

Research Progress of Integrated Chinese and Western Medicine in Treating Pediatric Hydrocephalus

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Abstract: through the relevant data of pediatric hydrocephalus literature retrieval and research, and observed in practice using the method of combining Chinese and western medicine treatment children water clinical effect, summarizes the key pathogenesis of pediatric hydrocephalus is spleen and kidney deficiency, on the basis of the treatment in western medicine, with TCM syndrome differentiation, combined acupuncture and massage treatment, clinical curative effect is remarkable, worthy of application.

1. Introduction

Pediatric hydrocephalus results from obstructive hydrocephalus caused by factors such as intracranial tumors and intracranial infection, which is also seen in the cerebellar subtonsillar hernia and the fourth ventricle. So too much secretion of cerebrospinal fluid or its absorption and circulation disorder is the root cause of hydrocephalus in children. Few children with hydrocephalus, especially young patients, with the increase of the head circumference and the development of the body, improve the body function, the secretion of cerebrospinal fluid, absorption and circulation reached the dynamic balance, a few children for the damage of the body function is not heavy, the function of brain tissue development can compensate loss, also can achieve clinical self-healing, but only a few, and still have a serious risk after a period of time [1]. A proportion of patients with intracranial infection or venous sinus injury. Hydrocephalus symptoms appear, but with the cure of the infection or the reconstruction or recovery of venous return, the hydrocephalus symptoms will recover from themselves, which is also a small probability event. Obstructive hydrocephalus caused by intracranial space occupying can also heal itself after removing the obstruction factors, but they all belong to small probability events. Therefore, in the treatment of hydrocephalus, Western

medicine pays great attention to surgical treatment, many of which are the most common for ventricle to abdominal shunt surgery, with a good prognosis. But for infants, surgical operation and postoperative care are very difficult, postoperative complications such as postoperative infection, postoperative shunt blockage, postoperative bleeding and other problems have been difficult problems for many surgeons

2. Traditional Chinese Medicine Etiology and Pathogenesis

Children's hydrocephalus is also known as congenital hydrocephalus, ancient doctors called craniocerebral solution, ancient doctors also summed up the distribution and characteristics of pediatric hydrocephalus, concluded that children's hydrocephalus seems to be raised fontanelle, sunset, truthfully evil brain, in fact, mainly to spleen and kidney deficiency. In the Huangdi Neijing, it is said: "Life, strong and soft, weak and strong.[1] "Parent endowment also determines the endowment of the child, if the parents usually weak, poor blood deficiency, qi and blood deficiency, or young muscles and bones underdeveloped, male kidney qi, women are not weak, pregnant, or old half, day Gui failure, energy loss, or fertility, excessive consumption, or pregnant women in recuperation, fatigue, etc. can lead to the cause of excessive hydrocephalus. The main bone of the kidney, and the brain is the pulp sea, kidney gas is insufficient, so the transpiration and gasification of body fluid is weakened, water fluid stopped in the brain [2]. Children's congenital endowment deficiency leads to spleen deficiency, but the water is only afraid of soil, so the water is not restricted, then the sun does not rise, cloudy Yin does not fall on the brain, the formation of hydrocephalus. Other causes of hydrocephalus in children, such as sputum drinking, blood stasis and evil toxicity and other factors, are not caused by spleen and kidney deficiency. The kidney bone and pulp, and the brain is the pulp sea, if the kidney gas is insufficient to promote body fluid, but the blood homologous, so the blood is unable to promote, will lead to stasis stagnation brain body, blood is unfavorable body fluid is not biochemical, so water and qi overflow. This disease generally belongs to the deficiency identification, to fill deficiency, to real evil.

3. Pathogenesis of Western Medicine

Western medicine believes that hydrocephalus in children is caused by obstructive hydrocephalus caused by intracranial tumor and intracranial infection, which can also be seen in the cerebellar subtonsillar hernia and the fourth ventricle. Therefore, too much secretion of cerebrospinal fluid or cerebrospinal fluid absorption and circulation disorder is the root cause of pediatric hydrocephalus [3]. Few children hydrocephalus, especially young patients, with the increase of the head circumference and body development, the body function, the secretion of cerebrospinal fluid, absorption and circulation reached the dynamic balance, few children for the body function damage is not heavy, brain tissue function can compensate loss of function, also can achieve clinical healing, but only a few, and after a period of time is still increase the risk of [4]. A proportion of patients with intracranial infection or patients with venous sinus injury. Hydrocephalus symptoms appear, but with the cure of the infection or the reconstruction or recovery of venous return, the hydrocephalus symptoms will heal by themselves, which is also a small probability event. Obstructive hydrocephalus caused by intracranial space can also heal itself after relieving the obstructive factors, but they all belong to small probability events. Therefore, in the treatment of hydrocephalus, Western medicine pays great attention to surgical treatment, and in many of them, the most common is ventricle to abdominal shunt surgery, with a good prognosis of However, for infants, surgical operation and postoperative care are very difficult [5]. Postoperative complications such as postoperative infection, postoperative shunt blockage, postoperative bleeding and other problems have been difficult problems for many surgeons.

4. Traditional Chinese Medicine Treatment

In Chao Yuanfang's "source of various diseases", there is a detailed description of children hydrocephalus, "solution, its shape of children are old, brine should meet but not agree, head seam is also". Hua Tuo, a doctor of the Three Kingdoms period, also recorded the prescription for treating children's hydrocephalus in Tibet: "Take xin, cinnamon branches, ginger as the end, blend women's milk, and apply to children's anterior brine. According to traditional Chinese medicine, children with hydrocephalus is mainly caused by kidney gas loss, including Yin deficiency, pulp heat, qi and blood loss or stored in blood stasis, wind, phlegm, dampness and other [6]. It seems that the disease position is in the brain, but it is closely related to the spleen and kidney, especially to the kidney and spleen. Treatment should be treated from the spleen and kidney. Kidney method: when kidney qi and kidney Yin together, also to benefit water detoxification, the drugs used mainly include ripe rehmannia, rehmannia, turtle jia, turtle jia, gelatin, rhino horn, poria, pig cocos, Ze diarrhea, yam, virgin, walnut kernel.

