# Discussion on the Prevention and Treatment of Premature Ovarian Insufficiency Based on the Thought of "Preventive Treatment"

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### Abstract

Objective To discuss the prevention and treatment of premature ovarian insufficiency (POI) based on the idea of "preventive treatment".Method Through consulting the ancient books and modern literature of traditional Chinese medicine(TCM), we collected doctors' knowledge on the etiology and pathogenesis of premature ovarian insufficiency, and discussed the prevention and treatment of POI according to its etiology and pathogenesis. Results Premature ovarian insufficiency is an updated understanding of premature ovarian failure. The main pathogenic feature is deficiency of kidney essence, which leads to the occurrence of POI and its important and common influencing factor is liver stagnation. The incidence rate is increasing year by year and a younger trend. Using the theory of "preventive treatment of diseases" in traditional Chinese medicine, by adjusting diet and daily life, avoiding exposure to high-risk factors and other methods to prevent diseases before they occur; Early diagnosis and treatment to save the disease;Invigorating the kidney and soothing the liver to prevent disease and change; The prognosis should be maintenance therapy to prevent and treat early-onset ovarian insufficiency, such as post-relapse prevention. It also focuses on the prevention and treatment of young girls who drop out of school early, pregnant women, and puerperium women who are prone to kidney deficiency and liver stagnation.Conclusion Based on the theory of "preventive treatment", the prevention and treatment of POI by Bushen Shugan method is reasonable and reliable, and provides ideas and methods for the clinical prevention and treatment of POI in the future.

### **Keywords**

Premature ovarian insufficiency; Invigorating the kidney and soothing the liver; Preventive treatment of disease.

### 1. Introduction

Premature ovarian insufficiency (POI) is an updated understanding of premature ovarian failure, which refers to women's ovarian function decline before the age of 40, characterized by irregular menstruation (amenorrhea or oligomenorrhea, delayed menstruation, etc.) accompanied by Elevated gonadotropin levels (FSH>25 U/L) and decreased estrogen levels are the main clinical manifestations[1]Decreased estrogen levels can also lead to increased incidence of cardiovascular diseases, osteoporosis, etc. [2].According to statistics, the incidence of POI in Chinese women is about 2.8%, and the incidence is increasing year by year, with a tendency to be younger [3].Westermedicine mainly uses hormone replacement therapy to relieve varn ious symptoms and complications caused by the reduction of estrogen levels to treat this disease. This treatment method is limited in the actual application process, because it will increase breast cancer and endometrial cancer. Due to the incidence of other diseases and

other side effects and contraindications, patients cannot use it for a long time [4].Ovarian insufficiency is a gradual process, and decreased ovarian reserve is the pre-state of POI.Clinically, ovarian dysfunction is irreversible,Traditional Chinese Medicine(TCM) treatment can only delay its decline.With the opening of the three-child policy and the widespread late marriage and childbearing, there is an urgent need for effective prevention and treatment of premature ovarian insufficiency.

# 2. The Thought of "Preventive Disease Treatment" in TCM

The thought of "preventive treatment" first appeared in the Huangdi Neijing, It is stated in "Su Wen: The Great Theory of Four Qi Regulations": Therefore, the sage does not wait for the disease to occur before treating it, but treats the disease before it occurs; It's as if you don't wait until the chaos has happened to govern, but govern before it happens. It expounds the basic connotation of the thought of treating pre-disease, and takes corresponding measures to prevent the further development of the disease. It is recorded in the Nanjing: "The so-called treatment of pre-disease, sees the disease of the liver, and knows that the liver should be transmitted to the spleen, so the temper first, no order to receive liver evil, and there is no evil that causes the liver to be affected, so it is said to treat the pre-disease."Explain that the disease can be prevented from spreading in advance.In Sun Simiao's "Qianjin Yaofang", he believes: "Traditional medicine, to treat diseases that are not yet ill; traditional Chinese medicine, to treat diseases that you want to get sick; lower medicine, to treat diseases that are already ill." According to the prevention and treatment of diseases, doctors are divided into upper, middle and lower. In the Qing Dynasty, Ye Tianshi advocated the idea of "safety in the first place without suffering from evil". The process of "preventing disease" includes four stages: prevention before disease, saving sprout from disease, prevention of degeneration after disease, and prevention of recovery after recovery [5].

# 3. The Etiology of Premature Ovarian Insufficiency

The etiology of POI is mostly related to iatrogenic factors (history of pelvic operation, radiotherapy and chemotherapy, etc.), infectious factors (acute and chronic inflammatory diseases such as mumps, pelvic inflammatory disease, etc.), self-factors (age, genetics, immunity, etc.), living habits (vegetable intake, smoking, drinking, weight loss, etc.), environmental factors (noise, radiation, environmental pollution, etc.), psychological factors (emotion, etc.) [6-7].Regarding premature ovarian insufficiency, traditional Chinese medicine has nothing to do with the description of the disease name, but according to the clinical symptoms of POI patients, it can be classified into "postponed menstruation", "oligomenorrhea", "premature menstrual fluid interruption", "yearly menstrual insufficiency" The categories of "premature menstrual water break" and "infertility". Through research and analysis of the cases of famous Chinese medicine practitioners in treating the disease, it is concluded that the pathogenesis of POI is mainly characterized by kidney deficiency, and is also closely related to liver stagnation and blood stasis, spleen deficiency, and heart-kidney disharmony. Therefore, the treatment drugs are mostly kidney-tonifying. Essence is the main focus, while strengthening the spleen and soothing the liver, promoting blood circulation and calming the heart, etc., and at the same time paying attention to the harmony of body and mind [8].

