

# Knowledge Management Adoption and the role of HRM: Evidence from The Gambia Public Organizations

Awa Sillah, and Wei-Wen Chang

**Abstract**---To date, knowledge Management (KM) adoption in public organizations and the role of Human Resource Management (HRM) have not been systematically investigated. Existing studies mostly derived their knowledge management from private organizations' perspectives. This reflects the slower pace of KM adoption in public enterprises than in private organizations especially in developing nations. Therefore, this paper is aimed to add to the much-needed knowledge and information about this field in The Gambia. The main paradigm of data inquiry for this study was qualitative research techniques. Besides, semi-structured interviews were administered in five major public organizations. Triangulation was used as the 15 participants were drawn from different work levels. Results showed that successful adoption of knowledge management; knowledge infrastructures consisting of technology, organization structures, and culture, cannot do it in isolation. Human resource management is essential for effective adoption of KM. This paper uncovers key aspects of these dimensions. The results provide a basis for understanding HRM role in adopting knowledge management in organization.

**Keywords**—Human Resource Management, Knowledge management, Public Organizations, The Gambia.

## I. INTRODUCTION

**K**NOWLEDGE is widely considered as a vital organization asset, and as a result its preservation has become one of the primary interests of organization in order to generate the best outcomes from the resources they have at their disposal [8], [23]. However, with the widespread recognition of knowledge management (KM), KM in Public organizations and the role of HRM have not been systematically investigated. Existing studies mostly derived their knowledge management from private organizations' perspectives. Additionally, many studies (e.g. [19], [21]) narrowly focused on information technology (IT) and the key importance of HRM as potential levers of KM is neglected

Citing Soliman & Spooner [20] posited that, "many analysts believe information technology is the key driver for KM, others disagree with this view and believe that KM is about people not technology, and to start from a "computer"

Awa Sillah, Graduate Student, Graduate Institute of International Human Resource Development, National Taiwan Normal University, Taipei (Tel. +886 0931 032 546 email; awasillah@gmail.com )

Wei Wen Chang , Professor, Graduate Institute of International Human Resource Development , National Taiwan Normal University, Taipei (email changw@ntnu.edu.tw)

perspective would ensure the failure of knowledge management"(p.337). Therefore, HRM roles need to be systematically investigated as they are critical to KM adoption.

Empirical and anecdotal evidences have shown that both Human Resource and knowledge, are an inimitable resource, unique, and are considered as the most strategically important asset which organizations possess. If properly managed, allows organizations to increase customer service, foster innovation, and reduce risk and cost [8]. Thus, KM adoption refers to the implementation of knowledge management systems, production, reproduction, distribution and application of knowledge in organizations.

Additionally, knowledge has been recognized as a form of capital for organization and is one of the few recyclable assets that continuously lend itself to a new intellectual capital. It is no surprise therefore that knowledge is over turning the rules about strategy as economies have shifted from natural resources to intellectual assets [5]. Consequently, the awareness of the importance of knowledge as an exceptional resource has compelled many organizations to effectively manage and use knowledge throughout the organization. With this changes, challenging situation are posed for HRM, as the HR professionals needs to move beyond managing administrative work and focus on developing strategies for organization ([24], [3]). As the world shifts to an era of globalization, HR in both public and private organization should keep up with the trend by synchronizing new areas of expertise and ideas as proposed by Strategic HRM associations, as a way to cope with the fast changing organizational environment.

Today, public organizations have to play various roles and deal with multiple objectives couple with the expectation for more effective and efficient programs and services for multiple stakeholders. This includes; the public, government and other interest group. Thus, in many cases, there are knowledge management challenges when working with developing nation's public organizations [8] .Unless public organizations effectively manages knowledge to fulfill performance expectation their reason for existence might be threatened.