The method of promoting blood circulation and removing blood stasis: seen in the lack of kidney qi, blood weakness or Yin deficiency and blood stasis, on the basis of tonifying kidney qi and Yin, add peach kernel, safflower, Salvia miltiorrhiza, Dilong, Chuanxiong and Angelica. Warm kidney and spleen method: this method to invigorate the spleen and water, with warm kidney method to supplement congenital and acquired, the drug composition is self-prevention, pepper, cassia branch, Atractylodes, yam, astragalus, Poria cocos, ginseng, chicken gold. Pediatric hydrocephalus TCM clinical symptoms are relatively complex, and the individual situation of each patient is different, to combine their own situation, the use of special treatment, kidney loss and kidney, spleen deficiency and spleen, qi loss and qi, the appropriate medicine can play an effective treatment effect.[7]

5. Western Medicine Treatment

If the baby's development of the baby's body is not mature, resulting in cerebrospinal fluid secretion, circulation and absorption disorders, a very few clinical children with hydrocephalus can recover by themselves, without any treatment. If they can't recover by themselves, conservative treatment will be taken. Few clinical children with hydrocephalus can relieve their symptoms with diuretics or dehydrators, but most conservative treatment is used as adjuvant treatment for surgery. The commonly used drugs are: (1) inhibit cerebrospinal fluid secretion drugs: such as acetanitamide. (2) Diuretics: furosemide. The above methods should be preferred for people with mild hydrocephalus under the age of 2, and about 50% of patients can control the condition. (3) Osmotic diuretics: sorbitol and mannitol. After that, western medicine is very good at and is the most common treatment method, surgical treatment. Children with hydrocephalus may be due to intracranial deformity, spinal deformity and other reasons, for such patients must deal with the cause of the patient with hydrocephalus, clinically called to the etiology of surgery. There is also a cerebrospinal fluid shunt operation, which can be diverted to other parts of the body, such as one draining to the abdominal cavity. Moreover, neuroendoscopic gastrostomy surgery. Due to the small risk and remarkable clinical effect, neuroendoscopic gastrostomy is the mainstream choice of pediatric hydrocephalus at present.[8]

6. Integrated Traditional Chinese and Western Medicine Treatment

Although the key to pediatric hydrocephalus lies in the spleen and kidney, the opening, water, meridian, accumulation is still the treatment principle. On this basis, use Chinese medicine to improve the symptoms of hydrocephalus, and prevent recurrence from the root of the disease. At the same time, acupuncture and massage to dredge meridians, blood circulation and gasification

blood stasis. Acupuncture treatment is the first simple acupuncture method, generally head needle and body needle, at first recommended once a day, 10 times for a course of treatment, two courses, can be changed to 2 to 3 times a week, head needle needle time can be extended to 1 hour, body needle generally 20 minutes to 30 minutes, children's body needle can not leave a needle. The second is the warm moxibustion method, the commonly used acupoints are four Shencong, Shenque, Guan Yuan, Baihui, waterway, three Yin intersection and so on.[9]

Acupuncture treatment can also be selected according to the corresponding syndrome, such as heat poison accumulation, needle prick Ze point, qu chi point puncture bleeding; kidney Yin deficiency increases vertebra, Fengchi, Wangfu, Yinlingquan and other acupoints. After needle twist three times, twist small amplitude, needle after the first shallow after deep,[10] heavy light 1 time, the direction of the meridians, so repeated three times after the needle, each acupuncture, add pinch back 3 times (from the tail-sacral part to the shoulder back this piece), because patients are children, so technique to light, gestures to slow. Massage treatment: because the patient is children's technique is generally light, to hands, feet and three Yang meridian and pulse, the head more temple, puzzle. Massage 5 times a week for 20 minutes and 20 times a month for 40 minutes each. The main techniques are as follows:

- (1) Fill the kidney 200 times, and fill the spleen 200 times.
- (2) Press and knead the wind pool and the wind house temple for 5 minutes.
- (3) Children take the prone position, adults to the lower thumb (fish point) from top to bottom repeatedly gently knead the spine about 20 times.[11]

(4) Ruad the Yongquan point of foot shaoyin kidney and the Sanyin intersection point of foot yin spleen 50 times each. At the same time, internal cerebral Kangling capsule, can effectively prolong the time of paroxysmal convulsions, and have an open effect on capillaries. The simultaneous treatment of traditional Chinese and western medicine has significantly increased the curative effect, alleviated the pain of children, and improved the treatment effect of hydrocephalus.[12]

7. Conclusions and Discussion

Children's hydrocephalus generally belongs to the evidence of the virtual standard, the clinical versatile surgical treatment is actually more leakage, but more do not consider its essence is virtual, so the prognosis is poor. If the combination of traditional Chinese and western medicine is adopted, the specimen can not only solve the secretion, circulation, absorption and balance of cerebrospinal fluid, but also improve the physical weakness, mental state, movement and language dysfunction caused by hydrocephalus. The clinical cure effect is remarkable, which can be generally accepted by patients, reducing the trouble caused by the disease and the contradiction between doctors and patients, and achieving the ultimate goal of clinical treatment by giving full play to the respective advantages of Chinese medicine and western medicine.

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Data Availability

Data sharing is not applicable to this article as no new data were created or analysed in this study.

Conflict of Interest

The author states that this article has no conflict of interest.

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