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Translated from the original in Spanish

Model for perfecting the scientific text composition from the continuous formation

Modelo para el perfeccionamiento de la redacción de textos científicos desde la formación continua

Modelo para a melhoria da redação de textos científicos a partir da educação continuada

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ABSTRACT
The fundamental mission of the institutions of Higher Education is the formation of professionals able to respond with efficiency and effectiveness to the requirements of the society where they are located, for what they require to put on to tone with the social demands of the historical time in which they are unwrapped. The objective is to propose a model for the improvement of the writing of scientific texts from the continuous formation for the educational of the career Degree in Accounting and Finances of the University Jose Marti Perez of Sancti Spiritus. It was used as general method the dialectical-materialistic one supported by the analytic-synthetic, inductive-deductive, systemic-structural, the modeling, analysis of documents, scientific observation, group interviews to directives, interviews to the teachers, interviews group to the educational ones, study of the products of the activity of the teachers of the career, pedagogic pre-experiment and experts' approach. The construction of the pattern presented from their theoretical and methodological base. The pattern was characterized to establish nexuses from the integration of the structural and functional components that facilitate the formative dynamics by means of the linking professional preparation and scientific-investigative activity, from the collaborative thing and dialogic like answer to its theoretical - methodological conception. It particularized it learning making, by means of the products of their activity from the coalition of the individual-group the way used to reach the improvement of knowledge, abilities, attitudes and the process of continuity and to extent the preparation in which the teaching- learning process is framed.

Key words: continuous formation; reda ction; scientific text.

RESUMEN
La misión fundamental de las instituciones de Educación Superior es la formación de profesionales capaces de responder con eficiencia y efectividad a los requerimientos de la sociedad donde están enclavadas, para lo que precisan

ponerse a tono con las exigencias sociales del tiempo histórico en el cual se desenvuelven. En tal sentido, el objetivo se centró en proponer un modelo para el perfeccionamiento de la redacción de textos científicos desde la formación continua para los docentes de la carrera Licenciatura en Contabilidad y Finanzas de la Universidad "José Martí Pérez" de Sancti Spíritus. Para lograrlo se utilizó como método general el dialéctico-materialista, apoyado por el analítico-sintético, inductivo-deductivo, sistémico-estructural, la modelación, análisis de documentos, observación científica, entrevista grupal a directivos, encuesta a los docentes, entrevista grupal a los docentes, estudio de los productos de la actividad de los docentes, preexperimento pedagógico y criterio de expertos. El principal resultado consistió en la construcción del modelo presentado desde su base teórica y metodológica. El modelo se caracterizó por establecer nexos desde la integración de los componentes estructurales y funcionales que posibilitan la dinámica formativa mediante la vinculación superación profesional y actividad científico-investigativa, desde lo colaborativo y dialógico como respuesta a su concepción teórico- metodológica. Lo particularizó el aprender haciendo mediante los productos de su actividad desde la fusión de lo individual-grupal, la vía utilizada para alcanzar el perfeccionamiento de conocimientos, habilidades, actitudes y el proceso de continuidad y prolongamiento de la preparación en el que se enmarca el proceso de enseñanza-aprendizaje.

Palabras clave: formación continua; redacción; textos científicos.

RESUMO
A missão fundamental das instituições de Ensino Superior é a formação de profissionais capazes de responder eficiente e efetivamente às exigências da sociedade onde estão localizadas, para a qual precisam estar em sintonia com as exigências sociais da época histórica em que se desenvolvem. Neste sentido, o objetivo era propor um modelo para o aperfeiçoamento da redação de textos científicos a partir da formação contínua de professores do curso de graduação em Contabilidade e Finanças da Universidade José Martí Pérez de Sancti Spíritus. Para conseguir isto, o método dialético-materialista foi utilizado como método geral apoiado pelo analítico-sintético, indutivo-dedutivo, sistêmico-estrutural, modelagem, análise de documentos, observação científica, entrevista em grupo com diretores, pesquisa com professores, entrevista em grupo com professores, estudo dos produtos da atividade docente, pré-experimento pedagógico e critério dos especialistas. O principal resultado consistiu na construção do modelo apresentado a partir de sua base teórica e metodológica. O modelo caracterizou-se por estabelecer vínculos a partir da integração dos componentes estruturais e funcionais que tornam possível a dinâmica formativa através do vínculo entre o aperfeiçoamento profissional e a atividade de pesquisa científica, a partir da colaboração e do diálogo como resposta a sua concepção teórico-metodológica. Particularizou a aprendizagem através dos produtos de sua atividade a partir da fusão do indivíduo-grupo, a forma utilizada para alcançar a melhoria dos conhecimentos, habilidades, atitudes e o processo de continuidade e prolongamento da preparação na qual o processo de ensino-aprendizagem é enquadrado.

