There were three doctors famous for their art in the Jin: one was Liu [Wansu] 劉完素, one was Zhang [Congzheng] 張從正, one was Li [Gao] 李杲... All took the Inner Canon of the Yellow Emperor 黃帝內經 as their foundation... Liu’s learning was taught to monk Jingai 荊山, who later came to Jiangnan. It was thus possible for his learning to be transmitted in Hangzhou to Luo Zhiti 洛知悌 during the Baoyu reign (1553–58)... The latter had to wait until he met Mr. Zhu [Zhenheng] of Yiwu before his learning could be transmitted, and to him alone.

This version of the transmission and consolidation of medical learning in the Jin/Southern Song–Yuan period came to be considered the orthodox account in the Yuan-Ming period. Consequently, Liu Wansu (1120–1200; a native of Hejian 河間, Hebei), Zhang Congzheng (1156–1228; Suizhou 隨州, Henan), Li Gao (1180–1251; Zhending 真定, Hebei), and Zhu Zhenheng, each representing a different “school,” were revered by later generations as the four great masters of the Jin-Yuan scholarly medical tradition.

The Scholarly Tradition

Song Lian’s comments reveal that what the Jin-Yuan masters claimed was not so much originality or inventiveness as loyalty to an ancient classical tradition. Constantly referring to the Inner Canon of the Yellow Emperor, the ancient repository of medical knowledge, they criticized the Song tradition as superficial. Two aspects of Song medical scholarship were singled out for criticism: the production of prescription/method books (fangshu 方書), and the interpretation of the cold damage disorders (shanghan 瘧寒) category of diseases. Of the two, the Song pharmacopoeia came under particular attack. The Song medical tradition, greatly promoted by the state, was characterized by a highly pragmatic approach, consisting of the study of materia medica (bencao 本草) and the publication of prescription manuals, as well as an elaborate system of public dispensaries.

Of the nearly twenty known published works on materia medica, four were sponsored by the state, in 973, 1061, 1098–1097, and 1159, respectively (Na Qi 1983).

The most important Song prescription books were also sponsored by the court. The earliest one, compiled in 981 and no longer extant, was said to contain more than a thousand chapters. The second, the Prescriptions of Sacred Benevolence Under the Great Peace (Taiping shenghuì fang 太平聖惠方), published in 992, contained a hundred chapters and was to remain a classic of this genre. In 1107–10, three court specialists compiled a brief prescription book in five chapters, called the Prescriptions of the Medical Bureau for Benefiting
the People Under the Great Peace (Taiping huimin hejiu fang 太平惠民和劑局方), which was supplemented with five additional chapters in the Southern Song period and distributed throughout the empire by the court. Another major work, the Encyclopedic Record of Imperial Benevolence (Shengji zonglu 圣濟總錄) in 200 chapters, was compiled during 1111–17 but not published until 1167–89, under the Jin.

One reason why the Song state invested so much in the publication of prescription books was its conviction that they were the most efficient tools for saving lives and thus an effective showcase of imperial benevolence. The preface of the Prescriptions of the Medical Bureau for Benefiting the People Under the Great Peace states that "among the methods of saving and preserving lives, none is better than prescription books. Thus since the Kaibao reign [568–76]... various prescription books have been published for the benefit of the empire." This point was repeated in almost all Song imperial prescription manuals. The interest in prescriptions derived less from a philological search for historical authenticity than a desire to promote an image of state benevolence (Fan 1988: 125).

Thus, it is not surprising that official publication of prescriptions was accompanied by the establishment of public dispensaries. The first national dispensary (the Maishaoyao 萬藥所) was set up in 1075 in the capital. By 1103, five others had been established and were selling medicines made by the two Pharmaceutical Bureaus (Hejiu 和劑局). These institutions bought and stocked herbs and other raw ingredients, compounded medicines according to approved prescriptions, and sold ready-made preparations at two-thirds of the market price. This system continued in the Southern Song, which in 1148 established similar dispensaries, rebaptized as dispensaries for Benefiting the People (Huijin yaojui 惠民藥局), in various cities.

In the same pragmatic spirit, celebrated doctors published books dispensing easy-to-apply advice on treatment of cold damage disorders, a term for febrile illnesses and epidemics. The famous doctor Pang Anshi 龐安時 (1043–1100) published his General Treatise on Cold Damage Illnesses (Shanghan zongbing lun 嚴寒總病論) around 1100. He wrote this work in order that "each family could read the [accompanying] prescriptions and practice and apply them easily." In 1106–7, Zhu Gong 朱肱 (jinsi 1088), a famous doctor serving the court, published another major work of this type, the Life-Saving Book on Illnesses of Cold Damage Symptoms (Shanghan leizheng huoren shu 嚴寒類證活人書), in an attempt to clarify and systematize the classic work on cold damage disorders by Zhang Ji 張機 of the Eastern Han period. Zhu's revised edition of it was intended to encourage medical practitioners to "travel from district to district with this book... publicizing it by making people learn it and read it out loud. Its spread will prevent vulgar doctors from prescribing medicines erroneously."

The publication of prescription manuals, materia medica, and treatises on cold damage illnesses in the Song, especially in the Northern Song, overshadowed other studies in medicine. Consequently, they came to represent Song medical scholarship in the eyes of Jin specialists.

