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On the Psychological Analysis of Surgical Children with Perioperative Multimedia Animation in Digital Operating Room

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Abstract: To discuss Psychological analysis of surgical children with perioperative multimedia animation in digital operating room. Methods: 120 pediatric perioperative patients were included in the criteria for the psychoanalysis of pediatric perioperative patients using digital operating theatre multimedia animation techniques. In this study, 120 perioperative pediatric patients were randomly selected and randomly divided into observation and experimental groups, including 60 patients in each group, with all patients enrolled in 202 1. 3-2022. 3 Patients were admitted; the observation results of preoperative psychological visits and intraoperative nursing management were compared between the two groups. Result: Preoperative visit; the statistical analysis for the comparison between the observation group and the experimental group was conducted by S PSS (P <0. 05); Intervention control data analysis using two groups of intraoperative video playback, music playback, and home accompaniment (P <0. 05); The observation group and the experimental groups performed psychoanalysis, infusion coordination, anesthesia coordination, and resistance analysis, respectively, and the experimental group (P <0. 05) was better than the observation group.

Key words: Multimedia Animation; Psychoanalysis of Perioperative Child Patients

Introduction

Digital operating room adopts Internet information technology and video processing technology to display all patient information in the best way, so that relevant surgeons (surgeons, anesthesiologists, surgical nurses) can easily and quickly access to comprehensive medical treatment, patient information and image information support, provide accurate surgical information and smooth information exchange, provide a more accurate, safe and efficient working environment for the whole operation, combined with the advantages of digital operating room perioperative multimedia animation playback, can effectively relieve children's psychological tension.

1. Information and methods

1. 1 Basic data

In this study, 120 children admitted to our hospital during 2021. 3-2022. 3 were selected as the study subjects, and 120 patients were selected for this study with surgical indications according to the inclusion criteria of the information system computer. Researchers visited children about anxiety, depression, health. Presurgery, and the children's families will receive health education during the perioperative period. The psychological nursing analysis of intraoperative nursing management observation was randomized into control and intervention groups with 60 patients hospitalized from 2021. 3-2022. 3, comparing the effect of care between the two groups, no difference between the two groups, p> 0. 05. Inclusion criteria: children with surgery, children, anxiety, depression, crying, normal communication skills, previous medical experience, and type of surgery Exclusion criteria were: Cognitive impairment and mental disorders; Visual and hearing impairment; Withdrawn

2. Methods

Control group: preoperative health education, intraoperative vital signs monitoring, including close monitoring of patients' vital signs and education, drug care and other measures. Intervention team implementation: preoperative psychological care, humanistic care, intraoperative management, specifically as follows:

Preoperative visit: perioperative nursing staff need to give preoperative notice to visit patients, correctly check the child's information, operation method, operation date, anesthesia method, and evaluate the child's vascular condition.

Intraoperative nursing: the observation of vital signs. Children's preferences, nursing staff can play multimedia cartoons and cheerful music, create a lively atmosphere, attract attention, to avoid the noise of the equipment affect the child's mood. When giving children venipuncture, encourage children to face it bravely, give positive encouragement, and encourage mobile nurses and family members to give psychological support. When children's tension is effectively relieved, it provides helpful help for anesthesia induction and promotes the smooth progress of surgery.

3. Observation indicator

The HIS system computer by the operating room mobile nurse to fill in the operating room nursing record form, and randomly read the data in the background for statistics. Preoperative publicity and education work; the observation group and the experimental group conducted statistical analysis of the intervention control; The intervention of intraoperative video playback, music playback and home accompaniment in the two groups was controlled by computer background data analysis, including psychological analysis of the two groups, infusion coordination, anesthesia cooperation and resistance. SPSS2 analyzed and processed the obtained data using the 3. 0 statistical software, and represented the tests using the measured data (±) at P <0. 05 χ. The results of the study are as follows:

Preoperative task The intervention and control groups compare two data P <0. 05.

Table 1 Preoperative scale

Group	Missionary attitude	Contents of publicity and education	Mode of publicity and education
intervention group	9.01±0.56	8.85±0.73	9.07±0.52
control group	8.33±0.76	8.27±1.08	8.14±0.79
t value	7.890	4.873	10.771
p value	0.000	0.000	0.000

Intraoperative video playback, music playback, home accompaniment intervention group, and the control group were compared with a P <of 0. 05.

Table 2 Intraoperative scale

Group	video playback	Music Playerback	Family accompanying	total score
intervention group	2.28±0.47	2.41±0.39	2.35±0.38	7.04±1.24
control group	2.03±0.37	2.12±0.35	2.06±0.42	6.21±1.14
t value	4.578	6.062	5.608	5.397
p value	0.000	0.000	0.000	0.000

The observation group and the experimental group conducted psychoanalysis, infusion coordination, anesthesia coordination, and resistance analysis, respectively, and the experimental group (P <0. 05) was better than the observation group.

Table 3 Postoperative scale

grouping	Number of examples	Infusion fit	Anesthesia coordination	Degree of resistance	Incidence
Experimental group	60	1	1	0	2 (3.33)
Observation groups	60	3	5	1	9 (15.00)
X^2					6.9818
P					<0.05

4. Discussion

For emotionally unstable children into the operating room into the operating room, there will be resistance, especially in nursing staff venipuncture, because children crying anxiety, through quality monitoring data table in the process of intravenous infusion make full use of his, NMIS, NIS system data, help to regulate the infusion behavior of nurses, constantly improve the quality of intravenous infusion, to ensure the safety of patients. [5]During the perioperative period, the implementation of health education for children's patients and their families, the use of multimedia animation, music playback, and parental accompaniment will help children avoid negative emotions, effectively improve patient satisfaction with caregivers, and have a significant positive impact on promoting daily work. Playing cartoons before the induction of pediatric anesthesia can effectively stabilize children's mood and ensure the safety of anesthesia.[6] In the perioperative nursing work, the application of intelligent system can effectively improve the quality of nursing. [7]According to the different temperament characteristics of the children undergoing the operation. the families of the children undergoing the operation should be guided to adopt targeted education methods, and encourage them to have a positive side and avoid a negative side. [8]Multimedia animation perioperative playback intervention has an obvious treatment effect on the surgical children, which can effectively relieve the psychological tension of children, is conducive to the smoothprogress of the anesthesia induction process, and has a certain application value, and is worth promoting.

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