Palavras-chave: educação contínua; escrita; textos científicos.

INTRODUCTION

The universities stand out as centers responsible socially and scientifically of the production of knowledge and it his has led to the internal reorganization of its training processes to facilitate the

development of a competitive university and adapted to the new demands of society. In this process, a basic element is the development of skills for writing scientific texts as a way of socializing the results, considered a fundamental skill, according to Domínguez *et al.* (2018), since the professionals involved in scientific research work complete their training when they achieve the dissemination of the results obtained.

To achieve this, special attention calls for Continuous Education as one of the ways to respond to the training needs of teachers (Fonseca *et al.,* 2019). This education focuses on continuous training, assumed as the training process that he receives during his professional practice, after having completed his initial training, in order to expand and refine the demands of acquisition and continuous updating of knowledge, skills and attitudes for the development of their profession.

This type of training aimed at preparing the teaching staff for achieving communication of scientific results as one of the stages of scientific research activity constitute a challenge in the university context and it is evidenced by documents governing that guarantee their social importance: the Sustainable Development Goals and Goals (United Nations, 2015), the Conceptualization of the Cuban Economic and Social Model of Socialist Development (State Council, 2017), Guidelines 120 and 121 of the Economic and Social Policy of the Party and the Revolution (Communist Party of Cuba, 2017) where special attention is given to the comprehensive training of the cloister, to lifelong learning opportunities for all, to professional and higher quality training based on the scientific-research activity and the need to prioritize improvement to achieve continuous training . In this preparation process and lifelong learning ,the skill development for scientific writing is framed, as one of the greatest needs training of the teacher , considered by the authors as the mental process in their cognitive, procedural and attitudinal unit Self-regulates in the teacher for efficient performance , by achieving the logical thought-writing relationship of the results of scientific research, according to their own communicative context, through the use of written language from the knowledge and management of lexical, stylistic, grammatical and textual resources.

The selection of scientific essay writing as theme was framed the analysis of compliance with the goals set by the area of science and technology at the University "José Martí Pérez" in scientific production during 2014, as part of an exploratory study carried out from the project "Strengthening the science of education in the context of university integration for sustainable development", focused on the professional teaching culture to which research contributes. On this basis, there are limitations in the communication of the scientific results of the teachers of the Bachelor of Accounting and Finance career, with greater emphasis on those of the profile of the profession, noting as one of its causes, the insufficient level of knowledge that it possesses for the scientific writings.

On the basis of the analyzes carried out, the need and relevance of the subject is revealed, while cognitive and practical needs are appreciated in the teachers of the Bachelor of Accounting and Finance career, such as: theoretical-methodological insufficiencies in terms of teaching procedures of the writing of scientific texts of the university professor ; shortcomings i n the design of alternative solutions for the writing of scientific texts for university teachers, based on self-improvement actions from the products of their scientific- research activity . In the same way, inadequacies in the initial

and continuous training processes of the teachers of the Bachelor's degree in Accounting and Finance for the orientation and follow-up of the process of writing scientific texts; theoretical - practical dichotomy around the evaluation of scientific writing during the process of analysis and discussion of scientific -Investigative activity and absences regarding the knowledge of the characteristics of the scientific text, limitations in the domain of the scientific lexicon, lack of coherence and clarity in ideas, little precision, accuracy and objectivity to express themselves in writing and insufficient power of synthesis.

From the theoretical study, in the case of López *et al.* (2011); Padrón *et al.* (2014); Pérez *et al.* (2016); Lam (2016); Méndez *et al.* (2016); Ruíz and Roque (2017); Gordillo (2017); Carrera and Corral (2018), valuable results, oriented to the appropriation of knowledge, so there are still gaps to be explored around the procedures, in order to perfect the theory and its instrumental nature to transform pedagogical practice.

From all the preceding analysis it is inferred the existence of few antecedents of scientific results that contribute to the improvement of the writing of scientific texts of the university professor from procedures that use the product of their activity as evidence of the investigative practice, which shows that the subject t has not been sufficiently approached by scientific-pedagogical activity from this perspective.

For these reasons, the objective is to propose a model for the improvement of the writing of scientific texts of the teacher of the Bachelor of Accounting and Finance career from continuous training.