To a large extent, the major innovations of the Jin-Yuan period were carried out by northerners living under the Jin dynasty, who consciously reacted against what they considered the (Northern) Song mainstream medical tradition. Liu Wanru, for example, harshly denounced doctors who "rely on the reputation of ancestors and stick to old prescriptions. Too proud to ask questions and unwilling to learn, they are especially bereft of new methods." Their greatest fault lay in "their ignorance of the principle of Yin-Yang changes." In the preface to another work, Liu criticized Zhu Gong, whose words, according to him, did not "correspond to the meaning of the Sage. What Zhu said bore only a false resemblance to the Sage's words. The reason is that Zhu did not know the principle of Yin-Yang changes." Here "Yin-Yang changes" probably refers to the then-fashionable wuyan liqi 五運六氣, theory (see below).

Another target of criticism by Jin masters was the Song tradition of prescription manuals. Zhang Yuansu 張元素 (twelfth century) was famous for his mistrust of Song prescriptions, which he dismissed as "old": "Old prescriptions do not seem to be suitable for new illnesses; on the contrary, they are harmful to people." This position was dutifully reiterated by Zhang's disciple Li Gao, who reportedly criticized the collection of prescriptions by Su Shi 蘇軾 (1037–1101) and Shen Gua 沈括 (1031–95) as similar to an anthology of shi 詩 poems compiled by those who did not know how to write shi. For Li, the compilers of the "Su-Shen" prescription book had not known how to write prescriptions. The great synthesizer of the Yuan, Zhu Zhenheng, was the most outspoken critic of Song prescriptions. According to Zhu, the Prescriptions of the Medical Bureau for Benefiting the People Under the Great Peace had achieved a dangerous pre-eminence: "From the Song until today, the government has obeyed this book on principle; the medical profession transmits it as its vocation; the sick hold onto it in the hope of sustaining their lives; people of
the world study it; and this has become a fashion.17 Zhu was particularly upset that what he called "learning based on the Pharmaceutical Bureau prescriptions" has "remained widespread since the Song, in the north as well as in the south." According to Zhu, since the Song people did not realize that the human body was characterized by "inadequate Yin and excessive Yang," they consequently favored recipes of the Pharmaceutical Bureau that employed too many warm medicines on the assumption that the human body suffered from excessive Yin.18 Moreover, he had strong doubts about the principle of systematically applying these prescriptions to "new illnesses" and considered it misguided to "treat the myriad illnesses of today with the 'proven' prescriptions of our ancestors." Zhu mocked the learning of the authors of the prescription book as trivial (ququ 却求), and even murderous "if one overindulges in it."19 One of Zhu's contributions to later medicine was an emphasis on supplementing the body's Yin and suppressing the excessive Yang, a principle that he inherited from the Jin masters. In addition, he encouraged a more flexible approach to medication.

Another departure from Song tradition was the use of the aggressive methods of purgation, pioneered by Zhang Congzheng and known as "striking techniques" (yongfa 功伐). Zhang's three methods, healing by vomiting/sweating/purging (tu/han/xia 吐汗下), mostly with "cold" medicines, became his trademark and were discussed at length in his famous work, (Ways in Which) a Confucian Should Serve His Parents (Rumen shuqi 前門事親).

However, it would be an error to see this as a rupture in the evolution of medical knowledge. All the contributions of the Jin-Yuan masters were, in fact, basically related to their understanding of pathological mechanisms, and the theoretical basis for their new approaches to pathology was to a large extent the cosmic theory of the Five Circuit Phases and the Six Atmospheric Influences (wuyun liuqi),20 which initially developed in the tenth century and had been elaborated during the Northern Song period.21 Although Jin masters relied heavily on wuyun liuqi theory to rationalize their explanations of "new illnesses"22 and their more sophisticated use of drugs,23 they downplayed the theory's evolution after the tenth century by accusing their Northern Song predecessors of ignorance of a doctrine that originated in the Inner Canon.

In fact, their approaches did not differ significantly from those of Song specialists such as Qian Yi 錢乙 (ca. 1032–1113) and Chen Yan 陳言 (fl. thir-
conserved themselves in meticulous and impenetrable ways. Therefore these doctors treated their patients as solid and full individuals and applied purging methods to eliminate excess. Li Gao lived during the dynasty’s decline. Warfare and famine succeeded one another in the cities. People were worried and frightened, and their qi was exhausted. Therefore the principle he upheld emphasized the consolidation of the basic, and the method applied was one of replenishment (bu 湯), in order to make up for the inadequacy.

According to Dai, the Yuan systematizer Zhu Zhenheng pursued an eclectic and synthetic approach using the two methods of these masters to treat people of different physical constitutions.  

Xiang Xin 項昕, another prominent Zhejiang doctor who was also a friend of Dai Liang, was simply perplexed by the sharp division his contemporaries constructed between the northern and southern traditions of his day:  

Recently, those who follow the three traditions [of Zhang Ji, Liu Wansu, and Li Gao] often condemn one another, and as a result one sees the so-called differences between southern and northern medicine. They absolutely refuse to apply cold drugs to southerners and hot drugs to northerners. How could they restrain themselves to this degree. . . Since it is essential to heal with instantaneous flexibility, increasing or decreasing doses as required, how could one limit oneself to the north-south division and a vast rift between the cold and the hot?  

Clearly, Zhu’s and Xiang’s eclectic disregard for regional differences in medical practice did not assume a fundamental difference between the northern and the southern traditions. This attitude persisted among many prominent Ming-Qing doctors.  

