Current Awareness Service and Access to Agricultural Research Information in Nigeria

Solomon Uganneya (Ph.D)[1], Rebecca Ape[2] & Nancy Ugbagir[3]
ugenneyasolomon@yahoo.nz[1], mrs.aperebecca@yahoo.com[2], & nancyngunan@yahoo.com[3]

Abstract

Purpose *– Access to agricultural information has become increasingly important in the agricultural development efforts of Nigeria. Different tools are adopted in making agricultural information accessible including Current Awareness Services (CAS). The research upon which this paper was based was aimed at finding out the type of current awareness services used by agricultural libraries in Nigeria to inform users of existence of information resources/services.*

Design/methodology/approach *– Three Universities of agriculture from three agricultural zones in Nigeria were selected for the study. Three hundred researchers/lecturers participated. The study involved a survey method and questionnaire was used for data collection. Simple descriptive statistics were used to identify the type(s) of current awareness services mostly employed by the University of Agriculture Libraries.*

Findings *– Two key signals have been identified. First is that SDI, indexing and abstracting services and bulletin were mostly adopted by the libraries. Second is that lack of current Journal/periodicals, gap in indexing and abstracting services and non-functional internet services were major problems associated with current awareness services.*

Practical implication *– The findings have implications for repositioning the University of Agricultural libraries in Nigeria for a proactive current awareness service delivery and a thought – provoking research profile analysis of researchers.*

Originality/Value *– The paper identifies signal for inadequate current awareness service delivery and notes the implication this has in satisfying researcher's information needs.*

Keywords *– Current Awareness Services, Agricultural Information, Nigeria.*

Paper type *– Research Paper.*

Introduction

The slow growth in agricultural production has been a serious problem in sub-saharan African including Nigeria, challenging domestic and international policymakers. Evidence does exist that governments have spent large sums in agricultural development with little or no improvement in the sector (F.A.O. 1990). Development experts however maintained that to accelerate this growth would require a major contribution from research and development efforts, as well as those research and development information support systems (ISS) like the libraries and information centers (Vishva & Robert, 1997).

Research and Development (R & D) process is increasingly seen today through information creation, dissemination and utilization lens. Research and development knowledge is created via a process by which information and know-how are shared and combined through various exchanges. When independently developed thoughts and ideas are shared among research team members overtime, combine understanding and initiative insights are developed, which ultimately facilitates the creation of new knowledge or information (Nonaka, 1994).

A key tenet of this information-based viewpoint is that any organization that engages in R & D process needs to posses stored information in order to optimally assess externally developed information or to create new knowledge. Stored information is cumulative and is acquired through past research projects and social interaction, as well as through keeping abreast of general development in one's own field and in related fields. Persistent access to research project and information resources therefore appears to be essential to immediate and long-term success of any nation's agriculture as it directly impacts both the research and

development of the sector. According to Cohen and Levinthal (1990) persistent access to information resources contributes to any organization cumulative stored knowledge which ultimately enhances its overall absorptive capacity, which is the organizations capacity to absorb or exploit available information for the development of new products or knowledge.

In order to facilitate easy access to this cumulative knowledge and research projects so as to accelerate growth in agricultural development, agricultural libraries and information centres have developed services which if properly exploited by researchers will enhance their research and development activities. One of such services is current awareness.

Concept Definition:

Current awareness is a service designed to alert library and information service users of new information resources in their area of specialization and related fields. Jax and Houlson (1990) stressed that, the objective of current awareness service is to provide researchers and other library users access to comprehensive sources of current, relevant and specialized information, facilitate ways in which researchers and students save time, effort and fund in retrieving and obtaining publications in their fields and to provide on a regular basis information that is more current than that routinely found in the faculty. Rowley (1996) identified a number of formats in which current awareness service can be encountered. The two basic forms are: bulletin and selective dissemination of information (SDI). Bulletin is a printed list or set of list for consultation which is published and distributed to a number of users on a specific subject areas. Most of such bulletin list articles or abstracts together with citation of relevant new documents in a subject area. SDI is the service within an organization that concerns with channeling new items of information from whatever source, to those points in the organization where the possibility of usefulness in connection with current interest is high. Thus SDI brings forward on a regular basis new information item to researchers to enhance their research and development activities.

