

# Comprehensive Rehabilitation Program for Hospitalized Schizophrenic Patients

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## Abstract

**Background:** mental health is a situation of general satisfaction. The hospitalized schizophrenic adult must receive comprehensive, biopsychosocial and spiritual rehabilitation. Objective: design the Comprehensive Rehabilitation Program for hospitalized schizophrenic adults.

**Methods:** descriptive study on the design of the program for patients with schizophrenia in long-stay services, for which a bibliographic review on the research topic was carried out. It was designed based on identifying the rehabilitation needs, the experience of the authors and other hospital specialists, as well as the results of consulted research.

**Results:** the program was designed to be applied for six months. It has a system of actions in the short, medium and long term. Its fundamental objectives are to promote the recovery and social inclusion of schizophrenic adults who remain hospitalized. It implies actions to promote autonomy, stimulate the development of healthy habits, establishment of personal relationships, social participation and future reintegration into the community with the improvement of symptoms.

**Conclusions:** a comprehensive rehabilitation program was designed for hospitalized schizophrenic adults, which may promote positive changes in patients. This program ensures that a greater number of patients reach levels of independence with cognitive, affective and behavioral improvement, as well as the positive and negative symptoms present.

**Keywords:** physical independence; schizophrenia; program; comprehensive rehabilitation

## Introduction

Mental health is defined by the World Health Organization (WHO), [1] as a situation of general satisfaction in which the person knows what his or her abilities are, is able to endure life's inconveniences, occupy oneself productively, and collaborate in your community. It is associated with promoting quality of life, prevention of mental health problems, comprehensive treatment and recovery of people. In patients with a long hospital stay, there is a deterioration in their abilities to interact in daily social life, which is reflected in the limitations they may have in carrying out Activities of Daily Living (ADL) [2]. The hospitalized schizophrenic adult must receive comprehensive, biopsychosocial and spiritual rehabilitation, with the aim of achieving physical independence in ADL and Instrumented Activities of Daily Living (IADL). It is necessary to cover the affective, cognitive and behavioral psychological sphere. Incorporating adequate

vocational guidance in these patients facilitates possible social reintegration in those with greater possibilities of adaptation to the environment [3]. There are health interventions aimed at schizophrenic adults, [4-7] including programs [8, 9]. They treat rehabilitation with a vision of comprehensiveness, but they do not develop them taking into account the cognitive, affective and behavioral as a whole, the majority focuses on the first aspect. The improvement of positive and negative symptoms based on achieving physical independence is not included.

In Cuba, the comprehensive rehabilitation service is maintained in hospitals and care centers for patients with mental disorders. Action protocols can be found according to the characteristics of each institution, but there is no unified, non-rigid program that guides this work. It is necessary to have ways to improve the physical independence of hospitalized adult schizophrenic patients. Rehabilitation programs constitute a set of activities aimed at promoting

mental health and the prevention, detection, treatment and rehabilitation of mental disorders. The gap identified in the set of research consulted, in combination with the purpose of the study, motivated this research. The authors set the objective: to design the Comprehensive Rehabilitation Program for hospitalized schizophrenic adults (PRIAEH) with improvement of positive and negative symptoms and the cognitive, affective and behavioral psychological spheres.

## Method

Descriptive study on the design of the PRIAEH. The recipients of the program are patients with schizophrenia who, for various reasons, do not have family support that allows their rehabilitation in the community, which is why they are admitted to the long-stay and forensic psychiatry services of the Provincial Teaching Psychiatric Hospital (HPDP) of Sancti Spiritus. The biological is integrated, which includes what is related to the clinical improvement of schizophrenia and concomitant diseases. Psychological influencing its three spheres, cognitive, affective and behavioral; social by giving a leading role to the family and directing actions towards future social reintegration. Spiritual when working on the elimination of stigmatization towards the disease. A bibliographic review was carried out on the research topic that included national and foreign literature. Books, doctoral theses, master's theses, original and review articles were considered. The research question was developed through the CPC format (Concept, Population and Context), [10] considering C (rehabilitation programs), P (schizophrenic adults) and C (hospitalized). The guiding research question was: could a comprehensive rehabilitation program

improve physical independence in hospitalized schizophrenic adults?

