

Procedimiento para el tratamiento a la soberanía alimentaria en estudiantes de nivel medio de agronomía

Procedure for the treatment of food sovereignty in middle level agronomy students

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RESUMEN: La producción de alimentos, constituye una de las problemáticas que limita la satisfacción de las necesidades de alimentación a escala territorial. Este artículo trata esta temática desde su abordaje en el proceso formativo de los Institutos Politécnicos Agropecuarios; por lo que su objetivo está dirigido a diseñar un procedimiento para el tratamiento de la soberanía alimentaria en el proceso de formación profesional de los estudiantes de Agronomía. Se emplearon los métodos: análisis-síntesis, inductivo-deductivo, revisión documental y la modelación. Sus resultados permitieron concluir la necesidad de priorizar la atención a esta problemática por parte de la institución educativa.

Palabras clave: Soberanía alimentaria; Procedimiento; Proceso de formación

ABSTRACT: Food production constitutes one of the problems that limit the satisfaction of food needs at territorial scale. This article deals with this subject from its approach in the formative process of the Agricultural Polytechnic Institutes; therefore, its objective is directed to design a procedure for the treatment of food sovereignty in the professional training process of Agronomy students. The following methods were used: analysis-synthesis, inductive-deductive, documentary review and modeling. Its results allowed concluding the need to prioritize the attention to this problem by the educational institution.

Keywords: Food sovereignty; Procedure; Training process

Introduction

The production of food to meet the growing demands of society is today a matter of National Security, so the development of the agricultural sector is considered one of the priorities of the Cuban economy. This development requires a sustainable approach in the production process, to guarantee the improvement of the quality of life of the population, based on the efficient use of available resources, with the necessary protection of the natural environment.

The transformations of the National Education System require Technical and Professional Education to comply with its essential purpose of scientifically directing the technical and professional preparation of high school students, so as to favor the formation of a competent worker, in correspondence with the demands of the productive sector. That is why the process of continuous improvement of this educational level emphasizes guaranteeing the link of students to the locality, that they have mastery of the contents of the profession to adapt and assimilate the changes of agricultural technologies, which implies a greater educational influence of the labor entities and the socializing agents of the territory.

Agricultural Polytechnic Institutes must direct their actions towards ensuring that students appropriate a culture of production that will enable them to work on the basis of the appropriation of knowledge, skills, values and professional actions that will enable them to solve the problems associated with food production in order to generate food production capacities and thus contribute to the achievement of food sovereignty.

The limitations in the treatment of food sovereignty in the training process of the Agronomy technician, caused the application of a diagnosis, which made it possible to know the current state of this problem in the province of Holguin, and considered establishing the following indicators: 1) Level of integration of the educational institution with the social agents of the territory, and 2) procedures used for the treatment of food sovereignty in the training process, which allowed corroborating the insufficiencies and investigating their causes. The selected population consisted of nine polytechnic centers and the sample represented 66.6% of the population.

Methods used, at the empirical level: Observation, Document analysis, Survey and Interview, supported. From the theoretical level: Synthesis Analysis and Induction-Deduction, its application allowed to specify, as causes, the following:

- Insufficient use of a procedure that favors the treatment of food sovereignty in the training process.
- Limited link between the school and the different social actors to promote a professional performance in students, which allows generating food production capacities in the territory.

The treatment of food sovereignty as a problem addressed in this article led to the investigation of proposals aimed at addressing it as part of the agronomy technician training process. On the thematic, some scientific results stand out, among which are: (Daley, 2014) models the agronomist

technician integration to the local agrarian innovation; (Pérez, 2015) ponders the professional culture as a quality resulting from the professional training model of the agronomist technician; (Ricardo, 2019) models the agricultural education for the production of animal food. Food sovereignty is defined as:

The nation's capacity to produce food in a sustainable way and give access to the entire population to sufficient, diverse, balanced, nutritious, safe and healthy food, reducing dependence on external means and inputs, with respect for cultural diversity and environmental responsibility. (Frei, 2021, p. 13)

The analysis of the contributions made, allowed identifying certain cracks in the theory, which are associated to:

- Deficient conception of a tool for the treatment to food sovereignty in the training process to favor food production.
- The integration of the school with social actors to promote food production on a territorial scale.

The limitations in the treatment of food sovereignty, has as one of the ways of solution to a procedure. This proposal is structured through phases and operations that make possible the attention to food sovereignty from the training process.

Development

The procedure category has been addressed by different authors, among them are: Zilberstein and Silvestre (2002), González (2006), Alonso, Cruz and Moya (2020). In this sense, we share the ideas of the first two authors, who conceive the procedure as:

Complement of the methods tools that allow the teacher to instrument the achievement of the objectives, through the creation of activities, from the characteristics of the content, that allow him to guide and direct the student's activity in class and study. (Zilberstein & Silvestre, 2002, p. 14)

The content of the procedure for the treatment to food sovereignty in the training process of the student of the Agronomy specialty, values the principles provided by (Kabiri, 2013), namely:

- It focuses on food for the people.
- It values those who provide food.

- Locates food systems.
- Empowers locally.
- Develops knowledge and skills.
- Works with nature.

The procedure consists of four stages with their specific objectives, steps and actions that ensure compliance with its general objective, which is expressed as follows: to enhance the treatment of food sovereignty by teachers in the training process, so as to favor the performance of students to produce food on a territorial scale.