Agricultural research information included all published and unpublished information about agricultural productions and activities. Ruttan (1987) classed agricultural research information into pure and embodied information. Pure information includes all type of self-standing advice on practices in four main areas:

- Cultural and productive technologies, such as timing for planting and harvesting, use of inputs, animal husbandry and livestock health, crop production and protection, and farm-building design.
- Farm management, such as record-keeping, financial and operational management and legal issues;
- Marketing and processing information such as price, techniques, market options, storage procedures, packaging techniques, transport and international standard for quality and purity and
- Community development, such as the organization of farmers association.

Embodied agricultural information include those indirectly obtained, through technologies used in farm production, such as new agricultural equipment, chemicals, seeds, laboratory equipments, computers and software etc. Various combinations of these technologies have often been promoted as a package that includes credit and technical assistance.

Nonaka (1994) stated that in a research and development environment where the only certainty is uncertainty, the one source of sustainable competitive advantage is knowledge. Organizations who structure their research and development environment to maximize knowledge collection, storage and dissemination are more likely than their less informed colleagues to create a work environment that thrives on continuous innovation and that regularly delivers products with the potential for sustained competitive advantage. Thus keeping researchers abreast of new development in their fields have become increasingly important in view of the rapid changes taking place in the society as well as the ever-growing body of literature that must be reviewed (Bulter 1993). Therefore it is safe to say that providing current awareness service is of particular importance in the agricultural research libraries which have always been expected to offer the most current information resources to their users.

The Purpose of the Study

The purpose of this study is:

1. To identify the type of current awareness services used by the agricultural libraries to inform users of existence of information services.
2. To identify the degrees of accessibility to current information on agriculture development by users in Nigeria.
3. To identify the types of agriculture project completed five years ago and accessed by users.
4. To identify problems militating against current awareness service in agriculture research libraries in Nigeria.

Methodology

The study was conducted in Nigeria. Three agricultural university libraries located in three states were selected for the study: University of Agriculture Makurdi (UAM) Library is located in Benue State, University of Agriculture Umudike (UAU) Library is located in Abia State, and University of Agriculture, Abeokuta (UAA) library is located in Ogun State. The study population is made up of 400 registered lectures/researchers users in 2008 in the three institutions. A random sample of 100 researchers from each library was used and the method of proportional allocation to sample was adopted to obtain the sample size. Questionnaire was used as instrument for data collection and simple descriptive statistical tool such as frequencies percentages were used for data analysis.

Results and Discussion

Table 1:Current Awareness Services in use by the library

UAM Library	UAU Library	UAA Library
Selective Dissemination of Information (SDI)	Display and Exhibition	SDI
Content page services	Bulletin	Indexing & Abstracting
Indexing & Abstracting	Indexing & Abstracting	Bulletin
Bulletin	SDI	-

Table one shows the nature of current awareness services in use by the institution library to get users informed about the available of current information, sources in their respective areas of specialization and related fields.

Table 2: Accessibility of Agricultural Information Resources on Recent Developments within state of location.

Category Labeled	UAM	UAU	UAA
Easily Accessible	-	17 (16.7)	28 (28.3)
Difficult/Time consuming, but can be done	94 (93.8)	71 (71.4)	72 (71.7)
It is not realistic	6 (6.2)	12 (1.9)	-

Table 2: shows the degree of accessibility to agricultural research projects on recent development within the states. 93.8% respondents in UAM, indicated that it is difficult/time consuming, but can be done, while 6.2% stated, that it is not realistic, 71.4% respondents in UAU, indicated difficult/time consuming, but can be done while 71.7% in UAA, said the same. However, 28.3% in UAA indicated easily accessible, while 16.7% in UAM said the same.

