

## Nursing Observation and Discussion of Primary Nephrotic Syndrome Complicated with Hyponatremia in Children

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**Keywords:** Nephrotic syndrome, Hyponatremia, Nursing observation

**Abstract:** objective: To explore the nursing needs of children with primary nephrotic syndrome complicated with hyponatremia, observe the nursing situation, and explore the effective nursing form to help children recover as soon as possible. Methods: 60 cases with primary nephrotic syndrome complicated with hyponatremia admitted to our hospital were selected for clinical analysis. The data of the children were collected and randomly divided into the control group and the observation group, with 30 cases in each group. The control group received routine nursing, the observation group received comprehensive nursing, and the observation group received synchronous clinical nursing. The incidence of clinical proteinuria, hypoproteinemia, high edema and hyperlipidemia in the two groups was compared. The effectiveness of nursing was compared, and the satisfaction of the family members of the children after nursing was compared. Results: After a period of synchronous nursing, the vital signs of the children were relatively stable, the incidence of macroproteinuria, hypoproteinemia, high edema and hyperlipidemia was lower than that of the control group, and the effectiveness and satisfaction of the observation group after nursing were higher than that of the control group. There was a significant difference in the comparative analysis between the two groups ( $P < 0.05$ ). Conclusion: Children with primary nephrotic syndrome complicated with hyponatremia, the clinical problems are more complex, should consider the nephropathy and hyponatremia in children, analysis of the specific manifestations of nephrotic syndrome, take the form of comprehensive nursing, to achieve the effect of comprehensive nursing.

### 1. Introduction

Children with primary nephrotic syndrome is not a single disease, but is a state of concentration of pathology, children in the event of a cold, or after the hot summer is mosquito bites, preliminary characterized by edema, urine bubble, and then may extend the pathological area, cause children edema skin area is increased, a typical performance of primary nephrotic syndrome. Clinical examination and the patient's immune function, circulation factor, cell structure, such as associations, also want to combine the manifestation of children with treatment, should comprehensively consider the situation of children in care, analysis of children showed a variety of conditions, after the complicated with hyponatremia, should pay attention to a number of nursing coordination, pay attention to clinical indicators, considerate care comparisons.

### 2. Materials and Methods

#### 2.1 General Materials

60 cases with primary nephrotic syndrome complicated with hyponatremia admitted to our hospital were selected for clinical analysis. The data of the children were collected and randomly divided into control group and observation group. The control group received routine nursing, the observation group received comprehensive nursing, and the observation group received synchronous clinical nursing. The pathological examination of the children were all minor lesions. No other complicated serious diseases; The children had no surgical history. No secondary disease

type; No side effects were found.

## 2.2 Methods

**Routine care:** Understanding of children with early symptoms, analysis of whether children appear obvious other discomfort, anorexia, eyelid edema, retinopathy, abdominal pain, muscle wasting, know whether children with edema may shift over time, sports, and understanding of children with edema part, observation with nails, urine condition, accordingly, to communicate with doctors, children don't need to stay in bed, and family members about children, children with primary nephrotic syndrome complicated with hyponatremia disease appears to be more severe, but some children can self-healing, is not serious illness, Children with severe edema can use hydrochlorothiazide, spironolactone (anasetong), furothamide diuretic, and should pay attention to whether the urine characteristics of the children have changed after diuretic according to the doctor's advice. Salt supply 1 ~ 2g/d, and the limit can not be lifted until the condition is in remission. The amount of sodium supplement can be calculated, 1/3 to 1/2 of the calculated amount of sodium supplement can be calculated within 24 hours, and then supplemented after review.

**Comprehensive care:**

(1) As prescribed static drops of 3% hypertonic saline, should check the serum sodium concentration after 20 minutes, minutes after check the serum sodium concentration, according to the doctor's advice analysis whether to repeat hypertonic saline infusion, when reach a certain level elevated serum sodium (5 mmol/L) symptoms improved, can communicate with the doctor analysis instead of 0.9% hypertonic saline brine, and maintain a stable blood sodium. Hypertonic salt should be used to measure serum sodium every 4 hours.

(2) Protein intake should be controlled in the range of 1.5 ~ 2.0g/kg per day. Pay attention to supplementation of various vitamins and minerals, such as vitamin B, C, D, P, folate, calcium, zinc, etc. Children may suffer from loss of appetite after the intake of sodium and salt is restricted. Attention should be paid to the diversification of diet to ensure that children's diet is in line with the normal level.

(3) In order to prevent infection, explain to the family members of the sick child to reduce the number of visits to and from the sick child, so as to avoid the bacteria brought by the family members who swarm to visit the sick child. Disinfection should be paid attention to every day in the ward, and corner disinfection should be checked. Once the sick child is infected, the sick child should be isolated.

(4) Male children may be found in the scrotal area edema, at this point should use cotton pad scrotal support, reduce friction, edema after the skin damage, can be daub iodide. Observe the side effects of drugs, according to the doctor's advice should be appropriate to supplement calcium, to avoid osteoporosis in children, in the application of diuretics, should pay attention to whether the cause of venous thrombosis in children, the regulation of children's electrolyte, but electrolyte disorders and other adverse effects, should stop diuretics. Children should drink more water during treatment.

