Treatment of Insomnia Based on the Midnight-Noon Ebb-Flow

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The midnight-noon ebb-flow is an ancient TCM theory, which studies the law of ebb-flow and excess-decline of qi and blood of channels and zang-fu organs of the human body, based on hour of the day, yin-yang, and location. Since the occurrence of insomnia is also closely related with hour of the day, the corresponding relationship between the hour designated in the midnight-noon ebb-flow and the zang-fu channels can be used in the differential treatment of insomnia, by means of regulating qi and blood in the zang-fu organs and channels corresponding to the four hours of zi, chou, yin, and mao relevant to sleep, such as the gallbladder and the Gallbladder Channel, the liver and the Liver Channel, the lung and the Lung Channel, and the large intestine and the Large Intestine Channel. When people sleep, the wei-defensive qi enters into yin, the mind is calmed and people sleep. When the xie-pathogenic qi disturbs the defensive qi entering into yin or disturbs the mind stored in the heart, then insomnia appears. Miraculous Pivot says: the pathogenic qi attacks zang-fu, making the defensive qi failed to enter into yin, yang qi is then excessive, so insomnia.

Treatment
According to man’s sleeping habit, the time for sleep is from about 11 o’clock at the night to 7 o’clock the next morning, i.e. from zi- to mao-hours. According to the relation between the Earthly Branches in midnight-noon ebb-flow and zang-fu, qi of the Gallbladder Channel of Foot-Shaoyang, the Liver Channel of Foot-Jueyin, the Lung Channel of Hand-Taiyin, and the Large Intestine Channel of Hand-Yangming is the most exuberant respectively.

The period from 11 o’clock at the night to 1 o’clock the next morning belongs to zi-hour, qi of the Gallbladder Channel of Foot-Shaoyang is the most exuberant. The rising of yang qi of the whole body depends on the rising of gallbladder-qi. For insomnia patients, the rising of yang qi of the whole body promoted by the gallbladder-qi would make yang qi more difficult to enter yin to ensure sleep. Therefore, in the treatment, heavy drugs can be used to help the restraining of yang qi, such as Sheng Mu Li (生牡蛎 Concha Ostreae), and Sheng Long Gu (生龙骨 Os Draconis Fossilia Ossis Mastodi).

In the chou-hour, from 1 to 3 before dawn, qi of the Liver Channel of Foot-Jueyin is the most exuberant. The liver dominates free flow of qi and stores blood. The process of the liver from promoting free flow of qi to storing blood is a course from yang to yin. Whereas, falling asleep is also a course of yang getting into yin. It is evident that sleep has relation with the liver’s function in storing blood. Therefore, in the treatment of insomnia, adding the herbs capable of nourishing blood and softening the liver, such as Bai Shao (白芍 Radix Paeoniae Alba), and Wu Wei Zi (五味子 Fructus Schisandrae), can not only promote the liver’s function in storing blood, but also lead yang qi to enter yin, so to improve the sleep quality. The blood stored in the liver can nourish the
whole body. Thus, sufficient sleep can make the liver perform its function of storing blood better, and nourishing the whole body better, so to make man full of vitality, which, in turn, is also a manifestation of high quality of sleep.

In the yin-hour, from 3 to 5 before dawn, the qi of the Lung Channel of Hand-Taiyin is the most exuberant. The lung has the function of regulating the whole body and regulating the functional activities of qi. The turns of liver’s functions from promoting free flow of qi to storing blood upon falling asleep when yang getting into yin, and from storing blood to promoting free flow of qi upon waking up when yang getting out of yin, all depend on the regulatory function of the lung. Therefore, the lung functions to regulate the quality of sleep as yang continued in yin for longer sleep or out of yin for waking up. In the treatment, herbs capable of regulating the lung-qi can be added, such as Ma Huang (麻黄 Herba Ephedrae), and Xing Ren (杏仁 Semen Armeniacae Amarum), for regulating the lung’s function in dispersing and descending, so to regulate qi of the whole body to improve the sleeping quality.

