

# Knowledge management in the audit office of Brazil: the perception of external control auditors

A gestão do conhecimento nos tribunais de contas do Brasil: a percepção dos auditores de controle externo

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## ABSTRACT

The Knowledge Management (KM) enables the harmonization of corporate strategy and organizational structure efficiency, positively impacting on competitiveness and organizational performance. The objective of this paper is to understand the perception of external control auditors about the KM processes and cultural orientation in the Audit Office of Brazil (AO). The nature of the study required the use of the quantitative investigation method by exploratory factor analysis. The results demonstrate the organizational culture of AOs in Brazil and, specifically, the cultural orientation to knowledge, where it was verified that it is perceived by external control auditors, which reveals that the Courts of Accounts are giving attention to the processes of knowledge acquisition, its retention, preservation and internal memory, with the aim of improving the quality of public service inspections.

**Keywords:** Strategy Management. Human Resource Management. Knowledge Management. Audit Office of Brazil.

## RESUMO

A gestão do conhecimento (GC) possibilita a harmonização da estratégia corpora-

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tiva e a eficiência da estrutura organizacional, impactando positivamente a competitividade e a performance organizacional. O objetivo deste artigo é compreender a percepção dos auditores de controle externo sobre os processos de GC e a orientação cultural nos tribunais de contas (TC) do Brasil. O estudo utilizou o método de investigação quantitativa por meio de análise fatorial exploratória. Os resultados demonstram a cultura organizacional dos TCs do Brasil e, especificamente, a orientação cultural ao conhecimento, verificando-se que esta é percebida pelos auditores de controle externo, o que revela que as cortes de contas estão dando atenção aos processos de aquisição de conhecimento, sua retenção, preservação e memória interna, com o intuito de melhorar a qualidade das fiscalizações dos serviços públicos.

**Palavras-Chave:** Gestão Estratégia. Administração de Recursos Humanos. Gestão do Conhecimento. Tribunais de Contas do Brasil.

Received: 12-11-2019

Approved: 06-02-2020

## 1 INTRODUCTION

The market changes are driven by globalization, technological advancement and information and international economic competition based on knowledge, restructured and modified organizational relationships (GOODMAN; CHINOWSKY, 1997; LAUER; TANNIRU, 2001; WIIG, 2002).

The Knowledge Management (KM) is defined as the set of administrative procedures on the establishment and development of organizational categories, which catalyze all the actions related to knowledge, in order to achieve organizational goals and objectives (PAIS, 2016; RIGIE, LINDSAY, 2006).

According to Wiig (2002), there are four Knowledge management actions that can be applied in Public Administration: a) improvement of decision-making in the context of public services; b) promotion of effective participation of citizens in public decisions; c) built of capacity and skills for the competitive intellectual capital; d) development of a workforce based on competitive knowledge.

The KM enables the necessary conditions for knowledge innovation, through creation, sharing, searching and processing, and should be measured by

the intellectual capital stored as an organizational memory, caused by the management through a management model, captured and analyzed as a tool of competitive intelligence, and as a transforming agent of employee knowledge as well as a crucial tool to support decision making (ACCORSI, 2008).

The objectives of knowledge management as Wiig (2002) applied to public management can be to promote: a) the implementation of the public agenda through effective management functions; b) the inclusion of preparation of external stakeholders to be political partners (with the following activities: the creation of public opinion, participation of decisions of public policy, the idealization and the formation of public policies and administrative, budgetary and financial processes, follow-up and monitoring the implementation of public services, the observation of the company's policies, and in providing support and administration); c) the construction, maintenance and leverage of the intellectual capital of public organizations and the public; d) the development of its citizens,

It is in this environment that the public sector has been faced with the need to develop an organizational culture based on knowledge of its employees focused on better service and more efficiency (PAIS, 2016). Cardoso (2007b) stated that the vision of KM is "people-oriented", advocating that knowledge is closely associated with human resources.

Thus, it is appropriate to understand the perception of external control auditors in the audit offices of the KM of their court, as these are employees who develop, hold the share and exercise effectively knowledge in the primary activities of that institution, contributing greatly to its performance.