MATERIALS AND METHODS

An exploratory research strategy was followed where the real state of the 17 teachers of the profile of the profession of the selected career was diagnosed, around the writing of scientific texts and through the authorization of the faculty as an ethical requirement. The methodological conception was assumed from the linking of quantitative and qualitative approaches; in it, the methods and techniques of the research of pedagogical sciences are articulated. To assume this position, the approaches of authors such as: De Armas y Valle (2011) and De Jesús Paula *et al.* (2020). In order to fulfill the proposed objective, the dialectical-materialist method was used as the methodological nucleus for the selection and elaboration of the particular methods, which allowed conceiving the logic of the investigative procedure. Theoretical methods are discussed below:

Analytical-synthetic: it made it possible to penetrate into the essence of the teacher's writing process of scientific texts to establish its theoretical and methodological components, its foundation, as well as to carry out the processing of the results of the empirical information collected.

Inductive-deductive: it was useful to formulate generalizations from singular aspects of the process of writing scientific texts, which served as the basis for the elaboration of the theoretical foundations of the proposed model.

Systemic-structural: it was used in the elaboration of the model configured in subsystems that, in its structure, operation and graphic representation reflected the conception of the authors, as well as the determination of the hierarchical order that revealed the links between all the elements, which allowed

to clarify the dialectical relationship between its parts.

Modeling: aimed at representing the characteristics of the scientific text writing process of the university professor, from continuous training to its improvement, the different categories for its evaluation and the conception of the model.

Document Analysis: is the analyzed plan to overcome the faculty and teachers department, the documents of the scientific sessions of the departments, methodological work plan of different organizational and managerial levels, professorial evaluation of teachers and individual development plan.

Besides, the current curricula, the professional model, and the programs of the subject and discipline of methodology of Research in order to obtain information about the planning and execution of the subject were used.

Scientific observation: it was used by means of the previous preparation of a guide for the observation of professional improvement activities, in order to verify the treatment given to the writing of scientific texts, depending on the preparation of the teachers;

Interview to group executives: made to Dean, vice - deans, department heads and career coordinator for the determination of the needs of teachers in scientific writing and the treatment given to the subject.

Teacher survey: to determine their main training needs on this edge (with a self-diagnostic nature).

Group interview with teachers: in order to expand aspects derived from the information obtained from the survey, mainly about the theoretical knowledge regarding the writing of scientific texts and the preparation received during their initial and continuous training; study of the products of the activity of the professors of the career: papers, master's theses and articles written by the professors were reviewed and analyzed in order to verify the state of the writing of scientific texts.

The pedagogical experiment: by teaching pre experiment as methodological variant where the stimulus, measurement and control are performed on the same sample selected (initial phase) and expert criterion: it was used to submit to the experts the model evaluation.

To carry out the study, the 47 teachers who work in the career were selected as the population and intentionally the 17 of the profile of the profession where the problem presented was framed with greater force, which represents 36.17%. In addition, we worked with the managers, based on the criteria of key informants according to the references of Rodríguez *et al.* (2004). Based on the design methodology taken from linking quantitative and qualitative approaches it was used for conducting the study, an ordinal scale levels Very Adequate (VA), Adequate (A) and Little Adequate (lA).

RESULTS

Results of the empirical diagnosis

As part of the analysis of documents, Science Policy of the Technical Sciences and Management Faculty, the plan of overcoming faculty, plan to overcome the educational departments of the Bachelor career in Accounting and Finance, the acts of the scientific studies, the methodological work plan of the career, teaching departments, disciplines and subjects, the acts of the methodological activities, teacher evaluations, individual development plans, current study plans, the professional model, the program of the

main integrated discipline and Methodology subject of the investigation were checked.

In this review we found that in science policy it is mentioned, as part of the general diagnosis, the problems with the divulgation of the scientific result: insufficient project management, insufficient obtaining awards and of participation in events; the drafting process is not mentioned as the form of transmission of the results.

The improvement plans include actions aimed at the profile of the profession of these teachers according to the specialty, which showed the absence of a diagnosis about the writing of scientific texts and that the projection of improvement does not fully respond to their needs. In only two of the acts of the scientific sessions (where research results are discussed) there is emphasis on writing from the use of scientific language or writing, without due treatment, so there is no written evidence of activities developed for such purposes. Similarly, the methodological work plans of the different organizational and management levels include only the activities related to the didactic process of the class.

In teachers' evaluation, only development and recommendations, the increase in publications and in individual development plans were analyzed. There is no reference to the limitations of teachers in the writing process.

The study plans C, D and E have contemplated the subject of Research Methodology, except for modified D blended; in the professional model, it is structured from the professional's functions and career objectives, the application of the research methodology in solving the problems of the profession and in the preparation of reports.