## II. PURPOSE OF THE STUDY

Although, KM has been widely discussed by many academics and practitioners, there is relatively little information on knowledge management as found in the

developing countries even less in public sector [22]. The purpose of this study therefore, stems from the role of HRM in KM adoption. The paper aimed at examining the significant of KM, critical success factors, challenges, and to discuss the manner in which HRM contribute to KM success in The Gambia public sector.

Taking into account the purpose of this paper, the following research questions are proposed;

- What is the significant of knowledge management adoption in public organizations in The Gambia?
- What are the roles of HRM in knowledge Management adoption?
- What are the challenges and opportunities of adopting knowledge management?
- What are the critical success factors of knowledge management adoption in The Gambia?
- How do HR practices affect the effectiveness of KM adoption?

### III. SIGNIFICANCE OF THE STUDY

This study will make important contribution to the literature of KM in public organizations and it will add much-needed knowledge and information about this field in The Gambia. Moreover, this study will not only be a first, but it will open doors for further research to be conducted about KM in the country. Additionally, ample research on KM has been conducted in private organizations around the world (e.g. see [19], [20]) governments and public organization [12], there is little information and research on KM in Africa and The Gambia is not an exception. This makes it prudent to conduct this study in order to bring KM into the Gambia's academic spot light.

Therefore, the findings of this study have the potential to assist public organizations HRM in unlocking economic value from the knowledge that resides in its people as it attempts to identify the contextual factors that support knowledge management adoption. In addition, the management of public organization in The Gambia may also find the results of this study of practical benefits as it intends to broaden the knowledge on the factors that increase employees' tendencies to engage in knowledge sharing behavior in order to successfully develop effective KM for greater and efficient service delivery in The Gambia

The paper begins with a presentation of KM, followed by a review of the notion of KM in Public Organizations, HRM and it roles in KM adoption as they appear in the KM literature. Then the methodology and the results of the interview are presented, as well as the relevant discussion and conclusion.

### IV. LITERATURE REVIEW

#### A. Knowledge Management

The disorder in current organizational environment has called for a responsive and innovative workforce. One of the important techniques to stay on top of the spate of changes is the creation of conditions for the rapid acquisition of knowledge and skills [4]. Although this may be achieved in an ad hoc fashion with people learning from each other or simply

through experience, a key factor is the quality of planned KM in the organization.

Recently, KM gain prominence among researchers and many attempts were made to come up with a workable definition that not only capture complexities but could be used for practical purpose. KM as suggested by Knapp (1998.P.18) is the art of transforming information and intellectual assets into enduring value for an organization's customers and it employees. Demarest [9] define KM as the practices and technologies which facilitate the creation and sharing of knowledge, while Choi [11] see KM as a management program that manages and diffuses a set of activities of knowledge- resources acquisition, creation, and sharing. There are several other definitions of KM, however, in all major definitions, two major characteristics stand out. Firstly, KM is process oriented and secondly, KM must be geared towards improving the output of the organization. Many researchers classify knowledge into different taxonomies as it guide theoretical development in the KM field [1]. In general the generalization arises from who are the carries of the knowledge, the ability to transmit, and the specific domains in which knowledge is use. Some of the common taxonomies are; a) scientific, industry specific, firms specific [14], b) Tacit, Explicit ([7], [17]), and c) Human, social, and structured knowledge [10]

Debowski [8] theorize three major advantages of KM adoption- collaboration, achieve results, and attain organizational goals. This has leads to a plethora of research on how knowledge is managed. However, there are a few unaddressed issues that arisen from the current body of literature on KM. The study of KM is fragmented both conceptually and across organization. In terms of concepts, many factors have been identified as essential to the management of knowledge. Some of this factors are KM strategies, [27] knowledge management enablers [5] and knowledge management architecture [1]

