2 Vs 3	-0.11	0.07	0.26

* The mean difference is significant at the .05 level.

Table 7 provided a summary of the post hoc pairwise comparison of the mean rating of administrative, personal and confidential secretaries on their facebook application competencies required for information exchange. Table 4.16 shows that the mean difference between group 1 (administrative secretaries) and group 2 (personal secretaries) is -0.04 and it is not significant at 0.05 level of significance ($p = 0.75$). The mean difference between group 1 (administrative secretaries) and group 3 (confidential secretaries) is -0.16 and it is significant at 0.05 level of significance ($p = 0.04$). The mean difference between group 2 (personal secretaries) and group 3 (confidential secretaries) is -0.11 which is not significant at 0.05 level of significance ($p = 0.26$). This result implies that the mean rating of group 3 (confidential secretaries) is significantly higher than the other two groups. This is evident in the mean rating of the three groups (administrative, personal and confidential secretaries) on their facebook application competencies which are 2.84, 2.89 and 3.00 respectively. This therefore implies that the significant difference is caused by group 3 (confidential secretaries) who have the highest mean rating on their facebook application competencies.

Findings of the Study

Based on the result of data analysis related to the research questions and hypotheses, the study reveals that:

1. Seven Skype application competencies are moderately required by secretaries for information exchange in Federal Universities in South-South, Nigeria.
2. Nine Whatsapp application competencies are moderately required by secretaries for information exchange in Federal Universities in South-South, Nigeria.

3. Eight Facebook application competencies are moderately required by secretaries for information exchange in Federal Universities in South-South Nigeria.
4. There is no significant difference in the mean rating of the secretaries on the Skype application competencies required by them for information exchange.
5. There is no significant difference in the mean rating of the secretaries on the Whatsapp application competencies required by them for information exchange.
6. There is significant difference in the mean rating of the secretaries on the Facebook application competencies required by them for information exchange.

Discussion of Findings

The findings of the study are arranged and discussed according to the research questions and the null hypotheses formulated for the study.

Skype Application Competencies Required by Secretaries for Information Exchange

Seven skype application competencies is revealed by the study to be moderately required by secretaries for information exchange in Federal universities in South-South Nigeria. These competencies include ability to conduct a video conferencing, knowledge to disseminate information through the university's platform and understanding the university conversation platform, among others. The hypothesis tested indicates that there is no significant difference in the mean rating of the secretaries on the Skype application competencies required by them for information exchange. This result is supported by the study of Paul (2017), which discovered that skype application make virtual meetings possible for people in different locations. Thus, secretaries competence in the use of Skype will facilitate easy spread of information across the organization and beyond.

The finding supports the assertion by Olayanju and Asogwa (2015) who pointed out that the skills demanded of secretaries in today's higher institutions, as the significant stakeholders in information processing and monitoring areas, require emphasis on skills and knowledge on the use of modern information processing facilities (ICT).

Whatsapp Application Competencies Required by Secretaries for Information Exchange

The study found that nine whatsapp application competencies are moderately required by secretaries for information exchange. The competencies required include the ability to manage large universities group, ability to create whatsapp and ability to operate smart phone without difficulty among others. Testing of the hypothesis reveals that there was no significant difference in the mean rating of the secretaries on the Whatsapp application competencies required by them for information exchange.

This result is supported by the finding of Nwaokwa and Okoli (2012) that the knowledge and skills of applying ICT facilities influence the performance of secretaries positively. The ICT facilities include internet applications vis a vis whatsapp and the secretaries performance include information exchange which can be done through whatsapp application. The finding also supports that of Okolocha and Olannye (2015) who, in a study on Supervisors' Assessment of Computer-Based Competencies Possessed by Secretaries in Government Ministries in Delta State of Nigeria found that whatsapp application competencies are very imperative for secretaries.

Facebook Application Competencies Required by Secretaries for Information Exchange

The study reveals that eight facebook application competencies are moderately required by secretaries for information exchange. The competencies include ability to create an account on the facebook, ability to create profile, ability to post things on their status, ability to update and ability to reply messages, among others. Testing of the corresponding hypothesis revealed that there was significant difference in the mean rating of the secretaries on the Facebook application competencies required by them for information exchange. The significant difference observed in the mean rating of the three groups of secretaries could be due to the fact that some of the respondents perceive the facebook as not very good for information exchange in universities, especially those information that require confidentiality. Hence, they differ in their opinions on the Facebook application competencies required by them for information exchange. Since they perceive that not all information should be posted on the facebook social media network.