The main integrating discipline in plan D includes the subject Research Methodology and inserts the methodological explicitly, as in the course program the writing process is not conceived as an aspect of scientific communication. From the analysis carried out, it was inferred that the writing of scientific texts, although it constitutes a need for teachers, it is not considered in the planning process. The models include the knowledge of this branch of knowledge in the practical solutions, although they do not explicitly specify the drafting process.

By observing Postgraduate courses aimed at working with scientific writing and to methodological activities which types of items are analyzed, it was found that it is insufficient the treatment given to the drafting of the text, so each aspects to observe was rated as Little Adequate(LA).

In the case of the scientific sessions, both the treatment given to the writing of scientific texts and the interest shown by the teachers in the preparation were the only aspects evaluated as Adequate (A) for having been mentioned. Others referring to knowledge, skills and level of involvement of the teachers were evaluated Little Adequate (LA).

In the interview carried out with the directors, it was found that the teachers are not fully prepared for the writing of scientific texts, they have not verified it directly, but it is evidenced in some analyzes carried out. They said not to have made enough preparations on the subject, although in some scientific sessions the subject is analyzed; they are aware that it is one of the limitations that influences insufficient scientific production. They showed great interest in creating spaces to achieve this preparation.

Similarly, they rose that the study plan E contemplates the methodology of the

subject of the Methodology of Investigation, Previous plans, C and D, incorporating the document as a basis for practical professional, of which most teachers are graduated. It is valid to point out that it alluded to plans and subject to study its initial formation process, since the teachers are graduate s from these curricula (C and D), also of the A and B that preceded these where it is not received the Research Methodology as a subject. During the process of initial teacher training, no subjects were worked on in the Practice of the Spanish language discipline.

In the applied survey, it was found that very few teachers rate the different aspects as M, most rate them as A, although there are those who rate them as PA: the knowledge received during their initial training for writing scientific texts (four) for a 23 , 5 %, 13 theoretical knowledge and knowledge for self-review and self-correction (76.4 %), 11 the application of theoretical knowledge (64.7%), six skills development (35.2 %) and 13, for 76.4 %, the performance of self-review and self-correction in said process.

Similarly, 11 the postgraduate improvement received for the writing of scientific texts (64.7 %), 12 the improvement from the methodological work received (70.5 %), nine the self-improvement carried out (52.9 %), 13 the time dedicated to preparation (76.4 %), five interest in that preparation (29.4 %), four the priority given to preparation (23.5 %) and 13, for 76.4% %, the assessment of the importance of knowledge of the characteristics.

From the previous analysis, as part of the pedagogical pre-experiment in its initial phase, it was derived that there are needs and the greatest limitations were focused on insufficient theoretical knowledge, insufficient skills, treatment and little time, involvement, interest, priority for preparation, assessment of its importance, self-review and self-correction. In the group interview, their knowledge of the textual typologies, general structure and general aspects of the bibliographic norm used was verified. They considered it appropriate to prepare on the subject and gave importance to the knowledge of the characteristics of writing scientific texts; but they showed a level of ignorance about the theoretical aspects that it contemplates (principles, characteristics, discursive markers, types of paragraphs, common mistakes), they only referred to some elements, all the knowledge was directed to the methodological dimension. Regarding the realization of the self-review and self-correction of the writing, they needed not to do it with the depth nor the knowledge required, they lack the preparation to achieve it.

They stated that the plans, during their initial training, did not contemplate the preparation in this subject, and did not receive preparation from the methodological work or from the postgraduate improvement, some especially those from the Accounting, Cost, Audit department received a course in scientific writing, but the methodological part prevailed, they neither dedicate time to self-improvement in this regard, only some reported reading something.

There was little willingness to search for updated information aimed at expanding knowledge and managing actions for improvement based on the subject, little importance to the process of self-review and self-correction. However, they attached importance to knowledge of the characteristics of writing scientific texts; they considered it necessary for professional growth, although the procedure does not prove it.

From the review and study carried out on the products of their activity: lectures (15), scientific articles (8), master's or specialty thesis (14), it was found that

teachers have limitations in most of the aspects or parameters to have into account, with emphasis on: 64.7 % in the poor score; 41.1 % in the use of capital letters and sloppy syntax; 47.0 % in ambiguous pronouns; 58.8 0 % in the improper use or absence of textual markers.

Also, 41.1 % in the incorrect use of prepositions, in informal language and in the failure to achieve thematic progression and global coherence; 47.0 % in the incorrect use of verb forms; 76.4 % in the length of sentences, paragraphs and in the forms of elocution, which denotes insufficient ideas. All these aspects were rated LA (3); in addition to other deficiencies that require amendment since they affect clarity, brevity and precision.