### 4. Understanding of TCM on the Etiology and Pathogenesis of POI Due to Kidney Deficiency and Liver Stagnation

Some studies have shown that in clinical POI, liver stagnation and kidney deficiency type account for about 30%, and several other syndromes have different degrees of liver stagnation

syndrome [9]. It can be seen that liver stagnation is the cause of POI and its important and universal impact factor."Su Wen Ancient Innocent Theory" records: "On the 27th, the Tiangui arrives, the Ren pulse is open, the Taichong pulse is prosperous, and the menstrual period is in the current period, so there is a child... On the seventh seven, the Ren pulse is deficient, and the Taichong pulse is weakened. Less, the heavens are exhausted, and the earth is blocked, so the shape is broken and there is no child.""Fu Qingzhu Nuke" has a cloud: "The meridian water comes out of the kidneys... The kidney qi is originally deficient, how can it be full and the meridian water leaks out."This shows that since ancient times, physicians believed that Erqi menstruation and Qiqi amenorrhea belonged to normal physiological changes in women, and the changes of Tiangui, Chongren, and meridian water were all dominated by the rise and fall of kidney gi. Kidney deficiency caused by hyperactivity, or labor and prolific labor, etc., can lead to the occurrence of POI.Women take the liver as the innate and blood as the foundation, the liver and kidney as the mother and the mother, the liver is in charge of dredging, and the kidney is in charge of sealing. If the emotions caused by the seven emotional factors are unsmooth, the liver qi is not sparse, the Chong and Ren disorders are out of balance, and the blood sea is full and overflowing, then the menstrual cycle will not arrive as scheduled; the liver stagnation will turn into heat for a long time, and the heat will damage the yin blood, resulting in insufficient liver blood., If the sea of blood is deficient, there will be no blood to go down; Liver wood restricts the spleen soil, and the liver stagnation will damage the spleen over time. Down. All of the above situations can lead to early breakage of menstrual water and disorder, which can lead to the development of POI.

# 5. Discussion on the Prevention and Treatment of POI With the Method of Tonifying the Kidney and Soothing the Liver From the Idea of "Preventing Disease"

According to the idea of "preventing the disease", it is mainly expounded from four aspects: prevention before the disease, saving the sprout from the disease, preventing the disease after the disease and preventing the recovery after the recovery.

### 5.1. Prevention Before Getting Sick

There are two sources of kidney essence, one is the congenital essence derived from the reproductive essence of parents, which governs reproduction, and the other is acquired essence, which comes from the water and grain essence absorbed by the body from food and the metaplastic essence during the physiological activities of the viscera. Substance, the main growth and development. Among various factors that affect ovarian reserve, age is the primary factor. Studies have found that the decline of ovarian reserve is related to maternal age at menopause, and is related to later age at menarche [10-12], all of which reflect the role of kidney essence in ovarian function. Therefore, women should pay attention to the care of kidney essence when they are not sick, and prevent it from interacting with other high-risk pathogenic factors.

#### 5.1.1. Adapting to the Four Seasons

Human and nature are an organic whole, "Su Wen: The Great Theory of Four Qi Regulations" believes: "Therefore, the four seasons of yin and yang are the end and beginning of all things, the origin of death and life, and the opposite will lead to disasters, and following them will lead to severe disease. I can't afford it." People's life activities must conform to the laws of natural changes, especially POI with kidney deficiency as the main pathogenesis, and women are more prone to emotional fluctuations due to their special physical characteristics, social status, physiological environment and other factors [13]. This leads to the occurrence of liver stagnation. Therefore, it is necessary to pay more attention to nourishing the liver in spring, so

that the liver qi can be improved. In addition, because the winter is mainly closed, it is in line with the characteristics of the kidney to store the essence. It is necessary to adhere to the principle of "early bed and early rise" in winter. The kidney essence can be replenished, the liver qi can be regulated, the righteous qi can be protected, the redness can be regulated, the menstruation can arrive as usual, and the daily life should be adjusted according to this law. The living habits and work characteristics of modern people make people generally lack of physical exercise, "ease of qi stagnation", poor circulation of qi and blood, blockage of Chong Ren and cell veins, which in turn leads to abnormal ovarian function.

