Pathogenesis and Treatment Progress of Chronic Pharyngitis

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Abstract: Chronic pharyngitis is a common disease of the pharynx, with complex etiology, long course, high recurrence rate, stubborn symptoms, and seriously bothering patients. This paper combines the research progress of chronic pharyngitis at home and abroad, and provides new ideas for the treatment of chronic pharyngitis from the perspective of epidemiology, pathological mechanism and the current situation of traditional Chinese and Western medicine treatment. The combination of traditional Chinese medicine and western medicine in the treatment of chronic pharyngitis has made up for the deficiencies, developed its strengths, and has a remarkable effect, which is worthy of clinical promotion and application.

Keywords: Chronic pharyngitis, Mechanisms, Treatment, Western.

1. Introduction

Chronic pharyngitis belongs to the category of “laryngeal paralysis” in traditional Chinese medicine, which is a common disease of the five senses, the symptoms are slight redness, swelling, slight pain, slight pain, slight stinging, infarction, or accompanied by morning nausea, laborious speech, more phlegm or less phlegm, and some people may have pharynx dryness; Signs are diffuse inflammation of the lymphoid tissue of the pharynx, with capillaries of the mucus membrane of the posterior pharyngeal wall (gymnic veins) or thick and bright red or thin and dark red. Chronic pharyngitis accounts for 30% of patients with outpatient OTOL clinics[1], which is mainly caused by acute pharyngitis being mistreated and mistreated, or recurrent attacks, or taking a large number of antibiotics to injure the spleen and stomach. As environmental pollution increases year by year, the incidence of chronic pharyngitis also increases. Its etiology is complex, the course of the disease is long, the symptoms are easy to repeat, and it is difficult to completely cure and cure, which seriously affects the patient’s work and life.

2. Epidemiology

The research of foreign scholars mainly focuses on group A streptococcus pharyngitis (GASP), especially group A b streptococci, which has been reported by Indian scholar Kumar[2]. In the United States, 7000,000 to 11,000,000 people visit the clinic for chronic pharyngitis each year. In China, the incidence of chronic pharyngitis is extremely high due to special eating habits, work pressure, occupational exposure, environmental pollution and the abuse of antibiotics. Liu Jinghui[3] After observing 1100 people undergoing health examinations, the incidence of chronic pharyngitis in the population under observation was as high as 78.65%; Wu Yishan[4] The epidemiological survey of chronic pharyngitis of 769 highway workers in Guangdong Province showed that the total prevalence rate was more than 40.3%, indicating that chronic pharyngitis has a high incidence in China, especially in cities with poor air quality and high work pressure. Although the use of new energy sources is now advocated, environmental pollution cannot be ignored; As a result, it brings a lot of troubles and pain to the majority of patients, and occupies more medical resources.

3. Mechanism of Chronic Pharyngitis

3.1 Modern Medicine

The etiology of chronic pharyngitis is complex, infectious and non-infectious, and acute pharyngitis is not cured for a long time, driven by chronic infectious factors, it slowly turns into chronic pharyngitis. Bacteria parasitize the mucosa of the posterior pharyngeal wall for a long time, and the microbiota is in dynamic equilibrium, causing an inflammatory reaction to the mucosa of the posterior pharyngeal wall when the flora is disturbed[5-6]. These include bacterial infections, flora disorders, nasal chronic pharyngitis. Pathogenic bacteria with bacterial infections dominated by group A streptococcus play a primary role in the development of chronic pharyngitis. Many researchers have found that patients with chronic pharyngitis have significant resistance to oral broad-spectrum antibiotics[7], so they should not be given blindly during treatment. Zhang Li[8] found through research that most of the microorganisms in the pharynx of patients with chronic pharyngitis are conditionally pathogenic bacteria, which can lead to pharyngitis when they have an advantage. The important causes of chronic pharyngitis are pathogenic microbial infection and dysbacteriosis, which can lead to disorders of the pharyngeal mucosal ecosystem. Prolonged abuse of antibiotics can exacerbate dysbacteriosis. Nasal chronic pharyngitis is when secretions from inflammation of the nasal cavity, sinuses, and inflammation of the nasopharynx irritate the mucosa of the posterior pharyngeal wall can lead to chronic pharyngitis. Noninfectious factors include occupational exposure to OSAS, throat reflux, and allergic disease. Patients with obstructive sleep apnea hypopnea syndrome breathe open mouths, causing excessive dryness of the pharyngeal mucosa[9] causing pharyngitis. Occupational exposure, long-term exposure of migrant workers to dust, stimulation of various chemicals, excessive use of voice by teachers, and teachers have also been exposed to dust in the past. Can directly or indirectly irritate the throat, leading to an inflammatory response to the posterior
pharyngeal wall. After the contents of the gastroesophageal tube are regurgitated to the throat, irritation to the mucous membrane can cause symptoms such as foreign body sensation in the pharynx, nausea and vomiting.