However, Dai Liang’s views may better reflect the prevailing view of the time:  

Since my early age, I loved old books. As for medical works. . . I also read the Treatise on Cold Damage Disorders by Zhang [Ji] of the Han. . . . A thousand years later, could the only one who succeeded Zhang be Liu Wansu? . . . Those who understand Liu’s words and receive his tradition always clearly know where the cause of illness lies. They would attack it in a strike (gongfa) and eliminate it. Their cures indeed seemed swift and miraculous. Therefore I admired them greatly and complained that too few southeastern doctors knew this art.  

Dai obviously held what he deemed the northern medical orthodoxy in higher esteem. But his opinion changed radically after he met a certain Su-
The Nonscholarly Tradition

While the scholarly tradition was becoming consolidated, some aspects of the ancient medical tradition were increasingly being marginalized, notably those considered technical, “manual,” or superstitious, such as acupuncture, ophthalmology, other surgical arts, and witchcraft. Consequently, such techniques were propagated instead within the flourishing popular traditions of the day.

It is true that the Northern Song imperial bureau for the printing of medical books (Jiaozheng yishu ju校正醫書局) collated and printed many classics on acupuncture, and in 1023 Emperor Renzong 仁宗 (1023–63) ordered the fabrication of a bronze human figure indicating the tract system and focal points for acupuncture; an accompanying handbook was added in 1026 (Li Jingwei and Li Zhidong 1990: 84–85; see also Lu and Needham 1980: 131). But this aspect of medicine was, later on, vastly overshadowed by scholarly studies on *materia medica*, pharmacopoeia, and on cold damage diseases.

Few post-Song masters—with the possible exception of Li Gao’s student Luo Tianyi 羅天益—prided themselves on skills in acupuncture. The scholarly tradition’s increasing contempt for acupuncture was lamented by the Yuan acupuncturist Hua Shou 洪壽 (1304–86). For Hua, the teachings in the Inner Canon on acupuncture and moxibustion were increasingly neglected. “In later ages, healing by prescriptions and drugs became extremely prevalent, and the Way of acupuncture was thus halted and ignored, while moxibustion was barely transmitted. Now that the Way of acupuncture has declined, the tract system has become obscure to practitioners.” Song Lian, who wrote a preface for Hua’s work, agreed that “those who transmit the method of the nine needles are rare.” Indeed after drug prescriptions became the dominant treatment, acupuncturists lost ground in the scholarly tradition.

The fact that the techniques of acupuncture were transmitted through Daoist rather than Confucian channels might be one reason for their eclipse after the Song-Jin period. Since the second century, many important texts on acupuncture had been written by famous Daoists and transmitted by Daoist sects (Lu and Needham 1980: 115–27). There are indications that the arts of acupuncture were transmitted mostly through oral instruction to a select few adepts. The famous Yuan acupuncturist Dou Mo 道黙 (1196–
1280) recounted that he learned acupuncture from his master Li Hao 李浩, who told him that “the treasure of the Heavens should not be revealed to the unsuitable; the way of the Saint should only be transmitted to the sage.” Only after persistent pleading was he taught the secrets of the art, apparently orally, since he had to memorize the teaching. Extant biographical materials on Jin-Yuan acupuncturists reveal that many were at the same time alchemists or specialists in healing with amulets, and others were explicitly identified as Daoists of the dominant Quanzhen 全真 school. Many works on acupuncture published during the Jin-Yuan period utilize a Daoist vocabulary. As Jin-Yuan medical orthodoxy took on an increasingly Confucian outlook, techniques with marked Daoist features were excluded.

Similarly, eye specialists were increasingly considered mere technicians who did not have the intellectual sophistication required to read pulses and prescribe drugs. Since the Tang, Indian ophthalmology had contributed much to the specialty in China (Ma Boying 1994: 375-80). Treatises on eye illnesses began to be compiled in greater numbers since the Song. But unlike books in the scholarly tradition, these works were mostly anonymous, a fact that suggests that their authors had little stature in intellectual circles. In order to obtain credibility, publishers often issued works under the name of legendary figures, like Sun Simiao 孫思邈, the great Daoist doctor of the Tang. The Buddha Nagarjuna (rendered as longmu 龍門 in Chinese, lit. “dragon tree”) was said to be an eye expert, and medical texts on eye diseases often had the characters longmu 龍目 (“dragon eye”) in the title.

The lowly status of the art of treating the eyes is clearly confirmed by the famous Yuan-Ming doctor Ni Weide 尼惟德 (1013-77), one of the rare “Confucian doctors” who bothered to write on the subject. He deplored the fact that although the great masters discussed cold damage disorders, internal disorders, gynecology, and pediatrics, “on eye-healing alone, there is no complete work. Although mentioned sporadically in various works, it is treated neither completely nor in depth. Can it be that our ancestors despised it? Or that those who teach it are not authentic, so that those who are taught cannot but learn in futile ways?” Like acupuncturists, many eye specialists were Daoists. Since many practiced eye surgery with needles, it is natural that literati doctors treated them with the same disdain they accorded acupuncturists.

