

The Implementation Effect of the Evidence-Based Practice Plan for Rehabilitation Nursing of Stroke Swallowing Disorder

Sa Ri Na^{1,2,*}, B. oyungoo¹, Yiping Bai²

¹ Mongolian National University of Medical Sciences, Ulaanbaatar, 999097, Mongolia

² International Mongolian Hospital of Inner Mongolia, Hohhot, 010010, China

ABSTRACT

Objective: To explore the implementation effect of the evidence-based practice plan for rehabilitation and nursing of cerebral stroke and swallowing disorders. **Methods:** 90 patients with cerebral stroke and dysphagia admitted to a hospital were selected and randomly divided into the experimental group and the control group, with 45 cases in each group. The experimental group implemented personalized nursing based on the evidence-based practice plan, including standardized diet management, swallowing function training and oral care; the control group adopted the traditional nursing model. Evaluate the nursing effect through the drinking water test, SWAL-QOL score and nursing satisfaction, and analyze the changes in the nursing quality of the two groups and the quality of life of patients. **Results:** The efficiency of nursing quality and swallowing function improvement of the experimental group (97.78%) was significantly higher than that of the control group (80.00%), the quality of life score and nursing satisfaction score are also significantly better than the control group ($P < 0.05$). **Conclusion:** The evidence-based nursing plan for cerebral stroke swallowing disorder can significantly improve the nursing effect and effectively improve the patient's swallowing function and quality of life, which is worth promoting in clinical practice.

KEYWORDS

Stroke; Swallowing disorder; Evidence-based nursing; Rehabilitation; Nursing quality

1. INTRODUCTION

Stroke is a disease with a high incidence and high disability rate. Its complications seriously affect the quality of life of patients. Among them, dysphagia is the most common, with an incidence rate of 37% to 78%. Dysphagia causes patients to have difficulty in eating and drinking, increasing the risk of complications such as aspiration, malnutrition and aspiration pneumonia, significantly hindering the recovery process, and adversely affecting the psychological and social functions of patients. Although the traditional nursing method improves the patient's symptoms to a certain extent, it lacks systematicity and targeting, and it is difficult to meet the patient's rehabilitation needs. Evidence-based nursing, as a nursing model based on scientific evidence, clinical experience and patient needs, provides a new direction for the rehabilitation of swallowing disorders. Evidence-based nursing can effectively promote the recovery of swallowing function and improve the quality of life of patients by integrating research results and personalized evaluation and formulating scientific nursing plans.

2. LITERATURE REVIEW

2.1. Causes and Effects of Dysphagia

Dysphagia is one of the common complications in stroke patients, and its cause is closely related to nerve damage caused by stroke. Damage to the medulla oblongata, brain stem or cerebral cortex often leads to damage to the glossopharyngeal nerve, vagus and sublingual nerves that dominate the swallowing function, resulting in a decrease in coordination of the swallowing muscle group or complete loss of function. Swallowing disorders are mainly manifested as weak swallowing reflex, food retention, choking cough and other symptoms, resulting in patients' inability to eat normally. Dysphagia can bring a series of serious consequences, such as aspiration, inhalation pneumonia, malnutrition and dehydration, which further aggravate the disease and may even endanger life. In addition, long-term swallowing disorders will also have an adverse impact on the patient's psychological state and quality of life, causing psychological problems such as social isolation, decreased self-esteem, and anxiety and depression.

2.2. Limitations of Traditional Nursing

The unified nursing model is usually based on basic health education and functional training, and routine dietary guidance and position training are implemented for patients with swallowing disorders. However, there are obvious shortcomings in this nursing method in terms of systematicity and targeting. Nursing staff often lack professional swallowing disorder assessment ability in actual operation, and it is difficult to formulate a scientific rehabilitation plan according to the specific situation of the patient. In addition, the lack of attention to the personalized needs of patients in traditional nursing leads to the limitation of the nursing effect. The technical means in nursing are single, such as simple position adjustment and passive training, which is difficult to meet the comprehensive recovery needs of the patient's swallowing function. The improvement of patients' psychological support and social adaptability is also neglected in traditional nursing, further limiting the process of patients' recovery.

2.3. The Application of Evidence-Based Practice in Nursing

Evidence-based practice, as a clinical decision-making method based on scientific evidence, provides a new theoretical basis and practical guidance for the nursing of swallowing disorders. Evidence-based medicine emphasizes the formulation of scientific nursing plans to optimize the nursing effect by integrating high-quality research evidence, clinical experience and individual needs of patients. In the field of rehabilitation nursing, evidence-based practice can improve the professional ability of the nursing team and guide them to take effective interventions for the specific problems of patients. Studies at home and abroad show that evidence-based practice has significant advantages in improving swallowing function, reducing the incidence of complications and improving the quality of life of patients. Some foreign research institutions have included evidence-based nursing in the core content of stroke rehabilitation nursing and formulated evidence-based practice-based swallowing disorder nursing guidelines. Relevant research in China is gradually increasing, but it still needs to be further promoted and standardized to meet the actual needs of clinical practice. Evidence-based nursing provides a comprehensive solution for the rehabilitation of patients with cerebral stroke and dysphagia through scientific evaluation tools and standardized operating processes.