#### B. Overview of Knowledge Management in public organization

The Gambia is the smallest country on mainland Africa and like many least developing countries; public sector plays an important role in facilitating and providing resources necessary for economic growth. However, as organizations witnessing remarkable changes over time, many public organizations have come under pressure to become more proactive in maintaining high quality service to the public, and contribute immensely to national development. In this regards, public services institution are subjected to the introduction of programs including (knowledge management) to steer genuine development in their respective communities. Consequently, in the Gambia there is still need to improve KM operation as many of the public institutions are yet to adopt KM. However, Debowski [8] posited that;

..“There are many KM challenges when working with developing nations. First, national infrastructure is often erratic, unreliable and incomplete. Lack of reliable power, and financial issues are three of the problems which many be experienced. Even so there is increasing recognition of the need to share knowledge through both alliances and national

collaboration to increase economic and social wellbeing” (p.308).

Liebowitz and Chen [15], cited from Syed-Ikhsan and Rowland [22] also found that KM in government possess some unique challenges. They discovered that public organizations are typically hierarchical and bureaucratic organizations that make sharing of knowledge difficult. Leibowitz and Chen further argued that most people seem reluctant to share knowledge because they “keep knowledge close to their heart as they move through the ranks by the knowledge is power paradigm” (, p. 422). Similar situations can be found in the Gambia and that retard many public institutions to adopt KM.

Another study by Wiig [26] proposed that, it is important to have comprehensive KM within and in support of public administration. Having such an approach will allow “the society to prosper and increase its viability by making its people and institutions work smarter” (p. 238) to increase efficiency and quality of life.

Therefore, in order to take full advantages of these assets, public organizations must not only identify the factors that influence knowledge environment but also to implement strategies, policies and procedures to manage the processes involved in enabling the interaction between these factors

### C. Human Resource Management and Knowledge Management

According to Mintzberg [16] cited from Fawzy [20]

“The strategic data bank of the organisation is not in the memory of its computers but in the minds of its managers” (P.338).

Furthermore, a field study carried out by Victor, [25] strongly supports the widespread claim of human and cultural issues as the key basis for the success or failure of KM Adoption. Besides, “both people and knowledge are regarded as having special potential as scarce and idiosyncratic resources, consistent with the premises of the resource-based approach to strategic management”p.103 [11]. However, specific HR practices have been assumed to have a direct impact on KM adoption such as recruitment, selection, and management that provide guidance on required work activities, behaviour and values.

According to Debowski [8], HR supports both employees and employer from the time people start as employees to the time they cease employment:

HRM therefore, serves three main purposes; -“To staff the organization with people who have appropriate knowledge and expertise for the required roles

- To ensure the work undertaken contributes to achieving the organisation’s goals
- To develop systems and processes that encourage good practices”(p.111)

HRM provides a common framework for managing staff. Where possible, HRM reflects the strategic priorities of the organisation, directs attention towards there desired outcomes, and rewards their achievement.

Although specific HR practices have been assumed to have a direct impact on KM, the broader discussion about HRM role in KM is highly multifaceted. Accordingly Victor [27] study on KM concludes that “HRM has to be assessed on the basis of, on the one hand, the HR system internal and external consistency and, on the other hand, the existence of the set of critical KM characteristics regarded as a key requirement for KM adoption success” p.72. In other words, Victor’s research evidence strongly supports the conclusion that there is little to talk about the role of HR practices in KM, unless both HRM and KM have been taken seriously by management [27]

Citing from Debowski (2005), there are themes that either support or undermine a knowledge culture. The structural elements identified are; the type of organization and its structure play a significant part in determining how readily knowledge can transfer across groups or individuals. HRM systems and processes also either afford support or pose challenges to KM. Beyond the organizational structure, “there are four (4) major arrears of HRM that have a strong impact on KM namely:

1. Staffing
2. Performance
3. Learning and development
4. Evaluation and review of the human resource processes” (p.112) [8]

Illustration of HR support for KM depicts in Fig. 1.