Another aspect is that the Audit Office have the constitutional authority to exercise external control of public administration in assistance to the legislative branch activities, acting in the supervision and monitoring of public policies. These public organizations have invested in knowledge management practices that contribute to identify, create, store, share and apply the necessary knowledge for the performance of the external control, and the optimization of its resources.

On the arguments above, following the study of the problem, how do the external control auditors perceive the knowledge management processes and cultural orientation developed by the Audit Office?

The objective of this paper is to understand the perception of external control auditors about the KM processes and cultural orientation in the Audit Office of Brazil (AOs).

In this learning environment, the specific objectives for this article are: a) characterize the KM processes in operative AOs, evaluating the perception of external control auditors linked to the aforementioned courts; b) analyze the role of cultural orientation knowledge in the KM processes performed by the AOs.

In Section 1, the introduction of the article is shown. In section 2, it will be shown the theoretical framework of Knowledge Management, exploring its scope of study in public administration, its strategic approach and how the KM of the Office is in Brazil. After the theoretical framework, in section 3, it will be explained the methodology of the work, with the identification of the methods of descriptive research, highlighting the study sample, the description of the process of collection and analysis of data results. To finish, in section 4, there's a, with the final consideration of the proposed research.

## **2 THEORETICAL FRAMEWORK**

### **2.1 Knowledge management as a strategic factor in organizations**

The main asset of an organization seeking a competitive advantage has to be knowledge of the employees (WIIG, 2000, 2002). The KM is an instrument capable of producing results, using existing knowledge and intellectual capital of its employees and is based on an integrated set of actions to shape the culture of the organization, in order to get results in the long term (FERREIRA; PILATTI, 2013).

The Human Resource Management (HRM) has a crucial role in the development of bonds between the employees and their organizations, personal commitment and impacts positively on the KM processes and the harmonization of corporate strategy and organizational structure efficiency (ROCHA *et al.*, 2012).

For the KM to be efficient and effective, some principles should be considered according to Ferreira and Pilatti (2013): a) the knowledge originates and resides in people's heads; b) knowledge sharing requires trust; c) technology allows new behaviors related to knowledge; d) knowledge sharing should be encouraged and rewarded; e) the support of leadership and resources is an essential factor; f) initiatives related to knowledge must begin with a program; g) quantitative and qualitative measurements are needed to evaluate the initiative; h) knowledge is

creative and should be encouraged to develop in unexpected ways.

Ferreira and Pilatti (2013) say that organizational activities should be coordinated at operational, tactical and strategic formal and informal rules, which should be aligned with the innovation actions, requiring the combination of different attitudes and skills, information technology and knowledge in various sectors. Thus, the authors identified seven dimensions that guide administrative practices and knowledge activities:

- Strategic factors and the role of top management, which is to define areas of knowledge to be exploited by the company and establish visions to boost innovative projects;
- Organizational culture, which can be understood as the norms and values that help interpret events and evaluate what is appropriate and inappropriate in organizations.
- Organizational structure focused on people, which stems from the authority by experience or relationships, focused on creativity, innovation and efficiency, with remuneration based on the contribution or value added by the developer or the team, regardless of formal position.
- Human Resource Management (HRM), which relates to the acquisition, generation, dissemination and storage of external and internal information.
- Information technology systems, which directly impacts the generation, storage and dissemination of knowledge.
- Performance measurement and results, which should be measured to obtain the level of contribution of tangible and intangible assets in the performance of its employees, management and organization.
- Organizational learning, which is based on the external and internal environments, such as learning how to foster employees to drive the management of results.

Nonaka and Takeuchi (1997) point out the conditions for the creation of knowledge: a) creative environment forces solving the problems in times of crisis; b) redundancy: juxtaposition of information and responsibilities, enables communication and cooperation by creating a common knowledge base; c) diversity: the amount of accumulated information, coupled with the availability of access to information.

On the other hand, Cardoso (2007b) based his typology considering six KM processes: i) creation and acquisition; ii) attributing meaning / interpretation; iii) sharing and dissemination; iv) organization memory; v) measurement; and vi) recovery.