Based on the study, they were identified as potential, with an evaluation of Adequate (A): the interest shown by managers regarding the improvement of the teaching staff in function of the scientific copywritings, the interest of teachers by subject as part of the demands of the level of teaching and scientific-technical development, the importance that they give to the subject based on their knowledge, the knowledge they show of textual typologies, general structure of scientific texts and the bibliographic norm used.

The limitations, with a rating of Little adequate (LA) focused on: the theoretical and practical knowledge for the writing of scientific texts, the actions of improvement from the different levels, the analysis and discussion of the subject in the scientific research sessions and excedances received, the self - improvement and management improvement of the teaching staff in the field, unwillingness to search for updated information to increase knowledge and little importance to scientific writing as an important part of his scientific- investigative activity.

Results of the theoretical diagnosis

On the basis of the theoretical / practical analysis carried out, it was inferred the existence of few antecedents of scientific results that contributed to the improvement of the writing of scientific texts of the university professor from procedures that used the product of their activity, as evidence of the investigative practice. In this regard, it was assumed the model as a scientist result, when becoming a valuable tool to transform teaching practice and enrich the theory, reveal the nature of the object model and the theoretical and methodological positions to facilitate their implementation.

In the literature, the existing concepts around the model are dissimilar, but in accordance with the interests of the topic and by referring to the general process that includes the mental and operational, the definition that shows it is assumed as the abstraction of those essential characteristics of the object that is investigated, which allows discovering and studying new relationships and qualities of that object of study with a view to transforming reality. In the bibliographic review, an explicit definition of a model was not found for the improvement of the writing of scientific texts as a model typology, with its structural and functional invariants. The model of continuous training oriented to the writing of scientific texts was taken as a reference, according to Jiménez *et al.* (2018).

The authors, on the basis of the previous theoretical postulates , defined the model for the improvement of the writing of scientific texts , from the continuous training, as the ideal representation of the process of writing scientific texts of the university teacher that , based on the Collaborative work and in the dialogic approach , it aims to prepare it in the context of the teaching departments towards its improvement through continuous

training manifested in a system from the cognitive, the procedural and the attitudinal; all oriented to scientific-investigative work, through the relationships established between components, forms of implementation and evaluation to achieve a change in knowledge, skills and attitudes in the short and long term.

The structure of the model included: end and objective, principles, characterization of the field of action, strategy, forms of implementation and forms of evaluation.

The Model aimed the perfecting of scientific writing process of the teachers of the Degree in Accounting and Finance career from the continuous training. In this sense, the model is proposed as a general objective: to improve the knowledge, skills and attitudes of the teachers of the Bachelor's degree in Accounting and Finance, in relation to the writing of scientific texts, through the integration of professional improvement and their scientific - investigative activity, from the collaborative and dialogical point of view. Here the improvement must be understood as a system of actions to achieve the process of continuous improvement in the writing of scientific texts, as part of the scientific-investigative performance of the teacher.

For this reason, the demands that were assumed for the continuous training of the teacher in which the preparation for the writing of scientific texts is inserted were the following:

1. Teacher training as a continuous process with an integral nature: its starting point is the diagnosis of teacher training needs and allows identifying where their deficiencies and potentialities lie, manifested in the knowledge, skills and attitudes towards the writing of scientific texts and the continuity of the preparation process by teachers and managers, in pursuit of constant improvement. It is sustained on the basis of promoting development based on the satisfaction of their individual and group training needs, with an emphasis on personal development and the enrichment of their cultural heritage for their better scientific-research performance.

2. The personalized, developer and contextual nature of teacher training : the psychological configuration of the teacher requires attending to personal and individual characteristics, experiential references, experiences, knowledge, skills, attitudes, potentialities and personal limitations for achievement of its transformation, the reflective and self-reflective processes in the continuous training activities conceived.

3. The dialogic communication in the formation of the teacher: a flexible and empathetic climate is established from the beginning and maintained throughout the training process, focusing on the exchange, reflection, dialogue, horizontal communication, so that it propitiates the authentic expression of the participants and fosters the inter subjective relationships as a basis for solidarity and help.

4. Collaborative work in teacher training: professional improvement actions based on collaborative work and a dialogic approach are conceived to stimulate reflective processes, develop exchange, progressive socialization and the assumption of collective beliefs for personal development. Social interaction becomes important in learning through personal needs, normative pressures and the desire of ownership, which serves as a form of relationship between teachers in collaborative work.