This finding that all the listed competencies are moderately required by secretaries for information exchange in Federal universities in South-south, Nigeria is supported by the finding of Boseni (2013) who reported that the usage of computer telecommunication and video techniques positively and significantly related to productivity of public sector secretaries in Bayelsa state.

Summary of Finding

1. Seven Skype application competencies are moderately required by secretaries for information exchange.
2. Nine Whatsapp application competencies are moderately required by secretaries for information exchange.
3. Eight Facebook application competencies are moderately required by secretaries for information exchange.
4. There was no significant difference in the opinions of the three groups of secretaries on their e-mail, world wide web, file transfer protocol, skype and whatsapp application competencies required for information exchange.
5. There was significant difference in the opinions of the three groups of secretaries on their twitter and facebook application competencies required by them for information exchange,

Conclusion

On the basis of the finding of the study and discussion, it is concluded that, secretaries require internet tools application competencies for information exchange in any organization, particularly in Federal Universities in South-South Nigeria. Information exchange through internet tools are more effective and accurate than the manual method, hence secretaries should acquire these competencies to enable them become effective in their professional practice.

Recommendations

Based on the findings of the study, the following recommendations are made;

1. The management of Federal Universities in South-South Nigeria should endeavour to update their secretaries skills in internet tools application to enable them perform their functions effectively and efficiently in this era of emerging technologies.
2. All administrative, personal and confidential secretaries in Federal Universities in South-South Nigeria should be sponsored to attend seminars and conferences to

enable them update their skills in internet tools applications such as use of e-mail, world wide web, facebook, skype, and whatsapp for information administration.

3. Curriculum planners/developers should include the internet application competencies identified by this study in the curriculum of office management technology programmes in universities.
4. University authorities and management of other organizations should train their secretaries on internet tools applications for information exchange and other secretarial functions.
5. Universities and other organizations should make functional internet facilities available for their secretaries.

REFERENCES

- Ajike, V. O. (2015). *Information and communication technology (ICT)- based office skills required by secretaries for effective administration of local governments in Abia State*. M.Ed Dissertation. University of Nigeria, Nsukka.
- Akpomi, M.E. and Ordu, P. (2009). Modern office technology and secretary's productivity in private business organization. *African Journal of Business Management*,3(3): 333-339.
- Ali, A. (2006). *Conducting research in education and social science*. TIAN Ventures, Enugu.
- Atakpa, R.(2010). *Office practice and management: Practical approach*. Royal Pace Publications, Agbor.
- Buseni, J. (2013). Effects of information and communication technology on secretaries performance in contemporary organizations in Bayelsa State, Nigeria. *Information and Knowledge Management*,3(5): 87-93.
- Bankole, O. M. and Babalola, S. O. (2012). Internet use among undergraduate students of Olabisi Onabanjo University, Ago Iwoye, Nigeria. *Library Philosophy and Practice (e-journal)*. <http://digitalcommons.unl.edu/libphilprac/812> (Retrieved on 5th July 2018).
- Facebook (2012). Four degrees of separation. <http://arxiv.org/pd/1111.4570v3.pdf> (Retrieved on 6th April, 2012).
- Habib, S., Enite, A. U., and Aworo, P. (2015). Accessibility and utilization of internet service in Nigerian libraries: An empirical study. *International Journal of Academic Research and Reflection*, 3(5): 78 – 89.
- Monereo, C., Fuentes, M., and Sanchez, S. (2000). Internet search strategies used by experts and Beginners. *Interactive Educational Multimedia*, 1: 24 – 34.
- Mayer, R. N. (2013). A progressive approach to secretarial classification. *Personality Journal*, 11(3): 28-32.
- Nkokelonye, C. U. (2008). Skill and competencies needed by education history graduates for higher productivity. In: B. G. Nworgu (Ed).A Reform Agenda: Educational Reforms and the Attainment of the MDGs. *The Nigerian Experience*, 328-333.
- Okolocha, C. C. and Olannye, V. E. (2015). Supervisors' assessment of computer-based competencies possessed by secretaries in government ministries in Delta State of Nigeria. *International Journal of Management Sciences*, 5(6): 467-475.
- Olayanju, T. K. and Asogwa, A. N. (2010). Competency improvement needs of secretaries of higher institutions in ICT for effective office work performance. *Multidisciplinary Journal of Research Development*, 15(3): 1-9.
- Shlomo, A., Moshe, K., James, W. P., and Schler, J. (2009). Automatically profiling the author of an anonymous text. *Communications of the Association for Computing Machinery*, 52(2): 119-123.
- Wojtezak, A. (2000). Glossary of medical education terms.<http://www.ume.org/glosary.htm> (Retrieved on 20th March, 2018).