The process of creating and acquiring knowledge assumes an internal (internal sources of knowledge) or external character (external sources), being a driver of the other processes. The attribution of meaning to the knowledge (or interpretation) is related to the necessity that different stakeholders have to understand the organizational events (PAIS, 2016).

The knowledge sharing process allows it to spread and spread to the entire organization. Formal sharing and diffusion processes take place through actions instituted by the organization for this purpose (examples: business meetings, training sessions). The sharing and informal diffusion can occur in various interactions, for example, when you talk about work in the lunch breaks or coffee breaks, where you tell funny stories that happened at work in social events taking place in the organization and / or outside it. It emphasizes the fundamentally explicit nature of knowledge, which is formally shared and tacit, nature of that which is the subject of the informal process of sharing (CARDOSO; GOMES, 2011).

The measurement of organizational knowledge process involves the definition of indicators (related to the organization's goals) that enable the development of performance measurement systems. These are validated for their implementation and further elaboration of internal and external reports.

Nevertheless, the process of knowledge recovery can occur in a controlled way or automatically, in order to be used subsequently. Controlled recovery occurs when the organizational actors critically reflect on successes and failures of administrative actions, using several records to retrieve information that will be used after the activities have been performed. On the other hand, automatic recovery involves tacit knowledge and occurs when employees work under certain values and principles or automatically act in a certain way in unexpected situations.

Cardoso and Ferreira Peralta (2011) extend the model of Cardoso (2007b), offering another dimension on the action using knowledge. They highlight the effective use of the knowledge held, since its mere possession, sharing and accumulation does not mean promoting organizational performance.

Even in the environment of organizational conditions facilitating the implementation of the KM, Monteiro and Cardoso (2008) highlight the role of Hu-

man Resource Management (HRM) in creating a cultural context that impacts positively on KM processes. Rigie and Lindsay (2006); Monteiro and Cardoso (2008) and Figueiredo (2013) claim that when the HRM gets involved, it becomes critical to the successful implementation of KM.

Organizational memory can be organizational knowledge base call (JENEX; OLFMAN, 2003). This is a prerequisite for individual and / or organizational Learning (JENEX; OLFMAN, 2003).

As Pires (2009) states, the existence of an organizational memory can bring a several benefits to the body, with the reuse of solutions, previous projects storage, virtual libraries, internal and external presentations, which can seamlessly generate new knowledge.

This practice allows the organization to rescue the entire collection of its work, contributing to the analysis and improvement of its performance, since it promotes relearn from already implemented and evaluated strategies constantly stimulating the incorporation of new ideas (PIRES, 2009).

With the adoption of these strategies, public organizations maximize efforts in building a knowledge environment, providing returns from their human assets and allowing a true knowledge management cycle (SCHWEIGHOFER, 2004). It is up to the organizations, and the use of advanced technological resources, to make servers think, create and disseminate knowledge within the institution, making it a true organizational excellence tool (PIRES, 2009).

In this context, it was found that the strategic management processes of knowledge, KM practices and favorable image, held significant difference in public organizations.

## 2.2 The overview of knowledge management applied to Brazilian Audit Courts

Over the past 15 years, research on KM has focused on the implementation of the KM through case studies in public and private organizations (MATOS *et al.*, 2016; RIGIE; LINDSAY, 2006).

Knowledge management in the public service can be understood as an integrated system to create, retrieve, share and apply knowledge to optimize the efficiency and effectiveness; improve the quality and increase effectiveness; and contribute to Brazil's economic development (RIGIE; LINDSAY, 2006).

Batista and Quandt (2015) showed in their investigation and practices in

KM in the public sector, through the work done by the Institute of Applied Economic Research – IPEA in 28 agencies of the direct administration of the Federal Executive and 6 state enterprises, the evolution of how the KM was planned and implemented in the Brazilian federal government.

In this perspective, where knowledge is a differentiating factor for individuals, organizations and nations, human resources management reaches a significant level for the continuous search for performance of public institutions, making managers look for ways to extract, organize and revitalize knowledge assets so that they can be used as a promoter of organizational development (PIRES, 2009).