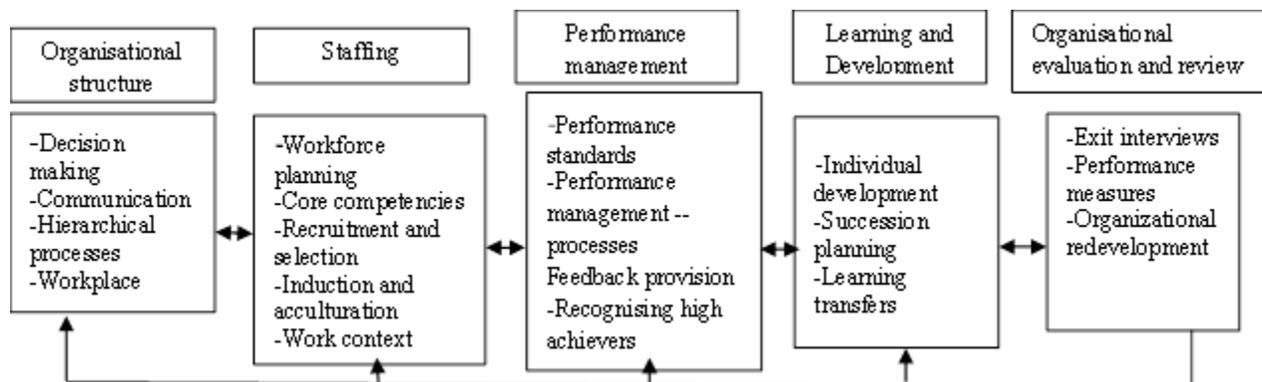


Fig 1 Structural HR support for knowledge management Adapted from “Knowledge management by Debowski” (2005, p. 112)

Clarke and Staunton [6] cited in Spooner, [20] research on KM and HR also provided a model of the knowledge management practice that could be useful for charting human resources knowledge. The model, shown in Fig. 2, provides a guide to four key concepts on how knowledge is mapped throughout the HRM function. The four concepts are: 1) construction, 2) embodiment, 3) dissemination and 4) use of knowledge. The figure illustrates the interaction between the human resources management function and each of the four knowledge concepts.

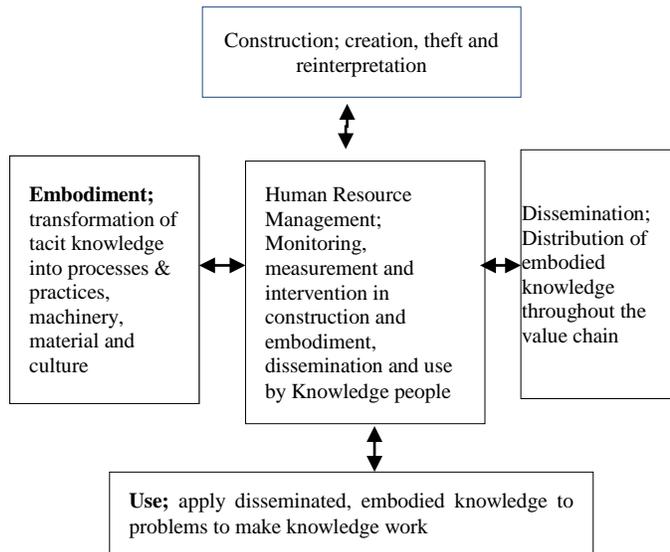


Fig.2 Adapted from Fawzy Soliman & Keri Spooner, (2000), "Strategies for implementing knowledge management: role of human resources management", Journal of Knowledge Management, Vol. 4 Iss 4 pp. 337 – 345

In addition, to manage knowledge successfully, one needs to understand the three relevant infrastructures within which the knowledge process takes place, a) the cultural infrastructure, b) the organization infrastructure and c) the technical infrastructure [9]. Thus, mapping knowledge need to focus on the fundamental needs of an organization [20]. Furthermore, because an organization's reality is dynamic, not static, the HRM role in KM adoption needs to be on-going for the results to have reasonable importance.