#### 5.1.2. Adjust Emotions

Emotional internal injury, stagnation of gi, blood as gi resistance, unbalanced rush and renunciation, sluggish operation, delayed menstruation, oligomenorrhea and so on. For POI patients with kidney deficiency and liver stagnation, liver stagnation is an important predisposing factor. Liver and kidney are homologous, and liver stagnation will aggravate kidney deficiency over time, such a vicious circle. Therefore, regulating emotions and maintaining a peaceful mind are very important for the prevention of this disease. Significance. The average incidence of postpartum depression in my country is 14.7%. After giving birth, pregnant women experience dramatic changes in reproductive hormones, making it easier for women to change their mood. Women who feel more support in the 4th week postpartum have a reduced risk of postpartum depression [14]]. Childbirth is an extremely important stage in a woman's life, and the puerperium is also a stage when women are faced with both physical and psychological discomfort and vulnerability. Therefore, it is necessary to pay more attention to the physical and mental health of women during the puerperium. Learn to relieve negative emotions, actively communicate with others, and get corresponding help in a timely manner. On the other hand, doctors should pay more attention to their health and psychological changes in the face of puerperium women, and do their best to relieve their tension, anxiety, and anxiety.

#### 5.1.3. Be Careful About Sexual Intercourse

With the change of fertility culture and sexual concept, the sex life has entered an era where pleasure is the main factor and fertility is supplemented. Coupled with the lack of reproductive health education system in my country, the unmarried abortion rate has reached 40% to 80% [15]. Improper sexual intercourse, indulgence and prolific pregnancy damage the kidney, and the kidney essence is deficient, resulting in the imbalance of the kidney-Tiangui-Chongren-Uterine axis, causing the sea of blood to overflow and disorder, causing the disorder of menstrual blood and even amenorrhea, infertility, etc. Therefore, it is important to carry out safe sex and strengthen and perfect sex education for the prevention and treatment of POI.

### 5.2. If You Want To Be Sick, You Will Be Cute

When there are symptoms of irregular menstruation such as decreased menstrual flow, early menstruation, delayed menstruation, etc., but the level of sex hormones is still within the normal range, it is in the stage of "wanting to be sick", especially for those who have long-term high-pressure work, mental stress, poor lifestyle and eating habits. For those with a history of multiple uterine cavity operations, late menarche, and early maternal age at menopause, attention should be paid to risk factors such as decreased ovarian function, active menstruation regulation, and regular menstruation. Inherited by the parents and stored in the kidneys, the "innate essence" is responsible for reproduction, growth, and development. If the parents are deficient in essence and qi, the "congenital essence" is weak for their daughters and needs to rely on the "acquired essence". To supplement, if it is not supplemented, the female will also be deficient in essence and qi, which can lead to the occurrence of POI. This cycle goes on and on. Therefore, women of childbearing age who experience menstrual disorders should first regulate menstruation and then conceive, tonify kidney qi, soothe liver qi, and replenish kidney qi., Liver Qi is relaxed, Chong Ren is adjusted, then menstrual blood arrives on schedule.

### 5.3. Preventing Both Diseases and Changes

For those who already have sex hormone levels that suggest ovarian function decline, active treatment should be given to delay the process of ovarian function decline. The basic pathogenesis of POI is kidney deficiency. Clinically, liver stagnation and kidney deficiency are more common. Cui Xiaoping treats premature ovarian failure with the sequential therapy of yin and yang in the premenstrual period. Gui Wan modified and subtracted treatment, upset and irritable people add Cymbidium, turmeric, etc. to soothe the liver and regulate qi, and the curative effect is good [16]. By invigorating the kidney and filling the essence, strengthening the spleen and soothing the liver, promoting blood circulation and calming the heart, and focusing on the coordination of body and mind, it can delay the process of ovarian dysfunction, prevent it from developing into premature ovarian failure, and lead to infertility.

#### 5.4. Anti-recovery After Recovery

The post-mortem refers to the period of time from the initial recovery of the disease to the return to normal state. In the post-mortem stage, although the symptoms disappear, the evil qi has not been exhausted and the righteous qi has not yet recovered. Consolidation treatment should be taken in time to avoid the recurrence of the disease. For POI with "kidney deficiency" as the main pathogenesis, traditional Chinese medicines such as Dingkundan, a Chinese patent medicine, etc., or traditional Chinese medicine treatment methods such as acupuncture and moxibustion should continue to be given at this stage. And so on, must not see the menstrual regularity, that is, interrupt the treatment, relax the vigilance, and make the disease recover.

### 6. Conclusion

Due to changes in the social environment, the incidence of premature ovarian insufficiency is also on the rise, and the onset population tends to be younger, which has gradually attracted people's attention. The prevention of POI is more important than the treatment. For those who are not ill, they should pay attention to regulating health preservation and strengthening the body, so that the kidney qi will be prosperous, and the menstrual period will come. The influencing factors of POI should be treated with traditional Chinese medicine if necessary; for those who are already ill, they should actively receive treatment to delay the progression of the disease; for the latter, consolidate treatment to prevent recurrence. For the prevention of POI, special attention should be paid to special groups such as girls who drop out of school early, pregnant women, and women in the puerperium. Because girls who drop out of school early enter the society, lack of sex education, poor awareness of self-protection, and are prone to unintended pregnancy, resulting in frequent labor Abortion; women during pregnancy and puerperium need to pay special attention to their physical and mental health due to their special physiological stage, so as to avoid poor physical recovery and lead to the occurrence of POI.

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