Table 3: Accessibility of Agricultural Information Resources on Recent Developments in Nigeria %.

Category Labeled	UAM	UAU	UAA
Easily Accessible	-	-	16 (16.3)
Difficult/Time Consuming but can be done	90 (89.6)	86 (85.7)	78 (78.3)
It is not realistic	10 (10.4)	14 (14.3)	5 (5.4)

Table 3 shows that researchers expressed different view point on how easy it is to access research projects on agricultural development within Nigeria. 16.3% respondents in UAA believed that agricultural project on recent development in Nigeria is easily accessible; 78.3% in the same institution reported that it is difficult/time consuming, but can be done, while 5.4% believed it is not realistic. For those respondents in UAM and UAU, 89.6% and

85.7% of respondents said that access is difficult and time consuming but still believed it can be done. However, 12.3% in UAU and 10.4% in UAM are of the view that access is not realistic.

Table 4: Accessibility of Agricultural Research Projects on Recent Developments outside Nigeria%.

Category Labeled	UAM	UAU	UAA
Easily Accessible	57 (57.3)	51 (51.7)	52 (51.7)
Difficult/Time consuming, but can be done	32 (32.3)	37 (36.9)	48 (48.3)
It is not realistic	11 (10.4)	72 (11.9)	- -

Table 4 presents the degree of accessibility to agricultural projects on recent developments outside Nigeria. The result shows that more than half of the respondents in the three institutions studied indicated that access is easy. For instance, 57.3%, 51.2% and 51.7% in UAM, UAU and UAA reported easily accessible. However, a significant number of the respondent indicated accessibility to agricultural project on recent developments outside Nigeria as difficult, time consuming, but can be done as follows: 32.2% in UAN, 36.9% in UAU and 48.3% in UAA.

Table 5: Types of Agricultural Projects completed five (5) years ago and Accessed to by the Respondents.

Category Labeled	UAM		UAU		UAA	
	F	%	F	%	F	%
Post harvest loses in fruit technology	26	26	X	X	X	X
Development of soil series fertilizer packages	11	11	15	15	X	X
Sand dumes stabilization technology	X	X	30	30	X	X
Biodiversity measurement of forestry	15	15	X	X	40	40
Wind erosion control	X	X	X	X	30	30
Soil erosion control	14	14	13	13	10	10
Genetic analysis in animal production	14	14	10	10	X	X
Genetic manipulation in egg production	20	20	12	12	20	20
Irrigation management	X	X	5	5	X	X
Farm building design	X	X	15	15	X	X

Respondents were asked to indicate from the list of projects completed 5 years ago by the National Agricultural Research Development (NARD) (2005) and accessed to by them. Table 5 presents the result. The result of the analysis revealed that 26% in UAM indicated post harvest losses in fruit technology. 30% indicated sand drums stabilization technology in UAU, while 30% in UAA indicated wind erosion. Further analysis revealed that 20% indicated genetic manipulation in egg production in UAM and UAA respectively, and 40% indicated biodiversity measurement of forestry in UAA. While 15% in UAU said they have accessed farm building design, 14% in UAM indicated soil erosion control and genetic analysis in animal production respectively.

Table 6: Problems associated with accessing useful agricultural projects/information.

Category Labeled	UAM		UAU		UAA	
	F	%	F	%	F	%
Lack of current journal/periodical	36	36	40	40	20	20
Present of gap in indexing & abstracting services	16	16	20	20	X	X
Inadequate SDI Service	21	21	23	23	51	51
Inadequate facilities to access outside libraries	20	20	7	7	20	20
Unclear mandate	7	7	10	10	9	9

Table 6 presents the problems militating against accessing useful agricultural projects. The result shows that 36% respondents in UAM indicated lack of current journal/periodical, 40% and 20% also indicated same in UAU and UAA respectively. Further analysis shows that 21% respondents in UAM indicated inadequate SDI service as a problem while 23% and 51% in UAU and UAA reported the same. 20% reported inadequate facilities to access outside libraries in UAM and UAA respectively while insignificant number of the respondents, 7% in UAM, 10% in UAU and 9% in UAA indicated unclear mandate.