V. RESEARCH METHODOLOGY

A. Research Design

This study utilizes a qualitative paradigm as a method of data collection, to understand more about KM and the role of HRM in The Gambia. A qualitative approach is appropriate for this research, as it provide the opportunity to gain in-depth knowledge about the subject under discussion. The researcher approached expert in HR in continuous discussion for the sake of verifying validity and fulfilling the research purpose. Purposive sampling is adopted given the fact that the targeted participants for the study have important information which can answer the research questions.

B. Sample

This study included five major public organizations as sample. They belong to different public departments below:

1. Transportation.
2. Personnel Management Office (PMO)
3. Tax and Revenue
4. Telecommunications.
5. Education

Those public departments were chosen on the basis of the strongest representation of the public sector.

TABLE I  
PROFILES OF INTERVIEWEES

Interviewee	Gender	Institution	Qualification	Tenure
1	Male	A	MSC	6 years
2	Male	A	ACCA	2 years
3	Female	A	BSC	4years
4	Male	B	BSC	7years
5	Male	B	College	5years
6	Male	B	BCS	4years
7	Male	B	MSC	13years
8	Female	C	AAT	2years
9	Female	C	High School	1year
10	Male	C	Ph.D.	5years
11	Male	D	BSC	6years
12	Male	D	CAT	3years
13	Male	E	Diploma Management	2years
14	Female	E	BSC	N/A
15	Male	E	IT	8years

C. Data Collection

To gather the data for this study semi-structured interviews and brief questionnaire were administered. The questionnaire was designed for the interviewees to provide basic demographics. The semi-structured interview was conducted in order for the researcher to get in-depth information from the interviewee. Triangulation was used as the 15 participants were drawn from different work levels based on information reached. The appropriate person in charge of HRM issues was interviewed. Also, other people with managerial position were interviewed, along with junior employees. By taking people from different hierarchical levels and linked to a number of departments, a high accuracy and comprehensiveness of data was sought. Besides interview triangulation, further literature review helped to increase the validity and overall quality of the empirical materials.

Therefore, a guide that included questions related to both KM adoption and HRM impact on KM was developed by the research team. The interview was structured in 4 parts. In the first there were questions about the organization and its KM strategy, the second part KM and HR role were described, in the third part was on challenges of KM adoption, and the final part was the critical success factors of KM adoption. The questionnaire part covers the demographic information.

VI. FINDINGS AND DISCUSSIONS

After data collection, the data was analyzed by coding into different themes. Analysis revealed Significant, challenges, critical success factors and HRM role in KM adoption. All five case organisations none have a functional KM

department. However, KM practices are under the mandate of the various HR departments.

*A. Significant of Knowledge Management*

Concerning reasons and significant of KM adoption, three of the interviewees considered KM to be a fundamental source of change to the organizations as it helps mapped out the strategic direction of departments and other ministries, for instance Interviewee 4 stated:

*“Yes, the culture of sharing knowledge among colleagues is highly encouraged by the office. When an officer is not sure as to how to process a particular request or issue, the officer liaises with a colleague, who may have a better understanding of the issue at hand and that always help us to achieve our target goals” (AASK0401)*

Three other interviewees seconded, stating that their organizations currently had a data management systems and expressed that, the systems were designed to achieve employee satisfaction and productivity. In addition, it also improves both process efficiency and organizational outcomes. Interviewees 11 and 5 stated respectively;

*“The process saves time, improve service delivery, increase staff participation, and enhance communication” (CAR005)*

*“...our way of doing knowledge management, led to cost reduction of specific activities, increased employee participation and commitment, and ensures consistent with our policy implementations. In fact now public servants have a sense of belonging to the organisation” (CAR011)*

However, with the numerous opportunities and benefit of KM, some interviewees stated they are yet to realise its importance as Interviewee 15 stated;

*“The system in our organisation is not helpful at all. When employees need information, it takes so long to get response and sometimes the problems go unsolved. So I do not really see the need and benefit of such system...I think HR should really do something about it now or provide reliable IT system” (CAR015)*

It seems that KM significance is multifaceted, as is a common perception between the interviewees. This perception is confirmed by the fact that KM practices have beneficial impact for employees as well as on the strategic goals of the organization. However there are numerous challenges present.