In Brazil, the Federal Constitution says that the country Audit Office is responsible for exercising external control on public administration, caring for public property, for the analysis and accounting, finances, entity's operations and the budget of public sector (ALVES, 2006). These institutions, besides as performing their mission, should develop a kind of control: Search the prevention of public spending in order to demonstrate a possible outcome achieved depending on the action taken; follow administrative practices avoiding unnecessary waste and expense; orient managers by providing information necessary for good management, allowing, in due time, the knowledge of government practices and their real implications for collective needs (PIRES, 2009).

Thus, the Audit Office rethought its way of working in order to implement a system of work that manages, evaluates and controls plans, government programs and projects by Brazilian public institutions in a better way (PIRES, 2009).

In the Audit Office, its constitutional exercise demonstrates the fulfillment of its role as an agent of transformation, which strives for effectiveness and continuous improvement of public administration, through preventive, concurrent and subsequent action to the facts of the administrative, operational, property, financial, budgeting and accounting of their jurisdiction, through enforcement of actions and monitoring of public policies (FREITAS, 2017).

Therefore, there's the need of the Accounts Office to seek strategies that would enable the renewal of attitudes, knowledge and skills in order to disseminate among their servers awareness, making them more collaborative individuals, given the importance of sharing knowledge and information, in order to capture, retain and disseminate the knowledge acquired and produced for the other Brazilian public organizations (PIRES, 2009).

In short, Alves (2006) points out that knowledge management can represent the necessary mechanism to map and disseminate the knowledge and actions of

the employees in the exercise of their analysis activities and accounting, financial, budgetary, equity and operational processes carried out by their jurisdiction, sharing information and improving the quality of services provided in the public area.

With the information discussed so far, it is suggested that there are several possibilities to evaluate the KM processes and cultural orientation. Given the above, follows the next section that will show the conceptual model of the article and the general hypothesis of the study.

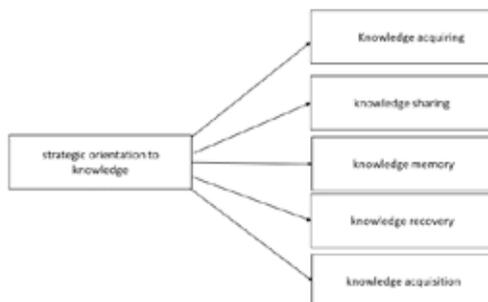
### 2.3 Conceptual model and hypothesis of the research

The article, from a conceptual point of view, is based on the Cardoso model (2007b), which covers a perspective of KM “people-oriented”, where knowledge is related to the person who built it, who owns it and the uses, and that social interactions are a channel for the acquisition, sharing and the utilization takes place in an effective manner (PAIS, 2016).

Using the conceptual model of Cardoso (2007b) as a parameter, it is considered that there is a relationship between cultural orientation and KM processes which are conducted in a positive and direct way to the employees, in order to carry out their activities effectively.

In this sense we identify the conceptual model described in Figure 1 where the following variables are considered: the processes of acquiring knowledge; the processes of knowledge sharing; knowledge memory processes; knowledge of recovery processes and knowledge acquisition processes.

Figure 1: Conceptual model



Source: Adapted from Cardoso (2007b).

Given the above theoretical framework and the proposed conceptual model, the hypothesis of the study is the following: the external control auditors realize KM processes carried out by the Audit Office and there is a strategic orientation to knowledge through an organizational culture.

The following methodology will be described in order to support the scientific method of the research.

### **3 METHODOLOGY**

#### **3.1 Characterization of the research environment**

From the External Control System Modernization Program of the states and municipalities of Brazil (Promoex), the strategic focus of the external control prioritized assessment of compliance programs and government (ALVES, 2006; FREITAS, 2017; PIRES, 2009).