The surgical arts in general and witchcraft healing (wu 倪), both important features of the ancient medical tradition, experienced similar fates. Treatment of suppurative infection (chüangyang 瘡潰) probably accounted for the greatest share of surgical practice. Since Sui-Tang times, specialists in this art were often Daoists, and works on the subject were sometimes attributed to immortals. Later, during the Song, the practice seemed to be increasingly left to the lower classes of practitioners. Chen Ziming 陳自明 (ca. 1237, native of Linchuan 鄭川, Jiangxi), in his work on surgery, wrote:

Although the specialty of chüangyang has existed since antiquity... later generations did not study it in depth, so that healing methods degenerated. Now they have become perverted and lost. In my native region, today these specialized in this discipline are mostly lowly people. Yet those who suffer from the illnesses are mostly the wealthy... Those who repair and cut, or treat broken bones, teeth, and hemorrhoids, are mostly vulgar, illiterate people. The great Yuan surgeon Qi Dezhi 齊德之 (fl. ca. 1335), who worked for the court, also observed that specialists in all other disciplines always take the pulse first and then prescribe according to symptoms. Only the so-called specialists in the discipline of chüang often bypass pulse-taking and treat only external symptoms. If the case is doubtful and difficult, they will ask other doctors who take the pulse and give prescriptions to observe and diagnose. This tribe of chüang specialists willingly accept being considered shallow and negligent. 

The divorce of the chüangyang specialty from the respectable scholarly tradition seems to have been a bitter one. Some surgical specialists were also skilled in witchcraft healing. Sorcery and medicine were inseparable from antiquity until the Six Dynasties. In the eleventh century, elaborate attempts were made to separate witchcraft: healing from respectable medical healing, as evidenced by imperial edicts in 1023 and 1025 banning witchcraft healing in southern China (Yang 1993: 78-80). This question deserves deeper study, since it would certainly further enlighten us about the development of medical traditions in the long Song-Jin-Yuan period.

The decline in the status of these disciplines and the consolidation of the Jin-Yuan scholarly tradition are perhaps not unrelated. As the scholarly tradition built itself on prescription books and theoretical debates on cold damage diseases, other healing techniques less dependent on written texts were progressively left to the lower classes of healers. The "lowliness" of these techniques in turn often motivated practitioners to claim mythical
legacies of transmission, not to impress scholars but to enhance their prestige amongst the populace. And it was precisely these mythical elements that repelled elite doctors or scholars. The Yuan scholar Wang Yun 王 예수님 (1227–1304), while explaining that Li Hao had transmitted his knowledge of acupuncture to Dou Mo during the Jin-Yuan transition, also mentioned another acupuncturist who had acquired his art from an "extraordinary being." Wang’s position was clearly Confucian: “Supernatural revelation (shen shou 神授) is no match for the explicitly human transmission from Li Hao to Dou Mo... We should not accept those techniques that are recorded because of their weirdness (guai 怪).” 38

Wang and his like had apparently forgotten about Bian Que 毕竟 of the Warring States period, considered the ancestor of doctors. Bian Que, too, acquired his medical knowledge from an immortal; he was above all a technician, treating gynecological disorders, illnesses of the ear and of the eye of elderly people, and infant illnesses; he was also expert in acupuncture and moxibustion. 39 But it was the second great master of the classic age, Chunyu Yi 张子宜, who represented a scholarly lineage based on text learning, whom post-Song medical scholars admired and emulated. 40

In other words, beginning in the Song medical scholars gradually abandoned to popular practitioners the ancient medical tradition personified by Bian Que in favor of medical learning that was more scholarly than technical. Mainstream medical scholars also asserted their professional stature by legitimating and disseminating their art through the printed word. Like the editors of Yuan drama described by Stephen West (see pp. 359–73), who despised actors and made every effort to divorce texts from their performative context, literati doctors distanced themselves from illiterate practitioners by involving themselves increasingly with texts and theories that championed pulse-reading and drug prescription as proper methods and by abandoning other manual techniques to “vulgar” practitioners. This development was further reinforced by sophisticated frameworks of transmission, which can be documented from the Jin onward.

**Frameworks of Transmission**

Traditional frameworks of oral transmission from master to disciple or within a particular family were stable from antiquity to the Song. 41 But from the Song to the Ming, the influence of the Neo-Confucian movement fostered the establishment of strong “fictive lineages that existed to transmit from one generation to the next charismatic revelations in writings” (Siuin 1995: 194). In addition, new channels for the transmission of medical knowledge, in particular self-teaching and professional networks, also became important.

**The Scholarly Tradition**

The fact that Zhu Zhenheng’s synthesis quickly became the medical orthodoxy was due in no small part to the nature of its transmission. Under the influence of the increasingly vigorous Neo-Confucian movement, the medical learning of men like Zhu Zhenheng became differentiated into “schools” whose boundaries were reinforced by a strengthening of the master-disciple relationship from the Yuan on.

We have little substantial information about transmission through the master-disciple relationship before the Jin period (see Zhu 1991: 182–83; and Chen Yuapeng 1996: 30–31). Apparently loyalty was not important in such relationships, and disciples often studied under several masters. For example, Zhang Kuo 张耦, the favorite disciple of Pang Anshi, also received training from a Wang Pu 王朴 of Sichuan. 42 These relationships often were loose and informal, and “schools” in the formal sense had not yet appeared.