*B. Challenges and Opportunities of Adopting Knowledge Management*

When asked about their key concerns about knowledge management, the interviewees expressed concern primarily over the funding, inadequate man power, poor infrastructure, power outage, managerial and informational issues. In terms of organizational culture, the interviewee were concerned over the implications for change, the ability to convince people to share their knowledge, and the ability to convince departments to share their knowledge with other departments. There was concern about determining who would be responsible for managing knowledge and above all bringing together the many players involved in developing KM, including technical staff, HR, record officers, departments’ staff, and the professionals with the knowledge.

Another eminent challenge express is frequent power outage, interviewee 7 stated:

*“We experience frequent blackout, and our HR systems or KM cannot be of its least or maximum utilization in the absence of regular power supply which the Gambia still struggle to curb” (CAR07)*

The interviewees were also aware of the importance of considering people, IT and culture issues in order to guarantee the success of the KM adoption. For instance Interviewee 13 stated:

*“...our organisations culture and IT systems help us in our KM adoption; however some employee’s don’t want to listen when we mention KM issues. They think we have so many other problems that these systems are not a priority” (AAK013)*

However, despite the technical soundness of the KM developments, the obstacles to effective knowledge transfer were overwhelmingly dominated by little communication, mutual trust, and high fear to share, which often impeded the transfer of individual knowledge into the data base systems. Nonetheless, despite the shortcomings, the effort invested in the KM adoption helped and it can be assessed as somehow progressing, since the initial goals of database system were implemented.

*C. Critical Success Factors of Knowledge Management Adoption*

In order to overcome the challenges of Knowledge management adoption, the interviewees identified many critical success factors that they considered could help KM effectiveness. The most important factors mentioned were present in Table 2.

TABLE II  
CRITICAL SUCCESS FACTORS OF KNOWLEDGE MANAGEMENT ADOPTION

Critical Success Factors	
Individual level (employees)	<ul style="list-style-type: none"> <li>• Employee involvement and commitment</li> <li>• Employee training.</li> <li>• Teamwork.</li> <li>• Trust , Mutual understanding</li> </ul>
Human Resource Management	<ul style="list-style-type: none"> <li>• Competent HR Unit</li> <li>• Knowledge creating and sharing culture</li> <li>• training and development of employees</li> <li>• Communication.</li> <li>• Sharing information</li> <li>• Recruiting and selecting of knowledgeable employees</li> <li>• Store experiences from experts</li> </ul>
Management support	<ul style="list-style-type: none"> <li>• Leadership,</li> <li>• Senior management support.</li> <li>• Top-management commitment</li> </ul>
Organization level	<ul style="list-style-type: none"> <li>• Organizational infrastructures</li> <li>• Knowledge community</li> </ul>
Information technology (IT)	<ul style="list-style-type: none"> <li>• IT infrastructure</li> <li>• Supporting infrastructure and Skills (proper technology).</li> <li>• Power Supply (Electricity)</li> <li>• Collaboration( HRM and IT</li> </ul>
Finance	<ul style="list-style-type: none"> <li>• Strong budget, Donors ,cost</li> </ul>

Therefore, organizations must take into account these factors in order to exploit, as much as possible, the KM advantage, as well as how people learn, how they implement what they learn, and how they share their knowledge. Undoubtedly, all of these factors are very important and

organizations must take account of all of these factors to exploit the competitive KM advantage as much as possible.