The Promoex was a coordinated program by the Audit Courts, through the Association of Members of the Audit Office of Brazil (ATRICON), Institute Rui Barbosa (IRB), National Bank for Economic and Social Development (BNDES), Ministry of Planning, Budget and Management (MOP) and Inter-American Development Bank (IDB), which aimed to strengthen the external control system (FREITAS, 2017; PIRES, 2009).

The Promoex identified organizational performance problems of the Audit Courts, which indicated five dimensions: external integration, planning and management control, key working procedures, information technology and human resource management (PIRES, 2009).

In 2014, ATRICON conceived the Quality Program and mobility of the Audit Office (QAAO), which aims, among others, to evaluate the performance of the Audit Office and encourage the adoption of international best practices. These management practices can contribute to the creation, retention, and recovery the necessary knowledge to the performance of the external control.

These practices, such as talent pool, video conferencing, process improvement groups, corporate education, organizational memory, and inter-institutional alliance, enable the sharing of procedural information, and therefore, the continuous improvement of the activities of the Accounts Office (FREITAS 2017; PIRES, 2005).

The ATRICON approved a normative defining the IT infrastructure, processes and people to the activity of intelligence that allows a database, in order to produce knowledge to assist decision-making (in order to provide) greater efficiency and effectiveness in the external control actions (FREITAS, 2017).

On the other hand, InfoContas allows through processes, sharing and exchange of information, monitoring and trial accounts that promotes economy, rationality and agility of procedures and greater selectivity and planning of inspection activities, particularly the institutionalization of a National Information Network strategic for External Control (FREITAS, 2017).

### 3.2 Sample

The population surveyed is the external control auditors at AOs in Brazil. The sample includes 2000 external control auditors registered with National Association of External Control of the Audit Office of Brazil – ANTC.

So, as there were 380 subjects who answered the survey, responding to six variables (acquisition, knowledge sharing, interpretation, organizational memory, knowledge retrieval and cultural orientation).

According to Table 1, the sample is predominantly male (64.0%), aged between 35 and 49 years (54%) and with over 10 years of work at the studied organization (57.3%), with the highest degree of specialist training (68.4%) and with the supervisory department integrating the largest number of employees (52.4%).

Table 1: Sample characteristics

Gender		
Feminine	137	36%
Male	243	64%
Age		
18 to 24	2	0.5%
25 to 34 years	95	25%
35 to 49 years	205	54%
50 to 64 years	76	20%
Over 65 years	2	0.5%

Table 1: Sample characteristics (continuation)

Education		
Doctorate degree	8	2.1%
Specialization	260	68.7%
University graduate	25	6.6%
Master's degree	86	22.6%
Years of work experience		
Between 1 to 10 years	219	57.6%
Between 10 to 20 years	82	21.6%
Between 20 to 30 years	42	11.1%
Over 30 years	13	3.4%
Under 1 year	24	6.3%
Departments		
Administrative area	19	5%
Inspection	199	52.4%
Offices of directors / Deputy Counselor offices	33	8.7%
Others	31	8.2%
External Control Secretariat	98	25.7%
Total	380	100%

Source: Prepared by the authors (2019).

### 3.3 Description of the research instrument:

The questionnaire was held from 24 May to 29 June 2018 together with the external control auditors Audit Office, through the e-mail provided by Auditors' National Association of External Control. The surveyed subjects identified KM practices and cultural orientation, if they occurred, as "applied" in the Accounts Court.

To collect data from the 380 study participants, appealed to the version of the Knowledge Management Questionnaire (QKM) consists of 42 items (CARDOSO, 2007a). Throughout the period of application of the research, five reminders were sent via e-mail to the auditors for the completion of the questionnaires. Thus, it was obtained a response rate of 19% (380 of 2,000 external auditors associated with control ANTC).

The questionnaire is organized into sub-scales, whose items were meant to

assess the perceptions of external control auditors about the KM processes. The processes involved are acquisition of knowledge processes; sharing processes of knowledge; processes of interpretation of knowledge; memory organization; recovery processes of knowledge and cultural orientation to knowledge. The choices of answer are focused on expressing “apply”, presented in a *Likert scale* with five possible answers (where 1 corresponds to “almost never applicable” and 5 “applies almost”).