Google was used as the fundamental search engine. Articles were found in PubMed, Elsevier, Google scholar and SciELO. The inclusion criteria were articles in English, Spanish and Portuguese. That they could be accessed through the INFOMED Cuban Health Telematics Network. Published between 2019 and 2023 as they are the most current on the subject. Some articles prior to this period were included given the relevance of their content.

The articles had to clearly present the methodology and the selected theoretical framework. Those for which only the abstracts could be accessed or those that were not published in scientific journals were excluded. Editorial articles and clinical cases were also not included, as well as duplicates. To delimit the keywords, the thesaurus of Descriptors in Health Sciences (DeCS) was used. In the PubMed database, the thesaurus developed by the National Library of Medicine (NLM), called Medical Subject Headings (MeSH), was used. Search terms included keywords classified by language. The Preferred Reporting Items for Systematic Review and Meta-Analyses (PRISMA) flowchart was used to contribute to the formulation of the search strategy. Keywords were considered physical independence, schizophrenia, program, comprehensive rehabilitation. Boolean operators AND and OR were used to locate records of matching terms in the specified fields. The thematic analysis of contents was carried out, as well as the discussion of results with which comparisons, interpretations and evaluations of the authors were made, to present the results of the review. 172 articles and documents were found, 29 were selected. Figure 1 shows the flow of the search systematization.

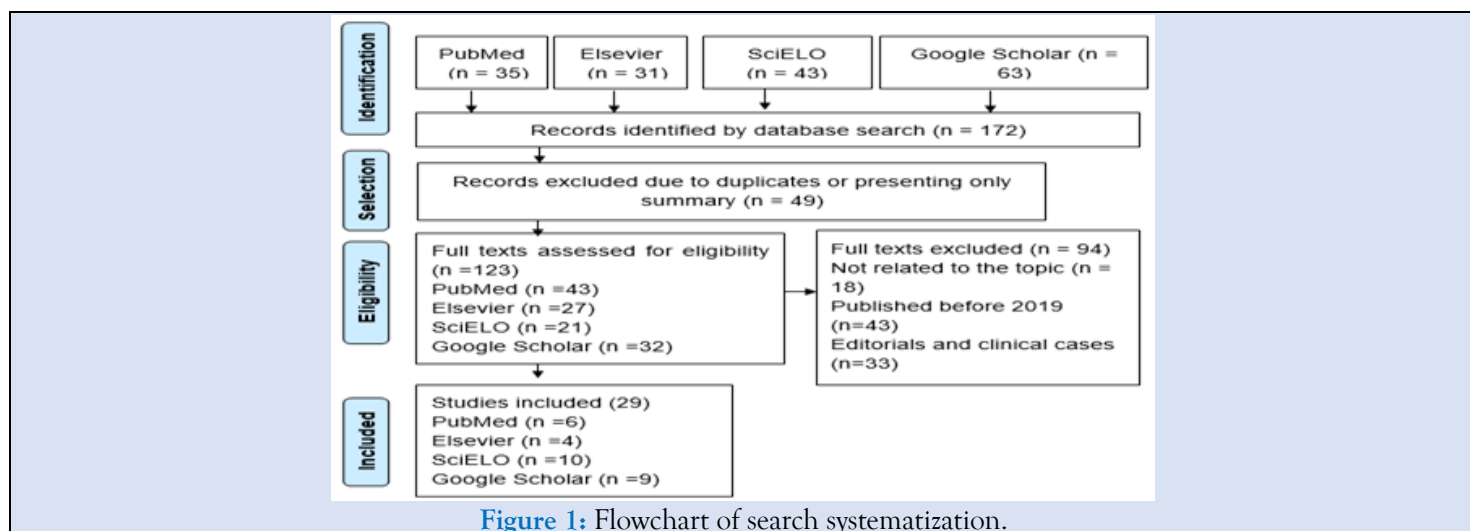


Figure 1: Flowchart of search systematization.

The study was analyzed and approved by the Ethics Commission of the Scientific Council of the Dr. Faustino Pérez Hernández Faculty of the University of Medical Sciences of Sancti Spiritus and by the Management of the executing center. The content of the program complies with the Declaration of Helsinki [12].