#### D. Roles of HRM in knowledge Management Adoption

Although specific HR practices have been assumed to have a direct impact on KM, the broader discussion about HRM role in KM is highly multifaceted. Some interviewees mentioned that HRM play a vital role in KM adoption, however, response differs. For instance Interviewee 5 stated:

*'...actually, our office functions are purely HR and we leverages KM practices too, through the practice of learning from colleagues, superiors, sharing as well as documenting information''(HR005)*

Other roles of HR are also mentioned as Interviewee 11 stated: *'The culture of sharing knowledge among colleagues has been introduced, and encouraged by the HR Unit. When an officer is not sure as to how to process a particular request or issue, the officer liaises with a colleague, who may have a better understanding of the issue at hand. We also liaise with our deputy permanent secretary (supervisor) for information and advice on more complicated issues as he is one of the most experienced officers'' (HR011)*

Apart from HR, information technology was mentioned as one of the drivers for KM adoption. Interviewees three (3) stated that;

*'...tools use by HR departments includes Z-drive, a big folder on the computer accessible to, by all the divisions, wherein all office correspondences are saved for processing of other similar issues and for reference purposes' (HRO51).*

Three other public organization set-up a division called the Human Resource Information System (HRIS). Copies of all correspondences are sent to them for recording in their database and documentation. HRIS serves to supply pieces of information to Management and other members of the office for decision-making.

The HR department, in charge of the KM initiative, assessed it as a moderate success with a high potential of improvement. However, the views from other parts of the organization were mixed, and in some cases contradicted the official position. In a way, the KM tool was, technically speaking, a success. Interviewees 9 stated

*'I don't even know that knowledge management exist, today is my first time hearing it from your interview. Our HR is not doing much with regard to that. I think is high time they start talking to people about it as Knowledge management sounds very interesting'' (HR009).*

A different story found was the assessment of the extent to which database helped to improve daily work. Certainly, many people were eager users of the data base, but too often the information introduced into the system were irrelevant data, rarely retrieved, let alone applied by the employees

Therefore, with Regards to KM, prior to anything else, emphasis must be put on the fact that the firm did not have any formal KM department, and while researching about KM in the units of analyses, the study revealed that "some public organization do not have KM" or "don't know about it. Still, since the evidence shows the existence of knowledge creation and transfer processes is facilitate by HR, it can be assumed that knowledge was managed, although not clearly recognized as KM. Some consciously rejected the need of KM

adoption, so often KM was adopted without a deep reflection about the current organizational situation and real needs.

## VII. CONCLUSION

The study found that knowledge management practices in The Gambia still a work-in-progress with most of the organization are yet to adopt knowledge management. The benefits of KM is not fully realized yet as there are numerous challenges present and sometimes HR fail in identifying knowledge gap and thus assisting in filling the strategic gaps of the organization.

Additionally, knowledge management adoptions are multi-faceted. That is, effective knowledge management adoption systems involve far more than just technology; human resource plays a significant role in all organizations interviews. In fact, effective human and organizational issues were identified as a major contributor. This result is consistent with the knowledge management literature, which advocates for human resource management as critical success factors in the implementation and adoption of KM [1], [18]

Although the HRM has played a vital role in the structure of organizations in recent years, there are still areas where it can progress even further to improve knowledge management in the organization. The HRM can use KM to reflect the true values or culture of the organization to the employees. This will potentially enhance knowledge sharing behaviour, mutual trust and cohesiveness among the various department and the employees.

## VIII. LIMITATION AND RECOMMENDATION

This research has a number of limitations. The first limitation is that the study was limited to The Gambia public organizations and therefore, the results cannot be generalized to other organizations. In addition, the research participants consisted only of employees working full time. Since people have different perceptions of the organizations they belong to and respond differently to their organization's environment. The findings of this study is context specific and may not be applicable to private and non-government organization in The Gambia

In regards to the recommendations, since this study is the first, future studies may also investigate KM in private organization in The Gambia and compare findings with other developing countries. Researchers can also examine which KM strategy is most important for KM enablers. Thus, future research on which organization skills play the greatest role in KM development will also be an important study.

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