Song masters also tended to be less imposing figures. Qian Yi was described as a type of “romantic” who “was good at all kinds of disorders and not limited to the problems of infants.” To his contemporaries, he was “virtuous like a Confucian and righteous like a warrior. His art and technique were efficient; he lived like a hermit and resembled someone who possessed the Way.” 43 Pang Anshi had an even more colorful personality. Huang Tingjian 黄庭坚 (1045–1105), the great artist and scholar, described the young Pang as someone who loved cockfights, dog races, football and other such sports, gambling, chess, music, and acrobatics; as he grew older, he despised wealth and loved justice and was patient as a mother. He was compared to the wandering knights errant of the Warring States period. 44

With the emergence of the imposing yet charismatic Jin masters, the teacher-disciple relationship seems to have undergone subtle changes. The transmission from Zhang Yuan to Li Gao was a model of the new type of relationship. Li Gao became interested in medicine in his youth, heard of Yuan, and “spent a thousand gold pieces in order to learn from him.” Li was said to have learned everything from Zhang within several years and never studied with another teacher thereafter. 45 Their relationship was new
in two ways: money was an important element in the transmission, and the tight teacher-disciple bond promoted the emergence of what we can term “schools” of medicine. This kind of relationship, which was inconspicuous in previous patterns of medical transmission, became even clearer in the interaction between Li Gao and his disciple Luo Tianyi.

Coming from a wealthy family, Li Gao did not need to practice medicine for a living. “People did not dare to call him a ‘doctor,’” and he naturally did not need to teach for financial reasons. In 1244, when he was 64, he returned to his birthplace in Zhending and gave thought to his legacy. He told an old friend, “I am old, and I wish to transmit my learning (dao 追) to posterity. But it is hard to find a suitable person. What can I do?” The friend recommended Luo Tianyi, a poor doctor. Li then asked Luo, “Do you come in search of money? Or do you seek to be a doctor for the sake of transmitting the learning?” Luo naturally answered the latter, and Li took him as his student. Li provided Luo not only with food and lodging but also with money to raise a family so that he would be free of all material worries and able to concentrate entirely on his studies. Before Li died in 1252 at age 72, he presented Luo with texts and manuscripts he had written and collated during his lifetime: “I give these books to you not for the sake of Li Gao or Luo Tianyi but for the sake of the empire’s posterity. You must be careful not to lose them, and you must promulgate and practice them.”

According to Luo’s account, during his dozen years of apprenticeship with Li he received the master’s utmost personal attention, and in this way he acquired a knowledge that could not have been achieved simply by reading Li’s works. The fruits of this personalized apprenticeship were reflected in Luo’s manuscript on the classification of illnesses by their symptoms and their corresponding prescriptions based on principles of the Inner Canon. As Luo explained, “I did three versions, but my master destroyed the first two of them. He studied the final version meticulously and corrected it. The work was finished in three years.” It was in this way that Li transmitted his learning to his only disciple. To show his respect and gratitude, Luo set up a shrine for Li and “served him as if he were alive even thirty years after his death.”

The Zhang-Li-Luo transmission reveals several important departures from past practices. First, money became insinuated in the relationship, although in different ways. The increased importance of money bears witness to the growing professionalization of scholarly medicine. Although apprenticeship was long and costly, it was likely to lead to a lucrative business, especially if the master was a celebrity like Zhu Zhenheng; Dai Shiyao 賽士做 (1907–49), father of Dai Sigong 戴思恭 (1324–1405; see below), presented a considerable sum to Zhu in order to be his disciple. Second, master-disciple relationships generated new intellectual and affective bonds. The Jin-Yuan master was a much more authoritative and austere figure than his Song counterpart. At the same time the disciple was expected to exhibit the same loyalty, receptiveness, and moral strength seen in Neo-Confucian academic circles. Third, the so-called Jin-Yuan schools of medicine were defined not so much by the substance of their learning, which was in fact quite consistent across schools, as by the distinctive lineages of affiliation established by various masters. This was, of course, a predominantly male tradition, and those who participated in it were largely self-selected elite members of the profession.

The development of schools became especially conspicuous from the early fourteenth century on, when China was reunified and Neo-Confucianism gained a firmer grip on society. School formation is best represented by the case of Zhu Zhenheng. Zhu traced his line back through his master Luo Zhiti to Liu Wansu and forward to his numerous disciples, among them members of the imperial household and children of important literati lineages like the prominent early Ming court doctor Dai Sigong. In addition, an influential school of medicine centered on Zhu Zhenheng had taken firm root in the early Ming, especially in the Jiangnan region. Mainstream Ming-Qing medicine never challenged the synthetic approach of the Zhu school, which was enriched but not transformed by the rising southern influence. But the impact of this tradition would not have been as great had there not been a second development in the transmission of medical knowledge: the consolidation of medical lineages in southern China.

The role of family as a major framework for the transmission of medical knowledge was as old as the master-disciple relationship. Clans and lineages noted for their physicians could be found in antiquity, and aristocratic families served as conservators of medical knowledge during the Six Dynasties period from the fourth to the sixth centuries (Fan 1986: 57–62). In the Song, many famous doctors were trained within their own family or lineages. “Hereditary physician” (shiyi 世醫) was already a common term in the Northern Song. The longest-lived medical lineage is believed to be that of the He family of Songjiang 松江 (Jiangsu), which originated in the early thirteenth century and lasted until the 1850s.
Even the great masters of the Jin-Yuan period were either trained by their families or keen to train their own children. Zhang Yuansu taught his son Bi 張璧 to be a doctor, and Zhang Congzheng claimed that he had been initiated by his family.\(^{64}\) Physician lineages that spanned the Northern Song through the Jin did exist in north China, though they do not seem to have been prevalent or long-lasting (Chen Yuanpeng 1996: 82).