In the mao-hour, from 5 before dawn to 7 in the morning, qi of the Large Intestine Channel of Hand-Yangming is the most exuberant. The large intestine dominates body fluids and the transmission of wastes. The clear ascending and the turbid descending are the two ways in qi movement. These two ways of qi movement supplement each other. Only when the two ways of movement are in a normal state, can the activities of qi be normal. The fully played part of the large intestine in descending the turbid can help the ascending of clear qi, which is very important for the waking up of man from sleep. The lung is externally and internally related with the large intestine, and the functions of the large intestine are closely related with the lung. Since the large intestine is an earth zang, herbs capable of strengthening the spleen qi can be added for treatment, such as Cang Zhu (苍术 Rhizoma Atractylodis), and Hou Pu (厚朴 Cortex Magnoliae Officinalis) for regulating function of the large intestine in the ascending and descending of its qi, and regulating, at the same time, the dispersing and descending function of lung qi, so to ensure the therapeutic effect.

Sample Cases

Case 1: A male case of 45 years old, with the chief complaint of insomnia manifested as early waking up. After taking estazolan, he could sleep till 5 o’clock before dawn. He did not have dry mouth, but had slightly bitter taste in the mouth, tinnitus of the right side ear, irritability, normal stool, and lumbar soreness. The tongue proper was normal, with thin-yellow coating; and the pulse was thready-wiry. The TCM differential diagnosis was ‘hyperactivity of the liver-yang, kidney-yin deficiency’. The prescription: Tian Ma (天麻 Rhizoma Gastrodiae) 10g, Gou Teng (钩藤 Ramulus Uncariae cum Uncis) 15g, Ju Hua (菊 Flos Chrysanthemi) 15g, Huang Qin (黄芩 Radix Scutellariae) 15g, Jiao Zhi Zi (焦栀子 charred Fructus Gardeniae) 15g, Cao Jue ming (草决明 Semen Cassiae) 20g, Huai Niu Xi (怀牛膝 Radix Achyranthis Bidentatae) 15g, Jiao Zhi Zi (焦栀子 charred Fructus Gardeniae) 15g, Cao Jue ming (草决明 Semen Cassiae) 20g, Huai Niu Xi (怀牛膝 Radix Achyranthis Bidentatae) 15g, Ji Xue Teng (鸡血藤 Caulis Spatholobi) 30g, Yi Mu Cao (益母草 Herba Leonuri) 20g, Shou Wu Teng (首乌藤 Caulis Polygonyi Mutiflori) 30g, Bai Zi Ren (柏子仁 Semen Platycladi) 30g, He Huan Pi (合欢皮 Cortex Albiziae) 15g, Bai He (百合 Bulbus Lilii) 20g, Qing Pi (青皮 Pericarpium Citri Reticulatae Viride) 15g, Sheng Long Gu (生龙骨 Os Draconis Fossilia Ossis Maste) 30g, Ci Shi (磁石 Magnetitum) 30g, and Sheng Mai Ya (生麦芽 Fructus Hordei Germinatus) 20g.

After taking 7 doses of the above prescription, the patient had the symptoms of bitter taste in the mouth, tinnitus, and irritability alleviated. The tongue coating turned thin and slightly yellow, and the pulse was thready-slippery. He didn’t have administration of estazolan for the recent 3 days. He still woke up early
at 5 before dawn. Cang Zhu (苍术 Rhizoma Atractyloides) 15g was then added for that.

After taking 7 doses of the modified prescription, the patient got the symptom of early waking up obviously improved. In the recent one week, he only had twice of early waking up, and could still fall asleep again. At the moment, he only had the symptom of tinnitus. Modifications were applied according to his symptoms.