(5) To reassure children, if children show is irritable, depressed, should communicate with children, according to the children with the usual expression, dialogue, let the children to the hospital environment gradually rise, and then can pat the patient's back, use warm hand touch with hair, reduce the distance with children, families of xuwen children with the usual performance, etc., to understand children with symptoms of disease cause, combined with the children's clothes, such as facial expressions and assist families with children to do a good job of warmth, comfort, to strengthen the family health care knowledge.

## 2.3 Observation Indicators

The incidence of clinical proteinuria, hypoproteinemia, high edema and hyperlipidemia in the two groups was compared, and the effectiveness of nursing was compared. If the patient's body fluid was normal, nutrition was balanced, no infection, no potential complications, and no anxiety in the two groups, it was considered effective. If the child after nursing more body fluids, nutritional deficiencies, potential infection, no serious complications, a little anxiety is considered effective. If

the child presents with excessive body fluid, malnutrition, risk of infection, complications, anxiety as invalid care. Compare the satisfaction of family members after nursing.

Sodium supplementation amount (calculated by extracellular fluid) :

Sodium chloride (g) =[normal blood sodium (mmol/L) - measured blood sodium (mmol/L)]× body weight (kg) ×0.2/17

(male) should be supplemented with 3% sodium chloride =[142- patient's blood Na<sup>+</sup> (mmol/L)] × body weight (kg)×1.1666

(female) should be supplemented with 3% sodium chloride (ml) =[142- patient's blood Na<sup>+</sup> (mmol/L)] × body weight (kg)×3.311

## 2.4 Statistical Method

Choose SPSS intelligent analysis system, building database according to material properties and analogy unit observation data, the hypothesis is tested samples with  $X^2$ , covered by the statistical mean, geometric mean and the median involves the quantity take t test,  $\bar{x} \pm s$  (mean+ \_standard deviation) for the average standard deviation of plus or minus, P as the probability value, contrast there were significant differences between groups,  $P < 0.05$ , contrast there is no difference between groups ( $P > 0.05$ ).

## 3. Results

After a period of synchronous nursing, the vital signs of the children were relatively stable, and the incidence of macroproteinuria, hypoproteinemia, high edema and hyperlipidemia was lower than that of the control group as a whole. The effectiveness and satisfaction of the observation group after nursing were higher than that of the control group, and there was a significant difference in the comparative analysis between the two groups ( $P < 0.05$ ).

Table 1 Clinical Adverse Physiological Characteristics of the Two Groups of Children

group	n	proteinuria	hypoproteinemia	height edema	hyperlipidemia	total rate
the observation group	30	1	0	0	1	7%
the control group	30	2	1	1	0	13%
$X^2$	-	2.147	2.365	3.452	3.845	3.125
P	-	<0.05	<0.05	<0.05	<0.05	<0.05

Table 2 Nursing Efficiency of the Two Groups

group	n	excellent	effective	noneffective	effective rate
the observation group	30	18	10	2	93%
the control group	30	17	7	6	80%
$X^2$	-	2.412	2.845	2.314	2.645
P	-	< 0.05	< 0.05	< 0.05	< 0.05

Table 3 Satisfaction Scores Of Family Members of Children in Two Groups during Nursing Care [n(%)]

group	n	satisfied	generally satisfied	dissatisfied	satisfaction rate
the observation group	30	17	12	1	29(97%)
the control group	30	15	10	5	25(83%)
$X^2$	-	3.245	4.125	3.265	3.745
P	-	<0.05	<0.05	<0.05	<0.05

## 4. Discussion

Cause children with primary nephrotic syndrome is usually not enough clear, clinical performance mainly for edema, through the blood in the urine, auxiliary examination, in different courses of hormone therapy form, at the same time pay attention to nursing in infection prevention,

blood sodium correcting, diet control and psychological comfort, but from the perspective of comprehensive, more detailed analysis of the children with clinically apparent and latent performance, to corresponding symptoms in children with primary nephrotic syndrome complicated with hyponatremia. According to the data of this survey, after comprehensive nursing care, the observation group of children with large proteinuria, hypoproteinemia, high edema, hyperlipidemia accounted for 7% of the total, the control group of children with large proteinuria, hypoproteinemia, high edema, hyperlipidemia accounted for 13%. At the same time, the effective rate and satisfaction rate of family members of the observation group were higher than that of the control group. There was a significant difference between the two groups ( $P<0.05$ ). Clinical proof should be accordingly with families of children with metasomatism condition problem, get family members to cooperate, after positive for children with monitoring vital signs, and pay attention to the drug side effects observed during the treatment, in order to adjust the dose, or stop, replace drug, avoid stretching out the other bad problems during treatment, combined with daily life habits, nutritional supplements, sodium in diet restrictions, combined with the change of the diet taste add dietary diversity, encourage children to normal intake of nutrition in the treatment and prevention of infection to strengthen disinfection and examination of the ward, the combination of children with edema area protected, etc., help adjuvant therapy, Improve clinical treatment effect.

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