Durable and extensive physician lineages did not again become predominant until the Yuan had unified China and the center of medical studies had shifted back to the south. In addition to numerous disciples, Zhu Zhenheng also taught his son Yuru 朱玉如 and his nephew Sifan 朱師凡. Both became famous doctors in Zhejiang in the early Ming. Yuru’s son Wenyong 朱文永 became a county-level medical officer (xunke 講科). The last member of the Zhu clan known to have practiced medicine was Yuru’s grandson Zongshan 朱宗善, a famous doctor in the mid-1430s.\(^{65}\) Among the numerous southern medical lineages emerging during the Yuan-Ming transition were the Ge 葛 family of Suzhou, the Dai 戴 family of Jinhua, and the Jiang 江 family of Yizhen 峡真 (Jiansu). All were linked intellectually to Zhu’s synthetic learning of the Yuan (Tian et al. 1991: 157–58; Wu 1993: 94: 50–56; JYRR, pp. 65, 268), thus enhancing the prestige of the Jin-Yuan schools. Such lineages became even more common in the Ming-Qing period, especially in Zhejiang, Jiangsu, and Anhui provinces.\(^{66}\)

Clans and lineages depended on socio-political networking, acquisition of power within their locality, and a continuous monopoly over certain kinds of expertise to preserve their pre-eminence through the generations. These concerns provided women an opportunity to play a role in the transmission of medical learning. Although written sources usually disregard women’s roles in medical lineages, sporadic records do show that they definitely, and probably increasingly, participated in the transmission of medical learning within the family. The more successful among them greatly enhanced the status of their clans.\(^{67}\)

The active participation of women in the transmission of medical knowledge within the family grew apace with the consolidation of lineages in southern China from the Song to the Ming-Qing periods. Khubilai Khan’s personal doctor Xu Guozen 許國善, who together with Luo Tianyi compiled the Materia Medica of the Great Yuan Dynasty (Da Yuan bencao 大元本草)—the only officially sponsored work of its kind in the Yuan—was probably trained by both his parents. His mother, née Han 韓, was a famous doctor and dietician and served the empress at the court. Wang Dongye 王東野, a prominent medical official from Jiangxi in the late thirteenth century whose father and grandfather were famous doctors in their hometown, was trained in his youth by his grandmother. He Yanze 盧彥澤, who served the Yuan court, and whose grandfather and uncle served the Jin court, also had an aunt, née Li 李, who served the imperial household in a medical capacity. Women learned in medicine and active in society became common in the Ming-Qing period. Many of them read pulses, cited classics, and offered diagnoses in the same way as male scholarly doctors. Some made their way to the court; others competed with male doctors in society. They were called nüyi 女醫 or yipo 醫婆 (female doctors).\(^{68}\)

In addition to women physicians trained by their family to follow a career in court or in society, there also were women of more lowly status who acquired medical knowledge by serving as assistants to famous doctors. One such example is a maidservant of Zhang Congzheng who apparently learned directly from her master. She gave advice to patients in emergencies when Zhang happened to be away.\(^{69}\)

The little we do know about women’s roles as practitioners and teachers and their professional activities comes mostly from scattered writings by their male relatives or male compilers of gazetteers. It is not until the later Ming and Qing periods that medical writings by women became accessible to outsiders, thanks to a more dynamic print culture and possibly also to an increasing number of literate women learned in medicine. Two such examples are the works of Tan Yunxian 譚允賢 (1461–1554) from Wuxi 無錫, on whom Charlotte Furth has written, and those of Zeng Yi 曾懿 (1553–c) from Sichuan province (Leung 1999: see also Furth 1999: 285–97; Zheng 1999).

A third model of medical transmission, that of the self-taught physician, first appeared in the Song. Among the important doctors of the scholarly tradition are many such examples, such as the famous Northern Song cold factor disorder specialists Xu Shuwei and Zhu Gong and the Jin masters Liu Wansu and Zhang Yuansu.\(^{70}\) Liu Wansu was said to have devoured numerous medical books as a young man and experienced a vision in which the secrets of medicine were suddenly revealed to him by two Daoist immortals.\(^{71}\) Similarly, Zhang Yuansu dreamed one night of a hole being drilled into his heart inside which several books were placed; from that night on, he understood the essence of medicine.\(^{72}\) The legends (tinged by Daoist lore) surrounding the “enlightenment” of Liu and Zhang nonetheless affirm
that books were essential to their acquisition of learning. In addition, both Li Gao (the student of Zhang Yuan-su) and Zhu Zhenheng (the "academic great-grandson" of Lin Wansu) studied texts on their own for a number of years before they found a teacher. The examples of Li and Zhu show how natural and easy it was for people with a background of Confucian learning to turn to medicine.