Discussion

The result of this study shows that a combination of one form of current awareness services or the other was used to create awareness on the availability of specific agricultural projects/information resources. In UAM library for instance, a combination of SDI, content page services indexing and abstracting and bulletin was used, while UAU library used display and exhibition, bulletin, indexing and abstracting and SDI. UAA adopted the use of SDI, indexing and abstracting and bulletin.

There was a strong indication from the study that the current awareness services, adopted by the three institutions surveyed was inadequate. For instance, more than 70% of the respondents in the three institutions reported that access to agricultural project on recent developments within the state of location and in Nigeria as a whole was difficult/time consuming. This would suggest a high level of dissatisfaction by the researchers.

The finding also shows that more than 50% of the respondents could access information on recent developments on agriculture outside Nigeria easily. This could also suggest the use of other source(s) besides the local libraries since it was observed in the study that one of the major problems militating against access to agriculture information was inadequate facilities to access outside libraries. This finding supports Vernon (1999) who revealed that 65% of the respondents found it difficult accessing information within their country in Africa. Surprisingly, a significant number of the respondents said they had accessed information on agricultural project completed five years ago. For instance 40% in UAA library, 30% in UAU library and 26% in UAM library had accessed such projects.

The respondents who has accessed information on agricultural projects completed five years ago were then asked to indicate the type of projects they had accessed. The result shows that biodiversity in forest, wind erosion control, sand dumes stabilization technology, post-harvest losses in fruit technology and genetic manipulation in egg production were the most significant projects accessed by the respondents. This question however received a high number of varied and a highly individualistic responses especially in UAM library, suggesting that it will be difficult for librarian to predict the nature of information approaches they would encounter, and implying that a wide range of user profile study would be necessary. However, resources in biodiversity measurement of forestry, soil erosion control, sand dumes stabilization technology and post-harvest losses in fruit technology are likely to remain a significant high proportion of approaches from this evidence.

Lack of current journal/periodical and inadequate SDI services are clearly the major problems associated with accessing useful agricultural information by the researchers. The data generated from this study supports this indication. For instance, lack of current journal/periodicals ranked top in UAU and UAM, while inadequate SDI ranked top in UAA. This result compared favourable with Abalaka (1991) who reported that 65% of the respondents had problem accessing useful information due to the datedness of library materials. He added that inadequate SDI and present of gap in indexing and abstracting journal also inhibited access to useful information.

Conclusion and Recommendation

The results obtained from this study demonstrated clearly that University of Agriculture Libraries in this study, are for the most part, uniform in their preference for certain current awareness services. SDI, indexing and abstracting and bulletin are the most adopted by the institutions. Besides, content page services was also preferred by the UAM library. It would appear then, that in terms of providing easy access to information on recent development on agriculture, the three libraries surveyed are poorly equipped in terms of current awareness services as majority of the respondents could not easily access information on recent development on agriculture within Nigeria as a whole. Some of the factors that contributed to this inadequacy included inadequate SDI, lack of current journal/periodicals, present of gap in indexing and abstracting services and inadequate facilities to access outside libraries.

In view of the above, it is recommended that to improve current awareness services considerably, an attempt to ascertain researchers information profile by the librarian in order to link them with appropriate sources within the three universities is necessary. The installation of functional internet services will enhance the accessibility of useful information to the researchers given the globally accessibility of

information through the internet. The establishment of viable library network among the three institutions and other related institutions in Nigeria will greatly improve the quality of current awareness services of these institutions and subsequently enhance the accessibility to recent developments in agriculture by the researchers.

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