Comment: The differentiation for this case was hyperactivity of the liver-\(yang\). The prescription for the first visit was based on the modified Tianma Gouteng Yin (天麻钩藤饮 Decoction of Gastrodia and Uncaria) for calming the liver and suppressing the hyperactive \(yang\), and nourishing the liver and kidney. After taking the prescription, the symptoms of bitter taste in the mouth and tinnitus were alleviated, but the early waking up was not improved. Although the patient didn’t have abdominal distention, his thick-sticky tongue coating and slippery pulse were all signs of dysfunction of the spleen in transportation, and interior retention of water-damp. So, Cang Zhu (苍术 Rhizoma Atractyloides) was then added in the second prescription. Since the patient would wake up at 5 before dawn, which is the time for channel-\(qi\) of the human body flowing into the large intestines, Cang Zhu (苍术 Rhizoma Atractyloides) could regulate functions of the large intestine, so to treat insomnia.

Case 2: A female patient of 28 years old. She complained of difficulty in falling asleep, which usually lasted 1–2 hours after going to bed at 11 every night. The accompanying symptoms were lassitude, slightly bitter taste in the mouth, red tongue proper with thin-yellow-sticky coating, and wiry pulse, slippery at the right \(guan\) part. The TCM differential diagnosis was ‘stagnation of the liver-\(qi\), and the disturbance of heart by phlegm-fire’. The prescription: Huang Lian (黄连 Rhizoma Coptidis) 15g, Qing Pi (青皮 Pericarpium Citri Reticulatae) 10g, Ping Pi (平皮 Pericarpium Citri Reticulatae Preparatum) 15g, Fa Ban Xia (法半夏 Rhizoma Pinelliae Preparata) 15g, Fu Ling (茯苓 Poria) 15g, Hua Shi (滑石 Talcum) 10g, Gan Cao (甘草 Radix Glycyrrhizae) 5g, Zhi Qiao (枳壳 Fructus Aurantii) 15g, Zhu Ru (竹茹 Caulis Bambusae Taeniam) 15g, Bai Zi Ren (柏子仁 Semen Platycladi) 30g, Sheng Shi Gao (生石膏 Gypsum Fibrosum) 20g, Suan Zao Ren (酸枣仁 Semen Ziziphi Spinosae) 20g, Shen Mai Y a (生麦芽 Fructus Hordei Germinatus) 20g, and Xia Ku Cao (夏枯草 Spica Prunellae) 15g.

After taking 3 doses of the above prescription, the patient had no obvious improvement in difficult falling asleep. She did not have any more bitter taste in the mouth. The tongue proper turned pink-red with thin-yellow coating, and the pulse was wiry. Then Sheng Long Gu (生龙骨 Os Draconis Fossilia Ossis Mastodi) 20g was added to the prescription.

Afterwards, the patient didn’t come for return visit. Half a year later when the patient came for headache, she stated that after taking 7 doses of the modified prescription, she didn’t have difficulty in falling asleep any more. She didn’t have recurrence of insomnia since then.

Comment: Sheng Long Gu (生龙骨 Os Draconis Fossilia Ossis Mastodi) is a weighty and \(yang\)-restraining drug. Although the patient didn’t have the manifestation of hyperactivity of \(yang\), the period from 11 o’clock at the night to 1 o’clock before dawn is the time when the channel-\(qi\) in the Gallbladder Channel of Foot-Shaoyang is the most exuberant. Sheng Long Gu (生龙骨 Os Draconis Fossilia Ossis Mastodi) could suppress the rising of \(yang-qi\), and help \(yang\) getting into \(yin\), so to obtain the therapeutic effect.

Conclusion

From the above, we can learn that in the differential
treatment of insomnia based on the relation between the Earthly Branches in the midnight-noon ebb-flow and the zang-fu, attention should be paid to the excess-decline of channel-qi and blood, and the physiological functions of zang-fu organs. The regulations should begin even when the functions of the zang-fu organs and movements of qi and blood are in normal state rather than giving regulations when pathological changes have already occurred.

The therapeutic effect of insomnia can thus be obtained.

References

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