

Observation on the Effect of TCM Syndrome Differentiation and External Therapy in Treating Pediatric Pneumonia

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Abstract: Pediatric pneumonia is a common disease in pediatric respiratory diseases. The main clinical manifestations are dyspnea, pulmonary rales, shortness of breath and coughing. According to clinically documented data, the incidence of pneumonia in children continues to rise. Compared with comprehensive Western medicine treatment, traditional Chinese medicine treatment of children with pneumonia has obvious advantages. External treatment of traditional Chinese medicine is simple, highly compliant and does not have any adverse reactions. This paper elaborates on the study of TCM treatment of children with pneumonia.

1. Introduction

Pediatric pneumonia is a common pediatric respiratory disease. The occurrence of this disease can occur at any time, and it is more common in winter and spring. The clinical manifestations of pneumonia in children are mainly fever, shortness of breath, difficulty in breathing, and fixed wet rales in the lungs. With regard to the discussion of pediatric pneumonia, Chinese medicine theory records asthma as a pneumonia and has a serious impact on the health of children. The conventional western medicine treatment methods are mainly antibiotics and antivirus. With the widespread use of antibiotics in the clinic, drug resistance continues to increase, and side effects caused by dysbacteriosis are more common in the clinic. Based on this, the adjuvant role of TCM in the treatment of children with pneumonia emerged gradually, which can significantly improve the clinical effect, and the adverse reactions are small, can effectively make up for the deficiencies in Western medicine treatment, and has obvious advantages [1].

2. Application of TCM Syndrome Differentiation and External Therapy in the Treatment of Pediatric Pneumonia

2.1 Sticking

Sticking is the preparation of plasters or powders of different Chinese herbal medicines under the guidance of traditional Chinese medicine theory, followed by direct application to the skin, lesions, and acupoints. From the effect of clinical practice can be understood, the effect is significant, easy to operate, and very few side effects. It can play the role of dredging the meridians, correcting evil spirits, promoting blood circulation, and reconciling qi and blood. The application of traditional Chinese medicine in clinical practice is actually a combination of the overall concept, meridian theory, and acupoint function. However, in the clinical treatment of pneumonia in children, it is necessary to increase the attention, children's delicate skin, young age, extracellular fluid is very rich, resulting in the application of Chinese medicine is very easy to penetrate into the local skin, through the meridians and Blood flesh reaches the whole body and exerts its efficacy. During treatment, the use of traditional Chinese medicine application can stimulate acupoints, thereby mobilizing the effectiveness of the meridians, and plays a role in regulating the yin and yang of the organs. In the study of the clinical effects of traditional Chinese medicine dressing, some scholars used chest paste scattered, its main ingredient is Glauber's salt and rhubarb. Apply the chest patch to the location of the lung wet rales in children with pneumonia. 3d was a course of treatment. After 2

courses of treatment for children, it was found that the children's wet rales had been significantly reduced, which gradually decreased, and the chest radiographs absorbed the inflammation of the children, improved the clinical effect, and effectively shortened the course of treatment. Another scholar used Xie San powder on the back of the child's back voice more obvious position, the child's wet voice completely disappeared in 72h. The results of the treatment showed that the disappearance time and cure rate of wet rales were significantly ($P < 0.05$). According to the results of clinical studies, Chinese medicine application can regulate the immune of children, improve their lung function, and has a significant effect in relieving cough and asthma. The application of topical therapy can effectively increase the level of interferon in children and significantly increase the non-specific resistance of children [2].

2.2 Cupping

The canister is used as a therapeutic tool to evacuate the gas in the tank by squeezing and burning. As a result, negative pressure is generated and the stimuli are generated in the affected part, acupoints, etc. of the affected children to form local irritations and congestion [2]. Cupping has the effect of enhancing physical fitness, adjusting the yin and yang balance of the human body, and correcting evils. The coughing sound of the child disappeared, and the bronchial sound and lung sounds were also eliminated. The cure rate reached 100%. In addition, some scholars' further research confirmed that the use of cupping therapy in children with pneumonia did not produce adverse reactions, and the average length of stay was significantly shorter than the routine treatment of Western medicine. From the results of various clinical studies, cupping can significantly improve the clinical efficacy of pneumonia in children, and can also improve the cellular immunity and humoral immunity in children with higher clinical value.