The data were analyzed on SPSS statistical software as a preliminary examine that allowed the factorial structure of each variable and their relative consistency to constructs. At the stage of data analysis, we used the correlation analysis and exploratory factor analysis (principal component analysis) to assess the perceptions of auditors on the existence of KM-related processes in relation to cultural orientation to knowledge.

### 3.4 Results

The minimum values are shown (min.) in Table 2. It also shows the maximum (max.), Average values (M), standard deviations (SD) and the median (Me) of the variables of the processes of KM and cultural orientation of the Audit Courts. The results show the general application of the KM process.

Table 2: Descriptive statistics, using observations 1-380

Items	Variables and questions	Average	Median	DP	min	max	Alpha
Variable: Acquisition of knowledge processes							
1	We collaborate with other organizations to get more information	3.15	3.19	1.55	1	5	0.863
2	We are encouraged to take the initiative	3.02	3.01	1,198	1	5	0.853
3	We attended the seminars/conferences. Lemos and hire specialists	3.33	3.38	1,037	1	5	0.862
4	We learn from the sectors of our Court of Auditors to work best	2.72	2.68	1,170	1	5	0.856
5	We attend training courses or have training in the workplace	3.56	3.65	1,154	1	5	0.862

Table 2: Descriptive statistics, using observations 1-380 (continuation)

Items	Variables and questions	Average	Median	DP	min	max	Alpha
6	We seek to be aware of the changes that are happening	3.84	3.94	0.979	1	5	0.857
7	We take the knowledge that new employees bring us	3.5	3.58	1,116	1	5	0.853
8	We pay attention to what others are doing AO	3.26	3.31	1,142	1	5	0.864
9	We know the ideas for which the AO there	3.89	4.07	1,100	1	5	0.869
Variable: Knowledge sharing processes							
10	We join together to solve some problems	3.30	3.37	1,158	1	5	0.845
11	We pass information in workshops	3.43	3.52	1,199	1	5	0.848
12	We circulate the information among us	3.24	3.29	1,187	1	5	0.854
13	They are rewarded those who share what they know	2.36	2.28	1,126	1	5	0.864
14	We talk about work when casually met	3.42	3.52	1,021	1	5	0.847
15	We each other funny stories that have passed on the job	3.54	3.60	1,069	1	5	0.854
16	We talk about work in moments of relaxation	3.31	3.37	1,044	1	5	0.855
17	We speak of our Court of Auditors	3.64	3.73	1,086	1	5	0.847
18	We talk about our external control functions	3.47	3.57	0.911	1	5	0.845
Variable: Interpretation of the knowledge processes							
19	We seek to understand the rules of our organization	3.95	4.05	1,052	1	5	0.694
20	We seek to understand why certain job went so well	3.57	3.65	1,004	1	5	0.690
21	We seek to realize what's most important is happening in the Court of Auditors	3.69	3.75	1,029	1	5	0.664
22	We talked about issues we do not understand well	3.11	3.13	1,121	1	5	0.871

Table 2: Descriptive statistics, using observations 1-380 (continuation)

Items	Variables and questions	Average	Median	DP	min	max	Alpha
Variable: Memory							
23	We know what is expected of each of us and our Court of Auditors	3.39	3.49	1,021	1	5	0.834
24	What we do know we are seen in the way we work	3.44	3.48	1,013	1	5	0.842
25	Have the means to record the most important to know / learn	2.98	2.98	1,082	1	5	0.841
26	It's the way we do things we find solutions to new problems	3.49	3.52	0.968	1	5	0.848
27	What we know we see what we do better than others Audit Courts	3.08	3.13	0.991	1	5	0.845
28	We know how is the ECA/EC is designed / organized	3.02	3.04	1,110	1	5	0.840
29	Each of us has a role to play	3.86	3.97	1,014	1	5	0.843
30	We know that some people out there know if our situation is good or bad	3.16	3.23	1,160	1	5	0.855
31	Colleagues who take leave opinion about us	3.72	3.78	0.964	1	5	0.853
32	We know our jurisdictional / citizens have an idea about us	3.84	3.94	0.998	1	5	0.848
Variable: Knowledge Recovery							
33	We think the way we solve problems in the past	3.42	3.49	1,032	1	5	0.791
34	We asked colleagues how they solved similar problems	3.79	3.91	1,012	1	5	0.787
35	We act according to the way we are organized	3.61	3.65	0.951	1	5	0.794
36	We use the records we were doing over time	3.58	3.66	1,125	1	5	0.760
37	We use information stored in our computer means	3.87	4.02	1,061	1	5	0.800