## Results

The program was designed to be applied for six months with the participation of the mental health team from the long-stay hospital services. The training of these teams is recommended based on the evaluation of the level of information they have on comprehensive rehabilitation for hospitalized schizophrenic patients. The program has a system of short, medium and long-term actions. Its fundamental objectives are to promote the recovery and social inclusion of schizophrenic adults who remain hospitalized, to fight against the stigma suffered by these people, to promote a life project for these patients. It implicitly includes actions to promote autonomy, promote information and training on rehabilitation for schizophrenic patients to family members and health personnel. Stimulate the development of healthy habits, establishment of personal relationships, social participation and future reintegration into the community. Improvement of symptoms with strengthening of the musculoskeletal system that promotes physical independence. The proposal contains actions with a coherent, systemic and holistic nature, which are incorporated as part of the center's work system. For its implementation, it is necessary to redistribute patients according to the degree of deterioration in correspondence with the rehabilitation levels [11]. All premises must have the characteristics established for this type of patients. Eliminate, as far as possible, architectural barriers with safety and adaptive measures established according to standards to avoid future disabilities or limitations.

With the proposed activities, the necessary social skills are trained and/or stimulated so that the person can function in the most appropriate and adapted way possible in order to achieve the most autonomous functioning, both in their immediate environment and in society. Among the main activities they propose to carry out are individual support, crisis management and actions to space them out. As the program progresses, vocational guidance is incorporated for a future job search. Leisure and free

time outings. The family is included and the formation and implementation of family support groups is proposed. Rehabilitation is planned based on the patient's evaluation, according to the skills and deficits to function independently and integrated in the hospital environment. The methods and procedures for achieving specific objectives with a specific time were taken as a basis. It includes the skills that the patient must learn and the way to learn them. The supports and resources of the environment are used, but they are also trained in how to face the demands of that environment. The actions and activities are in daily 45-minute morning sessions. Activities from lesser to greater complexity are gradually incorporated. Emphasis is placed on the physical independence of patients with affective, cognitive and behavioral improvement, as well as the symptoms of the disease. Activities are included to promote changes in lifestyle, habits and customs that delay the appearance of outbreaks and the disabilities that they could lead to in their evolution. Stimulates community participation in the identification and search for solutions to problems.

It was conceived with five main activities that include actions according to the established objectives. Different participation techniques are proposed to introduce the information necessary to achieve favorable changes. Ways are suggested to express in an experiential way the possible problems to be faced. It is always about raising their interest and desire to participate in different activities. Physical exercise and activities according to vocational inclination are applied to achieve cognitive improvements. Extra-hospital recreational activities are included as a stimulus for sustained patient participation. The activities emphasize the incorporation or reinforcement of hygienic dietary habits. It is recommended to use sheets, talks, audiovisuals, among others. Patients are diagnosed by psychiatric specialists [13, 14]. The Positive and Negative Symptoms Scale (PANSS) is applied [15] before and after the program in order to define the improvement in their symptoms. To evaluate the program, the patient's progress towards higher levels of rehabilitation is taken into account. It is necessary to give them participation so that they can issue their satisfaction criteria in relation to the program. It approaches the reduction of information processing alterations and cognitive deficit, to improve the ability to perceive reality. It approaches the advancement of coping strategies in important vital issues for the

patient. Developing problem solutions, expanding living space and progressing integration in important areas. The methodology for developing the program is based on comprehensive rehabilitation as a therapeutic, educational, training and social process, which seeks to improve the quality of life and the full integration of the person with a disability into the family, social and occupational environment. It is articulated in the development of functional, occupational and social skills.

The medication received by the patient is taken into account given the possible change they may experience. When treatment is readjusted, activities are stopped to achieve the necessary stability. Before starting the proposed actions, the modality to be used, ways to implement the different sessions, place where to carry out the activities as pleasant as possible for the patient, weekly frequency and duration are selected. The types of interventions are defined according to the established objectives. The forms to apply them, individual, group or family, as necessary. Patients' abilities are trained through psycho-pedagogical techniques (instructions, behavioral shaping, modeling, role playing, among others). Always taking into account the limitations that appear in cognitive processing, communication and social interaction skills. The demands increased as the therapy progressed. From a high structuring and task orientation, progress is made towards an increasing focus of group interactions. From a behavior initially directed by the therapist, progress is made towards a less directive attitude. The exercises are initially performed with neutral materials, without emotional burden for patients, which increases as the program progresses. The activities will be intense, systematic and continuous. The program applies for a period of six months. But it is recommended to maintain these activities periodically as reinforcement once it is completed. The skills acquired by the personnel in charge of caring for schizophrenic adults contribute to spacing out periods of institutionalization, as well as reducing medication and medical care. From the theoretical-practical point of view, scientific material is offered in the form of a program. For the control and evaluation of the program, it is taken into account whether the actions achieve support for the normalized development of bodily and psychological structures and functions, social relationships, emotions and emotional ties. You should be attentive when a patient shows disinterest or apathy in relation

to activities. The program is dynamic and the design can be modified according to the results, it is flexible.