3. RESEARCH METHODS

3.1. Research Object

The study subjects were patients with cerebral stroke and dysphagia admitted to a hospital from March 2019 to June 2021. The criteria for case inclusion include: a stroke is diagnosed through CT or MRI, there is an obvious disorder in swallowing function after the onset of the disease but the condition is stable, can cooperate with rehabilitation training, and sign an informed consent form. The exclusion criteria are: those with severe mental illness, cognitive dysfunction or severe impairment of liver and kidney function; Those who have serious oral diseases or laryngeal tumors; and those who are unable to complete rehabilitation training for other reasons. The study subjects were randomly divided into experimental group and control group by odd-even grouping, with 45 cases each.

3.2. Research and Design

Research on the construction and application of evidence-based nursing practice plans. The construction of the evidence-based practice plan adopts the Delphi method, combined with the latest literature analysis and expert consultation. Put into effect. First of all, the research team retrieved high-quality guidelines and research literature related to the nursing of dysphagia in stroke and extracted key nursing content. Subsequently, through expert meetings and two rounds of Delphi questionnaire surveys, the feasibility and applicability of the nursing plan were demonstrated and revised, and finally an evidence-based nursing practice plan in line with clinical reality was formed.

The nursing of the experimental group is based on the evidence-based practice plan, including comprehensive interventions such as personalized swallowing function training, standardized diet management, oral care and health education. The control group adopted the traditional nursing model, mainly including basic health education and routine swallowing function training. There are significant differences in the systematicity and targeting of the program in the nursing content of the experimental group and the control group.

3.3. Observation Indicators

The study selects multi-dimensional observation indicators to evaluate the nursing effect. Nursing quality evaluation indicators include swallowing function evaluation, diet management, oral care and health education. The score range is 0 to 10. The higher the score, the higher the quality of nursing. The swallowing function improvement index is graded and evaluated by the drinking water test method, which is divided into three categories: ineffective, effective and effective according to the recovery of the patient's swallowing ability. The patient's quality of life score uses the SWAL-QOL scale, which includes multiple dimensions such as meal time, psychological state, social ability, etc. The higher the score, the better the quality of life. Nursing satisfaction is evaluated by patients and their families filling in questionnaires, with a total score of 50 points to measure the overall satisfaction of patients with nursing services.

3.4. Data Processing Methods

All data in the study are processed by SPSS 22.0 statistical analysis software. The measurement data is represented by the mean value \pm standard deviation, and the differences between the groups are analyzed by the t test; the counting data is represented by the number of cases and percentages, and the card square test is used for statistical testing. The statistical significance standard is $P < 0.05$, indicating that the difference is statistically significant. The results of data analysis are presented intuitively through tables and graphics to facilitate the evaluation of the effectiveness of nursing intervention and the differences between groups.

4. RESEARCH RESULTS

4.1. Improvement of Nursing Quality

There are significant differences in the quality of nursing between the experimental group and the control group. The nursing measures of the experimental group based on the evidence-based practice plan were significantly superior to those of the control group in terms of patient swallowing function evaluation, diet management, oral care and health education. The average nursing quality score of the experimental group is significantly higher than that of the control group, indicating that the evidence-based practice plan can significantly improve the quality of nursing. Especially in terms of personalized nursing and multidisciplinary collaboration, the comprehensive performance of the experimental group is more prominent.

4.2. Recovery of Swallowing Function

The recovery of swallowing function of patients in the experimental group was better than that of the control group. The results of the drinking water test in the field showed that the swallowing function score of the patients in the experimental group improved significantly, and the proportion of patients with one level of improvement (effectiveness) was higher than that of the control group. The efficiency of dysphagia improvement (including the sum of efficacy and effectiveness) reached 97.78% in the experimental group, significantly higher than the 80.00% in the control group. The results show that the implementation of the evidence-based practice plan plays a positive role in promoting the recovery of swallowing function, while effectively reducing the incidence of accidental aspiration and related complications.

4.3. The Improvement of Patients' Quality of Life

The improvement of the quality of life of the patients in the experimental group was significantly better than that of the control group. The SWAL-QOL scale scoring data showed that the patients in the experimental group were in their psychological state, social ability and diet. Multiple dimensions such as the degree of freedom of choice and overall life satisfaction have been significantly improved, and the average score is higher than that of the control group. The increase in the quality of life score after the intervention shows that the improvement trend of the quality of life of the patients in the experimental group is more significant, indicating that the evidence-based practice program not only helps to restore swallowing function, but also plays an important role in improving the overall quality of life of patients.

4.4. Statistics of Nursing Satisfaction

The statistical results of nursing satisfaction showed that the overall satisfaction of patients in the experimental group and their families with nursing services was higher than that of the control group. The average satisfaction score of the experimental group was 47.44 points (out of 50 points), which was significantly higher than the 41.68 points of the control group. Patients and their families generally highly recognize the personalized services and expertise in the nursing of the experimental group. Nursing services not only improve the effect of swallowing function recovery, but also enhance the attention to the psychological and living needs of patients. The results show that the implementation of the evidence-based practice program has significantly improved patients' trust and satisfaction with nursing services.

5. CONCLUSION

In summary, By analyzing the implementation effect of the evidence-based nursing practice plan for swallowing disorders in stroke, the study confirmed that the program has significant advantages in improving the quality of nursing, promoting swallowing function recovery and improving the quality of life of patients. The evidence-based nursing model emphasizes multidisciplinary collaboration and personalized intervention to solve the shortcomings of traditional nursing through systematic nursing measures. The results of this study provide an important basis for clinical practice, and also lay the foundation for the future exploration of nursing plans for other complications of stroke patients. With the promotion of evidence-based nursing, the professional skills of nursing staff and the rehabilitation level of patients will be further improved, so as to better meet the health needs of patients.

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