3.2 Traditional Medicine

The throat is a top-down passage of the qi machine, which is the key to the meridian circulation. In the twelve meridians, except for the pericardial meridian of the hand and the foot sun bladder meridian, both indirectly or directly reach the throat. Pharynx: anterior oral cavity, lower through the stomach intestines, for the gastric system - division diet swallowing, auxiliary pronunciation; Larynx: upper through the mouth and nose, lower to the lungs, for the lung system - breathing, making sounds. Chronic laryngeal paralysis is mostly false evidence, developed from acute laryngeal paralysis, and the basic pathogenesis is “one yin and one yang knot”. Traditional medicine believes that wind, heat, epidemic, and alien invasion of the throat cause acute onset, repeated attacks of diseases, loss of yin fluid, false fire burning throat, and cause lung and kidney yin deficiency; Acute laryngeal paralysis is incurable and mistreated, the nature of the day after tomorrow is weak, the foot is dissolved, the transport is weak, the initial stage can cause phlegm to stagnate, and the phlegm becomes viscous for a long time, called old phlegm, phlegm coagulation throat; Poor mood, depressed liver qi, stagnant sputum condensation, phlegm mutual knotting “plum core qi”, also known as pharyngeal paraesthesia. The current textbook believes that chronic pharyngitis is often stasis, or stasis due to sputum, or stasis due to depression, and sputum stasis is intertwined.

4. Treat

4.1 Western Healing Therapy

Chronic pharyngitis caused by bacterial infection Li Meng et al.[10] Gentamicin nebulized inhalation is used to inhibit glucococcus aureus while promoting the discharge of secretions to achieve anti-inflammatory effects and alleviate clinical symptoms. Zhou Mingyu et al.[10] In the treatment of chronic pharyngitis, oral vitamin B210mg oryzanol 20mg silver yellow containing tablets 2 tablets 3 times/d combined with posterior pharyngeal lymph follicular plasma hypothermia ablation for 1 week/day, the effective rate of chronic simple pharyngitis was 98.38%, and the effective rate of chronic hypertrophic pharyngitis was 90.00%. Treatment of pharyngeal itching as brush strokes or ant-like sensation is mainly allergic pharyngitis with dry cough, Wang Chunyan, Wen Xiaohui, etc.[11] with leukotriene receptor antagonists combined with antihistamine drugs such as Montelustena 10 mg qd, before bedtime, cetirizine 10 mg or imidazostine 10 mg qd, before bedtime; Licorice tablets 3 tablets, tid, the treatment cycle is 2 weeks. Symptoms resolved further than in week 1 at week 2 of treatment. Zhong Hua et al.[12] used microwave heat coagulation for the treatment of chronic hypertrophic pharyngitis, during which it was treated once every other week, and recorded on the second day, 1 week and 2 weeks of treatment, respectively, with a cure rate of 66.7%; Zhu Yanping[13] Had obvious efficacy in treating gastroesophageal reflux disease with chronic pharyngitis as the main manifestation. Zhang Ning et al.[14], the total effective rate of the treatment of acute and chronic laryngitis with ceftameterate combined with slow and severe lime pharyngitis tablets was 95.35%, and ceftameter ester hindered the formation of intact cell walls by inhibiting the cross-linking of mucopeptide chains during cell wall synthesis of bacteria, thereby achieving antibacterial and anti-inflammatory effects. Wang Wanli et al.[15] Chronic pharyngitis can be treated with adenosine triphosphate injection, dexamethasone injection, ribavirin injection, etc. to seal the suprapharyngeal nerve seal with the median point of the hyoid bone horn and the midpoint of the suprapharyngeal cartilage nodule as the closing point, which can improve throat symptoms and have better efficacy.

4.2 Traditional Medicine Treatment

Traditional medicine has its unique advantages in the treatment of chronic pharyngitis, including traditional Chinese decoctions, proprietary Chinese medicines, external treatments, internal and external combination therapy, as well as some traditional folk remedies, which have good effects. The clinical efficacy of Traditional Chinese medicine treatment is good, and the specimens are taken into account, and it has been widely used in the clinic and has achieved outstanding results.