5. The interdisciplinary, systemic nature and excellence as a result to be evaluated in teacher training : it is based on a conception of the development of

knowledge, skills and attitudes of the teacher, focused on the integral professional approach, from the complex and multidimensional perspective of the elements that make it up and their dialectical relationships, based on the achievement of the desired change in the teacher career, with a training that stimulates their disposition for their scientific-investigative role and that results in personal and group growth.

The model included two structural components: starting level and contextualization (component I) and implementation (component II), in two stages. The phases of each of its components respond to an interrelation that integrates the dynamics of hierarchy and subordination that offer integrality to the continuous training process , oriented to the writing of scientific texts to contribute to the development that transverses each of the components, depending on the empowerment of human resources and with a prospective vision.

Based on the results derived from the analyzed methods and the analytical-synthetic, inductive-deductive, systemic-structural and modeling, the proposed model was designed. It is presented in figure 1.

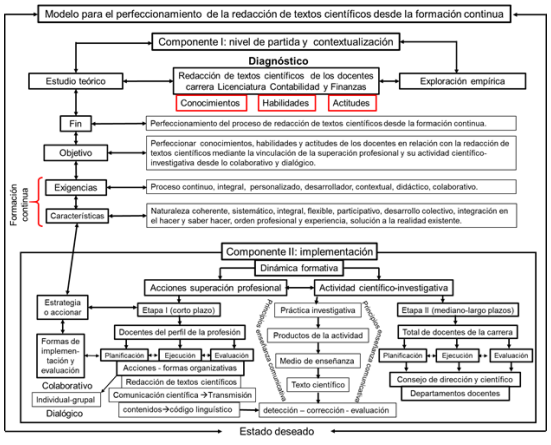

Fig. 1- Graphical model Representation

Once designed, it was subjected to the criteria of experts (29), where 81 (8 %) of the 11 indicators were evaluated as Very Adequate (VA); the correspondence between the values of the indicators stands out and the value (VA) predominates in the mean of the cut-off points.

Then each of the components of the model is required:

Starting level and contextualization: it means, from the theoretical study and empirical exploration, the identification of the needs and potentialities of teachers regarding the writing of scientific texts. From this, the diagnosis, purpose and objective, requirements, characteristics of this process and characterization of the field of action derives.

Implementation: It consists of the conception, planning, execution and evaluation of professional improvement actions, in an integrated and contextualized way, from the strategy, action or training dynamics conceived, the forms of implementation and those of evaluation. It is valid to specify that, although each moment is separated for the conception and implementation, they make up a triad that is integrated into all actions.

Specific objectives: To contribute to the improvement of the scientific-investigative performance of the teacher of this career, develop in them a professional culture for the exercise of research writing in response to their professional performance and basic qualities in these teachers for continuous improvement as a professional of Higher Education.

At the same time, it responded to the characteristics of the continuous training process: to be coherent in nature, since it achieves a connection between the components, stages and organizational forms used; systematic , since the

actions allow continuous work; flexible, adjusting actions based on the outcome; Furthermore, the evaluative system used invigorates the possibilities of integrating a necessary content as a tool to fulfill the investigative function and writing as a form of socialization. It facilitates the process of collective development by using group work, promotes the integration of teachers in doing and knowing how to do, allows inserting professional aspects and experiences to achieve basic knowledge and skills to find solutions to the existing reality.

It includes two stages:

Stage I. Initial preparation for the improvement of the writing of scientific texts, from the continuous training of teachers of the profile of the profession in the short term.

Stage II. Continuity of preparation with teachers of the profile of the profession and start with other teachers in the career for the improvement of scientific writing, from continuous training medium and long terms.

Forms of implementation:

In stage I, the second structural and functional component is inserted with professors from the profile of the profession:

Planning:

At this time, the organizational forms of professional improvement to be implemented in the short term were determined and established, depending on the needs and potentialities derived from the results of the diagnosis (specialized conference, training, scientific workshops and scientific debate) and the what to work and how with the precision of the entire organizational and methodological base and the system of activities to be applied. In the same way, the possibilities of instrumentation were organized with the teaching departments. The necessary reference materials were prepared for updating knowledge and developing skills.

The execution:

The execution of the planned forms of professional improvement was projected, from collaborative work and a dialogic approach in the short term in spaces organized by the teaching departments. It started from the conception, organization and execution of professional improvement in an integrated and contextualized way for the improvement of the writing of scientific texts; It is and execute the process of teaching and learning according to the selected type, the objectives, content, structure, methods, means, and finally activities designed evaluation system. Collaborative learning is promoted through the formation of group subjects.