## Discussion

Family therapy aims to psychoeducate its members in relation to the illness and the new needs of the patient. Rangel, [16] considers family participation to be effective in ensuring that the schizophrenic patient improves his or her state of health; these considerations are also shared by the authors. Coinciding with what Riba stated, [17] work on the needs of attention, memory and the management of emotions are fundamental. Also train the patient in their social skills, to avoid the risk of isolation and lack of affection. The inclusion of the patient in the world of work is key to their recovery. And not only so that it achieves a certain economic independence, but also to guarantee its comprehensive development. Vargas et al. [18] consider it very important to achieve trust between the patient and those who care for him, with which the authors of this research agree.

In Andalusia, significant positive changes have been achieved among people with serious mental disorders after applying a comprehensive care program to these patients [19]. The current proposal considers appropriate the possibility of including the patient in community job insertion programs focusing on psychosocial rehabilitation to improve the patient's adaptation to their workplace, always maintaining stable follow-up. Silva and Restrepo, [20] carried out a review where it is considered that when the hospitalized schizophrenic patient is rehabilitated, it is necessary to take into account their rights and possibilities. The PRIAEH seeks to achieve the same purposes. Thesis studies where the central theme has been the stigma towards schizophrenia, [21, 22] have found that patients are eager for a life without stigma, with security and affection. The programs applied to these patients must take into account the aforementioned aspects.

Rehabilitation includes self-management of medication and self-care, communication, recognition of symptoms, avoidance of harmful substance use, and social integration in the community. Authors such as Beltrán et al., [23] and Rodríguez, [24] among others, agree on the need to combine therapies that cover more than one affected area.

Studies have been carried out aimed at rehabilitating the affective deficit present in these patients. The Affective Recognition Program (TAR), [25] proposes



to improve the recognition of facial emotions, but does not address the behavioral and cognitive aspects. The fundamental objective when working on rehabilitation for hospitalized patients with schizophrenia is future social reintegration with a reduction in readmissions. To achieve this, it is necessary to ensure that these patients progressively achieve responsibility that involves them in the management and provision of services, based on their own experience in dealing with their mental health problems. Torres et al. [26]. achieved changes towards satisfactory results in terms of cognitive improvement in those studied. The current proposal is based on an integration of the three psychological spheres and is aimed at long-stay hospitalized patients.

The authors agree with Tortosa, [27] when they raise the need to carry out interventions according to the patient's needs, taking into account the positive and negative symptoms of the disease. According to the researchers, the improvement of the symptoms presented by these patients will be essential to achieve better social interaction.

It is necessary to know the degree of patient satisfaction and their subjective experience to predict compliance and help modify decision making [28]. When Calle's thesis is studied, [29] it is evident that patients with greater satisfaction in relation to the treatment received have better adherence to it. Patient satisfaction is an indicator of the quality of services and a predictor of cooperation with treatment. It has the limitation of not having its effectiveness endorsed in other institutions. It was designed based on the characteristics of the patients at the governing center. Despite this, the authors consider it to have the potential to be generalized.

## Conclusions

A comprehensive rehabilitation program was designed for hospitalized schizophrenic adults, which may promote positive changes in patients. This program ensures that a greater number of patients reach levels of independence with cognitive, affective and behavioral improvement, as well as the positive and negative symptoms present.

## Declarations

### Conflicts of interest

The authors declare that they have no conflicts of interest.

### Authorship statement

**Juan Carlos Mirabal-Requena:** conceptualization. Data curation. Formal analysis. Investigation. Project administration. Writing the original draft and Writing-review and editing.

**Belkis Alvarez Escobar:** conceptualization. Data curation. Writing-review and editing.

**José Alejandro Concepción Pacheco:** methodology. Validation. Writing-review and editing.

All authors agreed with the final report.

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