That these learned and innovative doctors could teach themselves medicine reveals two facts: first, medical texts had become increasingly available, so that learning was no longer exclusively monopolized by a few masters or lineages; and second, a growing number of medical experts were deeply versed in classical studies. Indeed, many Song-Jin-Yuan-Ming doctors began as conventional scholars and subsequently shifted to medicine for various reasons. Robert Hymes's 1987 study of the background of ruyi 儒醫 (Confucian doctors) in Yuan Fuzhou 福州 (Jiangxi) demonstrates the intrinsic relations between Confucian and medical studies at this time. More recently, Chen Yuanpeng (1996) shows in his study of the meaning and evolution of ruyi that the two major types of ruyi—Confucian scholars learned in medicine and professional doctors whose training and ethics were comparable to the idealized Confucian scholar—already existed in significant numbers as early as the Northern Song. The increasing number of self-taught doctors from this time on went hand-in-hand with the growth of the ruyi phenomenon.

Another new means of transmission that appeared in the Song and grew considerably during the Jin-Yuan periods was the "professional network." It became quite common for medical knowledge to circulate and grow within different networks made up of scholars and doctors. One famous example in the Northern Song period was the relationship between Pang Anshi and the scholars Su Shi and Huang Tingjian. Both Su and Huang wrote prefaces for Pang's work,73 and Pang incorporated into his own work a "secret prescription" given to him by Su, who believed it to be effective for stopping epidemics.74

Similarly, relations between several Jin masters and their scholar friends also helped promote medical learning. Zhang Congzheng, for example, taught medicine to his younger friend Ma Jiuchou 马九畴 (1174–1252). Ma, who led a reclusive life during the Jin, belonged to a circle of famous scholars and doctors that included Zhao Bingwen and Chang Yonghui 常用晦 (1178–1251). It was said that Ma "learned everything from Zhang," and that he deeply admired Zhang's representative work, Rumen shiqin.75 Li Gao first became acquainted with his friend Yuan Hauwen in 1328 when both fled Kaifeng to escape the Mongol invasion and traveled together in Shaanxi and Shantung for six years. Yuan wrote prefaces to many of Li's works.76

Many examples of such scholar-doctor friendships can be found in the Yuan and Ming. A typical case is Xiang Xin (see above), who, besides being a friend of many scholars, was acquainted with and learned from at least seven of his colleagues in the Jiangnan region, including Zhu Zhenheng and Ge Keju 葛可久.77 In an analysis of 46 works by Jin, Yuan, and early Ming scholars, Chen Yuanpeng (1996: 154–59) shows that doctors and scholars formed dense and complex networks during this period. Moreover, these works reveal that many Confucian luminaries, such as Dai Liang and Song Lian, acquired a competent knowledge of medicine by befriending doctors, or that their friendship was based partly on their shared medical knowledge.

The popularization of printing and the expanding book market played an essential role in the development and transformation of medical knowledge from the Song on. Printed books were increasingly available in greater quantities and at cheaper prices from the late eleventh century (Cherniak 1994: 44–47). As Lucille Chia shows elsewhere in this volume (see pp. 324–328), the stable growth in the publication of medical books paralleled that of the Classics and Confucian writings during the Yuan and Ming. For medical books alone, including medical classics, prescriptions, and materia medica, there were at least 44 imperially sponsored works published during the Song, most before the mid-twelfth century. In addition to the many that were widely distributed by the government, some texts later were reprinted privately numerous times (Chen Yuanpeng 1996: 40–46). With the increasing number of privately edited and published medical books, medical knowledge was inevitably democratized since it was no longer possible for a few masters or lineages to monopolize the teaching of medicine. This partly explains the explosion in medical knowledge after the twelfth century.

Indeed, as we have already seen, the number of autodidacts among doctors grew beginning in the twelfth century. Zhu Gong was certainly one of the first scholars who benefited from the 1065 imperial edition of Zhang Ji's classic On Cold Damage Disorders, which was widely distributed. Zhu studied it with great interest and published A Hundred Questions on Cold Damage Disorders (Shanghai baiwen 傷寒百問) in 1107. Zhu's work soon earned him
prestige and a high office in the medical bureaucracy. Zhu’s contemporary Xu Shuwei, who decided to teach himself medicine at age eleven when both his parents died during an epidemic, also benefited from the imperial editions of On Cold Damage Disorders as well as various prescription books. Xu’s writings on cold damage disorders and popular prescriptions were based on his research on these widely distributed printed texts. The 1027 imperial edition of the Inner Canon and the many works on cold damage disorders and prescriptions published during the Northern Song period stimulated the new ideas of the Jin masters, who based their innovations on their study of the Inner Canon and their criticisms of the other works. Self-taught doctors would indeed become even more common after the Yuan period, as printed books grew even more accessible.

Printing also helped to propagate new trends in medical thought and practice, and after the Jin period it played a key role in the construction of medical schools. If printed classics promoted medical study in general from the twelfth century, the Northern Song government’s policy of promoting “efficient” prescriptions for cold damage disorders in order to provide practical medical information to its people created a trend that both drew criticism and inspired innovation in the Jin period. The popularity of Zhu Gong’s handbook on cold damage disorders, first printed in 1111, prompted him to publish another popular handbook on cold damage disorders. By 1118, this book had been printed in five different places, from the capital to Zhejiang. Unhappy with the errors in the printed versions, Zhu had new woodblocks engraved by a printer in Hangzhou. A new, easy-to-use, mid-sized-print version was later published for wider distribution, and doctors could carry it wherever they traveled. It became a very popular medical book and instantly made Zhu an authority on the subject. As we have seen, the authoritative stature of this work made Zhu Gong a special target of criticism by the Jin masters.