The specialized conference is developed according to the main limitations, from examples that allow practical evidence of the deficiency or the aspects to take into account in order not to incur it. The training is aimed at updating, perfecting, systematizing and consolidating skills and practical knowledge with a high level of independence for professional performance or its reorientation.

It is carried out in three work sessions from the blended mode and the fourth is discussed in the planned workshop. The activities have as a dynamic of development the work in teams of four members and one of five; Formal work groups are used, since the meetings are directed at the organizational forms of the teaching-educational process. The teacher guides in advance in each work session the activities to be analyzed, discussed and debated in the subsequent session. In the workshops, the theoretical and practical knowledge acquired through the

specialized conference and training is linked, so that their scientific training, their own professional and educational practice are enriched in order to perfect the writing of scientific texts. Three workshops are held with duration of four hours, the rest of independent work.

The methodology incorporated for the conduct of the workshops was carried out on the basis of the analysis and discussion of the content aspects, with a system approach, in order to stimulate the individual and collective orientation of the teachers. In this way, each workshop is planned with the conception of a group dynamic that allows students to develop their cognitive independence and collaborative relationships during the learning process.

At the beginning of each workshop, general ideas that constitute the starting level for the development of the planned activity are analyzed and the way to proceed is explained, in a flexible environment, in order to provide a solution to the problems that arise.

The dynamics is sustained by the formation of work groups as an alternative to be used. The same working groups organized from the training are used, which in addition to the consultation materials to be used have in advance the orientation of the aspects to be studied and debated. The tasks are carried out depending on the individual responses that are shared in the group and, finally, the team members come to elaborate a new response from the individual ones.

The workshop system is based on the basic principles of collaborative work: individual responsibility, positive interdependence, mutual interaction and balanced participation. The content of the materials to be studied includes the topic mentioned above, but from the planning of the debate, to retake the individual and group experiences of its members. For the guiding role of the teacher, the analysis is directed to self-knowledge, growth and personal improvement.

The investigative function is directed towards critical analysis, problematizing, reconstruction of theory and practice. Development workshop run the following times: u n first assurance of material conditions and organizational; a second moment to stimulate the development of the basic elements so that work in groups takes place and a third conclusive and evaluation moment, where the distinctive elements of consensus or divergent with respect to knowledge, skills and attitudes around the experiences are highlighted that are had, as well as an assessment based on the objectives set for the activity.

The scientific debate is carried out from the discussion by themes, in order to analyze and debate about the transformations achieved from the different organizational forms used. The managers contribute their ideas around the projection of the continuous training of the teaching staff in relation to the subject under study.

The evaluation:

At this time, the forms of professional improvement executed from the collaborative work and the dialogic approach in the short term are evaluated, in spaces organized by the teaching departments. Each action carried out culminates in the application of an instrument aimed at evaluating the level of effectiveness achieved. To achieve this, the systematic individual and group procedure is evaluated qualitatively and quantitatively, according to the activities conceived, where self-evaluation, hetero-evaluation and co-evaluation are used. The ways of culmination or closure of the organizational forms are integrated and adjusted according to the interests of the trainees to achieve the

flexibility that characterizes the process, where the result of the product of their activity prevails, in order to verify the gradual improvement of the writing of its scientific texts.

The evaluation in this process of professional improvement has a systematic character. It has intended to check the acquisition of knowledge and skills, skills training and level of responsibility for the preparation expressed in implication. It constitutes a cyclical view of the model through an integrative and systematic assessment of each of the components and phases.

The different forms of improvement adopted require a follow-up and assessment of the changes made in teachers, to appreciate the level of satisfaction of those involved and the improvement achieved in their professional performance referred to knowledge, skills and attitudes acquired.

This process of continuous training, as a way to improve the writing of scientific texts, should not only lead to transformations on the cognitive level of teachers, but also on the behavioral level, which is achieved when there is full awareness of the need for everything learned to be reversed in a transformation of scientific-investigative activity, in correspondence with current times. All of it permits, by raising professional qualification, charting new work strategies to college, career and educational departments.

A feedback process is conceived in order to verify the effectiveness of the implemented dynamics, from which the action is redesigned, which consists of the assessment of each of the structural components and the flexibility offered by the model to modify or alter components, according to the results obtained and the levels of satisfaction and update the actions: as the process of professional improvement progresses, each component of the model is updated, taking into account the transformations that have occurred in teachers.