2.3 Massage

Massage is a common treatment in Chinese medicine. Massage uses direct pressure, pinching, kneading, punching, shaking, pulling, pushing and other methods to directly act on specific parts of the human body surface. The use of this treatment can play a role in reconciling qi and blood, clearing the meridians and sliding joints, and at the same time it can also improve the immune system of children. Some scholars in the study of massage treatment of children with pneumonia, the control group using conventional treatment, the observation group on the basis of the use of massage treatment, compared the clinical efficacy of the two groups of children, the observation group of children with a total treatment efficiency of up to 97%, The therapeutic efficacy of the control group was only maintained at about 76%, and the treatment effect of the observation group was significantly higher than that of the control group ($P < 0.05$). Some scholars used Chinese medicine massage to treat children with pneumonia, and found that the disappearance time of pulmonary rales of children treated with massage was shorter than that of the control group ($P < 0.05$). According to the effect of clinical treatment, it can be understood that massage treatment does not produce any side effects, and has a significant effect on improving the clinical symptoms of children and promoting the rehabilitation of children. The use of traditional Chinese medicine retention enema and massage treatment of children with pneumonia, the efficacy of the treatment group compared the risk of treatment was 98%, while the control group treatment efficiency was less than 90%, the difference was statistically significant ($P < 0.05$).

2.4 Enema

Enema treatment measures need to use the catheter from the anus rectum to insert the colon perfusion solution, in order to achieve the treatment of defecation exhaust. This treatment can stimulate gastrointestinal motility in children, soften, remove feces, but also can exert oxytocin, dilution of intestinal toxic substances and cooling and other effects. The use of enema to treat children can also achieve drug treatment, nutrition and moisture treatment purposes. The lung and the large intestine, the use of traditional Chinese medicine enema treatment has a very important role in children with pneumonia. In the course of clinical studies, some scholars used detoxification liquid decoction retention enema treatment of children with pneumonia. The results of treatment

showed that the clinical manifestation and signs of children in the observation group disappeared more quickly than those in the conventional treatment group, and the IgA, IgM, IL-2, IgG indicators were significantly higher than before treatment, and the differences were statistically significant. Further research and analysis, some scholars use pneumonia mixture rectal drip irrigation treatment of children with pneumonia. After one week of treatment, the clinical efficacy of the observation group was significantly higher than that of the control group ($P < 0.05$). The mean treatment time in the observation group was significantly shorter than that in the control group ($P < 0.05$). Meng Junfeng uses traditional Chinese medicines, namely mulberry 10g, Huangqin 4g, batch 11g, almond 12g, Codonopsis pilosula 16g, flax 6g, Bupleurum 12g, and licorice 7g, add water to 200ml, use enema to treat children with pneumonia.. Comparing the effects of clinical treatment between the two groups of children, the cure rate in the observation group was 96%, and the cure rate in the control group was controlled at 84% ($P < 0.05$); meanwhile, the indexes of the two groups were compared. During the duration, the fever in the observation group, disappearance of lung rales, and disappearance of X-ray shadows were all shorter than in the control group. The enema of Chinese medicine can avoid the disadvantages of the poor entrance, and it will not affect the gastrointestinal tract of children, and the adverse reactions are small and the clinical effect is significant, which can significantly improve the clinical symptoms of children [3].

2.5 Percutaneous

Percutaneous is actually a treatment that combines medication, electrotherapy, hyperthermia, and moxibustion. Such treatment measures need to be made of traditional Chinese medicine paste, stick it to the skin acupuncture points, prompting it under the action of the current pulse, through the skin into the local heat, and expansion of capillaries, into the local tissue or systemic blood play a drug effect. Using this method of administration, it can prevent the first-pass effect of the drug in the liver, reduce the blood drug concentration, reduce the individual differences in children as much as possible and the toxic and side effects of this treatment method are very small, and the drug can penetrate into the local skin. Through this directional, quantitative, and ranged approach, drugs are promoted into pathological tissue and trachea, enter the blood circulation, and achieve the purpose of local and systemic treatment. When researching and analyzing transcutaneous treatment of pneumonia in children, Liang Qingyu and Wang Xiaowei introduced it into children through transdermal delivery. It was found that the clinical symptoms of the observation group with this treatment measure were significantly improved, and the body temperature rapidly returned to normal. The cough disappeared. Judging from the actual situation of clinical treatment, its clinical effect is significantly greater than conventional treatment measures, and the difference is statistically significant ($P < 0.05$). And the transdermal drug delivery method can avoid the adverse reactions caused by direct administration, and the safety factor is relatively high.

3. The Efficacy Evaluation

After 1 course of treatment, the clinical efficacy of the 2 groups was evaluated. Cure: Cough, expectoration, fever and other symptoms completely disappeared, chest X-ray showed lung shadows and plaques completely disappeared, returned to normal; markedly: cough, expectoration and other symptoms were significantly improved, normal body temperature X-ray shows lung Department of texture thickening, shadow (plaque) significantly improved or almost disappeared; Effective: cough, expectoration and other respiratory symptoms improved, body temperature returned to normal, X-ray showed shadow, plaque has improved; invalid: respiratory symptoms There was no improvement in X-ray and body temperature, or the condition deteriorated [4]. Total Effectiveness = (Cure + Significant + Effective) / Total Cases \times 100%.