Traditional Chinese medicine internal treatment focuses on the overall concept, dialectical treatment, Pan Guofeng, etc.[16] Through meta-analysis, it was found that the use of Yangyin lung soup (oral liquid) alone or combined conventional therapy improved symptoms significantly compared with conventional treatment. Xue Xiaoming, Li Hao, et al.[17] found that the treatment of chronic pharyngitis hepatic depression with hanging golden lantern soup in patients with hepatic depression fire evidence not only had excellent clinical efficacy and low recurrence rate than the pure application of blue qian oral solution group and budesonide atomization group, but also had a certain degree of irritability and emotional depression in patients. Tang Xixi[18] Half-summer Magnolia soup achieved excellent results in the treatment of patients with chronic pharyngitis, with significant short-term effects, and the advantages of anti-inflammatory and recurrence prevention, and optimized the treatment outcome. Zhang Muran et al.[19] believe that chronic pharyngitis is mostly related to spleen deficiency, and use Yiqi ShengQing Li Pharyngeal Soup plus or minus to treat chronic pharyngitis specimens, and achieve outstanding clinical efficacy. Li Weihe et al.[20] believe that chronic pharyngitis is related to the lungs and spleen, and treat chronic pharyngitis with shaliujunzitang alloy boiling grass powder, and the lung and spleen are treated together, with a total effective rate of 92.0%; The total effective rate of the control group given buckwheat flakes was 72.9%.Topical TCM treatment includes blowing medicine (ice boron powder, tin powder, pearl yellow powder), containment (golden throat treatment, liushen pill, iron flute pill), steam inhalation (sanhua atomization liquid, fresh bamboo drainage), smoking method, pus removal method, vomiting method, external medication application; Acupuncture. Ren Yimei, Xiong Xiaowei and others[21] Minimally invasive therapy for the treatment of patients with chronic pharyngitis (sputum clotting and blood stasis) once a day, once every other day, continuous treatment for 7 days, with an effective rate of 90.0%. Tian
Zhonghui, Zhang Shanshan, et al.[22] believe that the throat is closely related to the internal organs and meridians, and select the eight-vein intersection point and the qianlianquan point in the throat for treatment, and the symptoms and signs of the pharynx are significantly improved. Jiang Rui et al.[23] In the treatment of patients with chronic pharyngitis with yin deficiency, combined with acupuncture therapy, it can significantly improve the immunity of patients and improve the symptoms of yin deficiency. Zhang Tianjian et al., patients with chronic pharyngitis with hypochondriasis[24], thunder fire moxibustion combined with four gentlemen tang plus flavor therapy can effectively reduce the level of inflammatory factors and immune factors, and reduce the inflammatory reaction of patients. There are also some folk remedies such as: when treating chronic pharyngitis, Mr. Geng Jianing used the ancestral unilateral Chen Radish Ying to prevent and treat throat diseases, and the effect was better; Liu Jiahong[25] with self-imitated tea drinking recipe: green calyx plum, rose, fat sea, each 5g to treat chronic pharyngitis to achieve good efficacy. Qi Hong et al.[26] used Mongolian medicine to treat chronic pharyngitis, the symptoms improved significantly, and the quality of life of patients was improved. Varesjan Joazhun et al.[27] The total effective rate of the combination of Uyghur clearing qubi pro-Ella honey cream combined with compound Daefei honey cream for the treatment of chronic pharyngitis is 94%. Traditional Chinese medicine is used for the treatment of chronic pharyngitis, although the effect is good, but the mechanism is less discussed, and the efficacy of the observation is the majority.

4.3 Chinese and Western Healing

Through research in recent years, it has been found that in the treatment of chronic pharyngitis, the treatment method of integrated traditional Chinese medicine and Western medicine has the advantages of quick effect and safety, and has gradually developed into the main means. For example: Du Changhe[28] combined with traditional Chinese medicine decoction combined with nebulized inhalation for the treatment of chronic pharyngitis, saline 20mL + dexamethasone 5mg + gentamicin 80,000u + chymotrypsin 4000u nebulized inhalation combined with self-simulated traditional Chinese medicine (clinical prescription Xuan Ginseng, Mai Dong, Nansha ginseng, Zhejiang shellfish, Phatycodon, etc.) systemic and local treatment combined, achieved outstanding clinical efficacy. Wang Hua et al.[29] Observed the time when the serum inflammatory factors and throat symptoms disappeared in patients to evaluate the clinical efficacy of nebulization inhalation with ganju ice plum tablets combined with budesonide inhalation, and the total effective rate was 94.00%. Huang Danyuan[30] In the treatment of pharyngitis mainly based on allergic reactions, the treatment of pharyngitis with clear pharyngeal sputum soup combined with budesonide nebulization inhalation can significantly improve the symptoms of dry throat, itching and cough, and improve the patient’s resistance, with an effective rate of 97.62%, higher than the control group (pure application of budesonide nebulization inhalation) 83.33%.

5. Epilogue

Review, chronic pharyngitis is a common disease of the pharynx, there is obvious recurrence, Western medicine treatment around the infectious and non-infectious two mechanisms of treatment, Western medicine is mainly anti-infection[31] and local nebulized inhalation budesonide and other therapies, can quickly and effectively align symptoms, although the efficacy is obvious, but easy to cause drug resistance, overdose will hurt the spleen and stomach, thereby aggravating pharyngitis. Traditional medicine believes that the disease is a false evidence, developed from an emergency, divided into yin deficiency, spleen and stomach weakness, sputum and gas interlocking, sputum stasis interlocking, treatment from the whole, dialectical treatment, the treatment method is supplemented by decoction-based traditional Chinese medicine external treatment, its limitations[32], lack of more quantitative and precise experimental research related supplements; It is inconvenient to take medicines, and external treatment methods such as acupuncture will cause patients to have fear. Integrated traditional Chinese and Western medicine treatment method, a proprietary Chinese medicine with a Western pharmacological therapy, has a fast effect, can be fundamentally treated, has a significant effect, and reduces the recurrence rate.

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