Table 2: Descriptive statistics, using observations 1-380 (continuation)

Items	Variables and questions	Average	Median	DP	min	max	Alpha
Variable: Cultural orientation knowledge							
38	We seek information that can improve the quality of what we do	4.09	4.20	0.900	1	5	0.737
39	We are all responsible for what we know to work with quality	3.99	4.07	0.921	1	5	0.726
40	We act according to certain principles	4.26	4.37	0.853	1	5	0.717
41	Our leaders alert us to what is important to know	3.37	3.44	1,133	1	5	0.762
42	What we know is a “weapon” fundamental to overcome the Audit Courts	3.36	3.42	1,189	1	5	0.782

Source: Prepared by the authors (2019).

The lowest average figure for KM process was sharing knowledge (item 13,  $M = 2.36$ ), indicating that auditors share little or are not rewarded for sharing their knowledge and information. In its turn, the highest average was the cultural orientation (item 38,  $M = 4.0895$ ) where auditors seek information so they can improve the quality of their audit reports and analysis of checks and balances.

Furthermore, in the process of knowledge sharing by informal process, auditors are shown integrated and share data, information and spontaneous knowledge outside the work environment. Therefore, the action of sharing knowledge in the informal process prevails over formal sharing.

When it comes to the interpretation of knowledge, auditors understand the system of norms and values of the Court (paragraph 19,  $M = 3.95$ ) and they also have initiatives to gather why the work is successful (item 21,  $M = 3.69$ ) and the understanding of what is the most important and what’s going on inside of the Audit Court, as an organization, and the understanding as an agent of society (item 20,  $M = 3.57$ ).

Regarding the acquisition of knowledge, the auditors reported having knowledge of the reason why the Court there and their skills (item 9,  $M = 3.89$ ). As for the learning aspect with other sectors of the Audit Court (item 4,  $M = 2.72$ ), participants reported having opportunity for seamless integration within the organization.

With regard to memory, the participants consider that the mission to fulfill their activities is very present in their views and their ideal average value (item 29,  $M = 3.89$ ), so they know the importance of external control of the exercise before the claimants and society, have the lowest average value was compared to the record of the most relevant information and knowledge to the auditors (item 25,  $M = 2.98$ ).

Finally, the cultural orientation is the process that has the higher average score (item 40,  $M = 4.26$ ), in which it is evident that auditors perceive and act with principles. It is natural that the values related to cultural orientation are higher because the organizational culture based on KM and processes influence this corporate strategy.

Evaluating now the interdependence of KM processes and the cultural orientation to knowledge, shows the correlation matrix between the processes of KM. Correlations were all statistically significant (5% level) and mostly of high magnitude. Considering the classification Cohen (1988), the high magnitudes are located from 0,371, moderate magnitudes are between 0,243 and 0,371 and the low ones from 0,100 to 0,243.

At this stage, it was also carried out the exploratory factor analysis in order to analyze the total variance of the perception of external control auditors about the KM processes in relation to cultural orientation. Reliability was assessed by calculating Cronbach's alpha indicators equal or greater than 0,70 (see Table 3 in the appendix), according to what is recommended in the literature (LISBOA; AUGUSTO; FERREIRA, 2012). The overall Cronbach's alpha was 0,954 for the 42 items, showing high reliability of the items of the survey questionnaire measures.

In view of this, there was an analysis of the main components. The KMO and Bartlett test resulted in 0,940, therefore, in a Very Good index of factor analysis (LISBOA; AUGUSTO; FERREIRA, 2012).