Both in the training and in the workshops, the evaluation system is conceived from the participatory, active, reflective strategy of each group and individually, which favors the teaching orientation towards the writing of scientific texts in their construction and development. In this way, self-evaluation, hetero-evaluation and co-evaluation are applied interchangeably in the evaluative process, by maintaining the premise that the result is not focused on the individual, but on cooperated achievements. Likewise, each trainee self-evaluates his performance and level of individual improvement from the group. The presentation, analysis and discussion of the activity oriented in the fourth session is taken as the evaluative instrument of the training, which has as basic forms of evaluation, oral and written; It is discussed in the third workshop as a partial integrative evaluative instrument.

As feedback for the teacher, based on the improvements in each workshop, qualify the level of theoretical, practical and interest acquired in the short term.

In the scientific debate, the final evaluative activity is delivered. At the end of the debate, the questionnaire designed to evaluate the level of teacher satisfaction is applied.

Stage II. It continues with the preparation process for scientific writing from continuing training all staff career at medium and long terms.

Here the council direction, as the body responsible for assessing the process of improvement of teachers and scientist council faculty directed to monitor and validate scientific results, it must become the filter through which these results pass, after be approved by the teaching departments and in this way jointly analyze the contents that the

overcoming must contemplate for the continuity of the process, from the execution, control and evaluation by the teaching departments. It culminates in a new feedback process in order to verify the effectiveness of the entire process carried out.

DISCUSSION

From the study there were observed interesting results, but not oriented to learn doing, hence the need to work with procedures that frame the process of teaching and learning of scientific writing from the products of the activity of these teachers, as a means of fundamental education.

For these reasons, the model for the improvement of the writing of scientific texts from continuous training was designed, as the main theoretical value characterized by establishing links from the integration of structural and functional components, which enable the formative dynamics, by linking professional improvement and scientific-investigative activity, from the collaborative and dialogical as models of group teaching, to solve the existing contradictions between educational theory and practice, the demands for their implementation, as well as the ordering of the stages for their execution. This result responded to the breadth, complexity and diversity of information in the scientific writing process as an auxiliary means for predicting unobserved events that have been expressed, especially from the procedures.

The novelty of the proposal was specified in the planned procedure for the formative dynamics, where professio nal improvement actions were conceived, through organizational forms from the detection, correction and evaluation of the products of the teachers' activity (scientific texts) as a result of its scientific- investigative activity. The t eaching-learning process was conceived in group teaching models, aimed at learning by doing as a more efficient mode of action in the context of scientific communication ; this constit uted a new vision of the subject from the continuous training approach focused on transformer models that meet the needs of practice as a source of teaching, learning and professional development, where not only is part of the process of acquisition, but in order to expand and refine the demands for continuous updating of knowledge, skills and attitudes for professional development.

The model was particularized by learning by doing as a manifestation of developer learning through the detection, correction and evaluation of the products of its activity from the fusion of the individual-group with a predominance of this last component, the way used to achieve the improvement of knowledge, skills, attitudes and the process of continuity and prolongation of the preparation in which the teaching-learning process was framed.

With the level of learning, it was sought not only a grammatical correction erected in the study of norms related to the principles that govern the language code, but the norms related to the use of that code. Emphasis was placed on the area of meaning over structure as a basic principle of communicative teaching. From this perspective, the teaching focused interest in approaches and functional teaching of writing, rather than grammatical, because the essence is procedural to learn to write through understanding and prediction the different types of text from a composition process.

This approach, as a finding, had great significance in response to the formative dynamics in each organizational form

planned, which shows that, learning from the products of the activity by teaching models group developed extraordinary skills for coordinated action, you learn faster; the intelligence of the team exceeds that of its members. From this dynamic, a collective learning is achieved from the individual to achieve common, group and collective goals, it constitutes the way to integrate, share knowledge, experiences, expand, acquire and perfect the knowledge, skills and attitudes from the demands that guide and regulate the teaching-learning process for the writing of scientific texts for good work, where the necessary guidelines are established in terms of procedures and achieve the aspired transformation.

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Tamara Jiménez: Conception of the idea, general advice on the topic addressed, authorship coordinator, literature search and review, translation of terms or information obtained, preparation of instruments, compilation of information resulting from the instruments applied, drafting of the original (first version), revision and final version of the article, correction of the article, revision of the applied bibliographic norm.

Caridad Cancio López: preparation of instruments, application of instruments, and compilation of information resulting from the instruments applied, statistical analysis, preparation of the tables, graphics and images, preparation of the database, revision and final version of the article, revision of the applied bibliographic norm.

Antonio Hernández Alegría: general advice on the topic addressed, literature search and review, preparation of instruments, revision and final version of the article, revision of the applied bibliographic norm, correction of the article.