In the first step referred to the diagnosis of the treatment of food sovereignty in the training process, actions are presented in order to know the current state of the problem prior to the development of organizational actions. The second step, organization of the treatment of food sovereignty, concretizes the actions that allow the organizational management of food sovereignty prior to the implementation actions. The third step, related to the execution of the treatment of food sovereignty, specifies the actions that guarantee that the treatment is taken care of by the teachers in the training process and the fourth step associated with the evaluation of the treatment of food sovereignty specifies the actions that allow obtaining information on the results obtained during the implementation of the implementation actions, as well as the proposal of corrective actions to improve the process and its impact.

The procedure is described below.

First phase: characterization of the treatment of food sovereignty in the training process.

Specific objective: To know the current status of the treatment of food sovereignty. Through the actions conceived for its diagnosis.

The diagnosis of the treatment of food sovereignty in the training process of the agronomy technician is a process of searching and gathering information, which allows identifying the degree of development of the attitude towards work, professional problems and culture related to food production by the student together with teachers, tutors and other entities of the agricultural sector involved in this process.

Stage 1: diagnosis of the treatment of food sovereignty in the training process.

This stage, gives an extraordinary value to the characterization of the treatment to food sovereignty in the training process of the agronomy intermediate level student, through steps that allow to

diagnose its current state, which provides valuable information to conceive the procedure by considering its potentialities and weaknesses, not only of the training process, but also of the territory and social actors.

Steps:

- Formulation of the objective of the diagnosis of the treatment of food sovereignty.
- Selection, on the basis of the established indicators, of the content to diagnose the treatment of food sovereignty in the training context.
- Determination of the methods to be used for the diagnosis.
- Preparation of the diagnostic instruments.
- Selection of the participants in the diagnosis (students, teachers, managers and other social actors of the territory).
- Application of the instruments to the defined sample.
- Compilation and analysis of the data obtained from the application of the diagnostic instruments.
- Characterization of the agro-productive areas of the territory.
- Identification of strengths and weaknesses in the treatment of food sovereignty.

Second phase: projection of the treatment of food sovereignty in the training process.

Specific objective: To develop organizational actions that favors the development of the development stage.

In this phase, plans or projects are drawn up for action, which is an anticipated and systematic process that allows to implement the treatment of food sovereignty. In the projection and orientation of the same, previous steps are taken that serve as a basis to favor food production, starting from the optimization of certain means and resources necessary for its development.

Stage 2: organization for the treatment to food sovereignty.

Steps:

- Preparation of the participants in the diagnosis.
- Interaction with the local government working group responsible for food production in the territory.
- Determination of the means and resources needed to address food sovereignty.
- Meetings with leading families in terms of food self-sufficiency.

- Workshops on the implementation in the territory of the existing legal framework for food sovereignty.
- Exchange with actors responsible for food production in the territory and other new forms of food production management.
- Elaboration of a plan of activities involving all the social actors responsible for food sovereignty.
- Define the activities and their contents to address food sovereignty.

Third phase: Development of the treatment of food sovereignty in the training process.

Specific objective: To implement the treatment of food sovereignty, based on the execution of actions planned in this stage.

Stage 3. Execution of food sovereignty treatment.

This stage allows the treatment of food sovereignty through steps involving both the school and other social actors responsible for the student's education. These steps can take advantage of both curricular and extracurricular pathways.

Steps:

- Identification of the professional problems related to the production of food for animal use in the territory.
- Analysis of the main crops established in the territory to meet the demands of food production.
- Discussion on the development of the rural industry and its main productions.
- Exchange of experiences on the production of animal feed.
- Workshop on the management of different livestock species.
- Workshop on the management of water and soil resources in the food production process.
- Conference on the implementation of the Food and Nutritional Sovereignty Plan in the territory.
- Meeting with the local government to analyze the role of the Multi-stakeholder Management Platform and the Local Agricultural Innovation Group in promoting food sovereignty.
- Discussion on the management of local agricultural innovation for the solution of territorial problems related to food production.
- Exchange of experiences on family self-sufficiency with the participation of leading producers of the territory.

- Analysis of the use of renewable energies in food production.
- Analysis on the functioning of the productive chain in the agricultural sector to produce food.
- Introduction of research results dedicated to food production.

Fourth phase. Evaluation of the treatment of food sovereignty in the training process.

This stage has as content the analysis and follow-up of its results, as a consequence of the steps developed. The evaluation and feedback of the process takes into account the information and assessments of the previous stages, which allows to consider all the factors that may affect its development and to determine corrective actions.

Specific objective: To verify the results of the implementation of actions for the treatment of food sovereignty for their possible adaptation in the training process.

Stage 4: application of the instruments to evaluate the results of the food sovereignty treatment.

The steps in this stage make it possible to know the results obtained in the previous stage of implementation of the treatment to food sovereignty, so that appropriate measures can be taken to correct the actions developed and take into consideration the criteria of those involved. The steps described also allow knowing the impact of the procedure for the treatment of food sovereignty as part of the training of students.

Steps:

- Determination of the research methods to be used to evaluate the results of the food sovereignty treatment, once the actions have been implemented.
- Preparation of the evaluation instruments.
- Determination of the measurement criteria for each of the indicators established for the initial diagnosis.
- Securing the material resources and technology for processing the information obtained on the treatment of food sovereignty.
- Evaluate the results obtained, taking into consideration the potentialities and weaknesses still present.

Propose corrective actions to improve the treatment of food sovereignty and its impact on the educational, environmental and social order.

Conclusions

The treatment of food sovereignty, as part of the training process of the agronomy high school student, constitutes an important pillar in the achievement of a culture of the profession that favors a responsible action in the face of the permanent need to produce food, and thus satisfy the demands of the territory.

The procedure, through its stages, specific objectives, steps and actions, contributes to solve the inadequacies identified in the research in order to fulfill the objective set out in it. It makes it possible to address food sovereignty more effectively.

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