Pediatric pneumonia is a high incidence of respiratory tract, long duration, very detrimental to the healthy growth of children, but the current treatment of pure Western medicine is not ideal, so more studies began to explore the reliable treatment of pediatric pneumonia in the field of traditional Chinese medicine [5]. Based on the concepts of TCM syndrome differentiation and internal disease management, this hospital summarized the characteristics of childhood pneumonia

and compiled a set of TCM syndrome differentiation combined with external therapies to make TCM intervention model more comprehensive. This article carried out a multi-center clinical observation of the above-mentioned TCM intervention model study. The results showed that the total effective rate of the observation group after one course of treatment was significantly higher than that of the control group, indicating that TCM syndrome differentiation combined with external therapies improved the clinical curative effect and helped to improve The prognosis of children.

Table 1 Comparison of clinical efficacy in 2 groups

Groups	Cure	Significantly	Effective	Invalid	Total Efficiency
Observation group	9(30.00)	9(30.00)	10(33.33)	2(6.67)	93.33*
Control group	5(16.67)	7(23.33)	10(33.33)	8(26.67)	73.33

Note: Compared with the control group, * P < 0.05

The motherland medicine believes that visceral gas in children is not filled, susceptible to exogenous pathogens and heat, while in children with thinning lung tendons, susceptible to heat, phlegm, sputum blocking the airway, leading to lung gas is not declared and depressed resistance, the formation of "Pneumonia Asthma". Pediatric pneumonia is a category of "pneumonia and cough" in children, but due to different pathogenesis, it needs to be treated with syndrome differentiation. Domestic literature studies suggest that the type of cold-cold lung and wind-heat-closed lung type are the common types of acute pneumonia in children, and the recovery period is mainly based on deficiency of lung and spleen qi and deficiency of yin deficiency and lung heat. Therefore, this study is based on this stage of syndrome differentiation treatment. In order to further improve the effect of intervention of traditional Chinese medicine, this article also increased the external treatment method, using Asarum, Brassica alba, ginger and other warming and active medicine, and promote the absorption of effective pharmaceutical ingredients by microwave, expand the effect of warming the lungs and clearing the meridians. Some domestic reports found that the use of Hua Ga San and Maxing Shi Gan Decoction in the treatment of children with pneumonia has good anti-inflammatory and anti-infective effects. It can improve the inflammatory infiltration of the alveoli and reduce organ injury, especially maintaining good lung function. Avoid breathing difficulties (failure), asphyxia, and hypoxemia. In addition, this article also found that the use of TCM syndrome differentiation combined with external treatment after the incidence of adverse reactions did not increase, we can see that the safety of the therapy is reliable.

In summary, pneumonia in children is treated with TCM syndrome differentiation and external treatment. The clinical efficacy is reliable and there are few adverse reactions. The use of this therapy should be promoted. Due to the limitations of research conditions, this study did not conduct a detailed analysis of the efficacy of TCM therapy. It is still necessary to conduct a multi-faceted study on its dominance in order to confirm its exact clinical effect.

4. Conclusion

From the perspective of clinical medical theory, external treatment of traditional Chinese medicine has a very significant effect on enhancing lung function, reducing lung inflammation, and regulating immune function in children. It is very difficult for children to take oral medicine. External treatment of traditional Chinese medicine is very simple, easy to use, can reduce the difficulty of oral medication. Practice shows that the clinical effect of TCM treatment of children with pneumonia has a significant clinical effect.

References

- [1] Jiang Zhiyan, Zhang Chaoqun. Pediatric pneumonia syndrome and tongue evolution[J]. Practical Journal of Traditional Chinese Medicine, 2012, 8(5): 409 - 411.
- [2] Xiao Yu, Jiang Zhiyan, Xu Binbin, et al. Traditional Chinese medicine stage differentiation

combined with external treatment of children with pneumonia in multi-center clinical observation [J]. Journal of Zhejiang University of Traditional Chinese Medicine, 2013, 8(6) :688-690.

[3] Sun Qiang. TCM Syndrome Differentiation Combined with Western Medicine Intervention in Pediatric Pneumonia Randomized Parallel Control Study [J]. Practical Journal of Internal Medicine of Traditional Chinese Medicine, 2014, 10(12): 76 - 78.

[4] Zhang Zhaoxia. Observation of the effect of TCM Syndrome Differentiation and External Therapy in Treating Pediatric Pneumonia[J]. China Practical Medicine, 2015, 11(29): 169 - 170.

[5] Yang Yan. Study on Optimized Treatment Plan and Efficacy Evaluation Method of Pediatric Respiratory Syncytial Virus Pneumonia in Traditional Chinese Medicine[D]. Nanjing: Nanjing University of Chinese Medicine, 2009.10(12): 56-59.