The rotation strategy used by the research was the varimax method that aims to maximize the variability of factors. It was intended to obtain a pattern of variable weights on each factor that is as dispersed as possible, thereby facilitating its interpretation.

Shows in Table 3, the 7 components retain a significant portion of the accumulated variance in the original variables representing 0,60922 (60.922%) (HAIR; HULT; RINGLE; SARSTEDT, 2013). As the graph below, we observe that from the sixth component there is no longer any significant reduction of the eigenvalues.

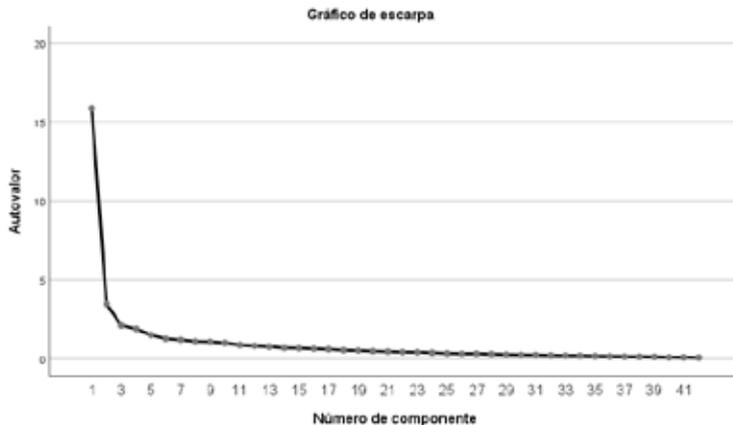
Table 3: Total variance explained

Extraction sums of squared loads			
Components	Total	% de variance	% cumulative
1	15,026	35,776	35,776
2	3,076	7,325	43,101
3	2,354	5,606	48,707
4	1,577	3,754	52,461
5	1,319	3,141	55,601
6	1,194	2,843	58,445
7	1,040	2,477	60,922

Extraction Method: Principal Component analysis.

Source: Prepared by the authors (2018).

Figure 2: Graph escarpment



Source: Prepared by the authors (2018).

It is noted that the results are consistent with the literature, since the extracted percentage of the total variance reflects the theoretical framework. It is evident, therefore, that the KM processes converge through a cultural orientation of knowledge and the practices developed by AOs utilize the expertise of auditors as a strategic asset to maximize your results as an institution.

## 4 CONCLUSIONS

This study is focused on the Audit Office of Brazil. It was found that the five KM processes – acquisition, knowledge sharing (formal and informal), interpretation, organizational memory and retrieval of knowledge, all generally occur in the Audit Office of Brazil.

We used an exploratory factor analysis of data that allowed us to explore a guiding theoretical framework of the study, in which the knowledge management processes promote cultural orientation, enabling organizational culture geared to knowledge and its applicability.

Therefore, based on the conceptual model of Cardoso (2007b), we developed a model that considered the cultural orientation knowledge outlines of the process of acquiring knowledge; knowledge sharing; knowledge memory; recovery of knowledge and knowledge acquisition.

Analyzing organizational culture, specifically the cultural orientation to knowledge, it was found that it is perceived by the auditors of the AOs of Brazil, which shows that the Audit Office are giving attention to the processes of acquisition of knowledge, understanding and interpretation, as well as its retention, preservation and internal memory, in order to improve the quality of services provided.

The results demonstrate the relevance of organizational conditions for the development of a culture that signals the importance of learning and knowledge.

These limitations with respect to the search context is cross-sectional, and therefore are not longitudinal impossible to analyze and to understand the dynamics of the KM and their processes over time. As a suggestion for a future research, the replication of the study in other Audits Office from other countries would be interesting to conduct to draw comparisons.

The study hopes to strengthen the Audit Office, based on the experience of external control auditors, and the importance of a strategic vision for the KM, in order to understand the opportunities and threats posed to the environment of public organizations and that impact on their performance.

Regarding to the implications for society, this research contributes to the academic community in terms of knowledge generation as well as for the Audit Office in optimizing their resources, with the best results, meeting the needs of their jurisdiction and citizens.

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