Similar stories can be told of prescription books. The famous Prescriptions of the Medical Bureau for Benefiting the People Under the Great Peace began as an imperial attempt to rectify all existing prescription/method books and to establish an authoritative source: “All public and private works were collected so that none would be lost out. . . Errors were rectified, confusions clarified, missing parts filled in, repetitions deleted. The book was finished in less than a year.” The first edition was published by the government during 1106–11, reprinted at least six times during the Southern Song period, and reprinted numerous times by private printers throughout the Song period. This work’s pre-eminence within the Song medical tradition to a large extent resulted from its history as a printed book. The many Song editions of Xu Shuwei’s only prescription book and the tremendous influence of one Su Shi prescription textly to the enthusiasm for the publication of prescriptions.

In contrast, works by Qian Yi, Chen Ziming, or Chen Yan that had a closer kinship to those of the Jin masters were relatively marginalized by the Song publishing industry. Although they would receive more attention in later ages, such works did not catch the attention of major Jin-Yuan and early Ming medical scholars.

The authority and the tremendous influence of the Jin-Yuan masters in the early Ming was related to the publication of many of their works, especially those of Zhu Zhenheng, the synthesizer and teacher of many influential disciples. The works of Liu Wansu, Zhang Congzheng, Zhang Yuansu, and Li Gao were published during the Jin period, and many of them were reprinted during the Yuan, a crucial period for medical publishing. Zhu Zhenheng himself published some of his writings toward the end of his life. But many of his manuscripts were annotated and compiled into at least twelve printed books by his disciples and admirers and were re-edited numerous times from the late fourteenth through the seventeenth centuries in many parts of China. Moreover, works by Jin-Yuan masters were often adorned by prefaces and postfaces by prominent Confucians such as Wang Yun, Wu Cheng 吳澄 (1249–1333), Song Lian, and Dai Liang, which significantly elevated the status of these books as scholarly works. These facts partly explain the great influence of these Jin-Yuan masters on their immediate successors.

It is clear that the Northern Song state, as the major source of printed books, was the main force in formulating trends in medical research. From the twelfth century on, networks formed by doctors and scholars, together with private printing houses, began to play an increasingly important role in the publication business, setting trends and creating medical stars. However, at this stage we know too little about the different aspects of the cultural history of the printed book (for example, Who decided what to print? In how many copies? In what format? What scholars were associated with which printing houses? What books were intended for what readerships?) to
have a more exact idea of the role of the printed book in the history of the transmission of medical knowledge in this crucial period.

The Nonscholarly Tradition

Parallel with the consolidation of the scholarly medical tradition was the continuous development of nonscholarly medical techniques transmitted within similar frameworks, especially from teacher to disciple and within the family. This tradition, as we have seen, might have profited from the splitting of academic and popular learning after the Song, as disciplines requiring more technical training or physical contact with patients were increasingly left to often-illiterate plebeian doctors. As in the case of drama described in this volume by Stephen West (see pp. 329–73), in medicine we also see the continued development of oral and popular traditions that were jettisoned by text-based traditions increasingly monopolized by literati. Because of its essentially oral nature, we have few sources on the transmission of popular medical knowledge. However, two obvious differences from the scholarly tradition can be mentioned: books occupied an insignificant place in the transmission of knowledge, and women played an important role.

One indirect form of evidence for a dynamic tradition in popular medicine is the increasing suspicion of female medical practitioners by respectable families. As early as the Southern Song period, Yuan Cai (ca. 1140–90), the author of the famous family handbook, Precepts for Social Life, warned that "women who claim to be dealing in acupuncture needles and moxa must not be allowed into the household." By Yuan times, shaman-healers, medicine sellers, and midwives were among the nine categories of professional women grouped together in the pejorative term "three kinds of old female devotees and six types of old wives" (sangiu liuwo 三姑六婆); the implication was that they were morally base and corrupting women whom good families should avoid as if they were "snakes and scorpions." The evolution of this term reflected an increasing anxiety toward these women's influence in society. Indeed, records of Daoist women practicing medicine abound in literati writings and gazetteers from the fourth century Jin dynasty to the early Ming. Most female practitioners of all eras were said to be specialists in acupuncture, moxibustion, ophthalmology, skin diseases, and midwifery or engaged in medicine selling and healing through shamanism.

Their male counterparts—those who performed eye operations, practiced acupuncture, and cured carbuncles—were no longer honored as true descendants of Bian Que. Instead, they were increasingly looked down on as "vulgar" and "lowly" country people by literati medical scholars, now more conscious and confident of their professional status as legitimated by the printed word. The Yuan scholar Wu Cheng expressed sympathy for some of these doctors and found it unjust that in his time Bian Que's descendants were belittled. Wu Cheng once defended an ophthalmologist, dismissed by others as a "vulgar doctor" (suyi 俗醫), as someone he thought should be as honored as Bian Que had been. Wu's viewpoint was not shared by the majority of scholars, however.

The prevailing attitude was exemplified by Luo Tianyi. With obvious contempt, Luo railed against the popularity of illiterate doctors, who were called "fortunate doctors" (fuyi 福醫):

People say that physicians of high reputation (mingyi 明醫) are no match for "fortunate doctors." Somewhere some doctor might not be well read in medical books, know little about pulse and symptoms, but since he has treated many cases, and his treatment is always effective, people consider him a fortunate doctor. The saying that "You may perhaps read Wang Shuhe, but you cannot compete with one who has clinical experience" is believed by many.... Alas! The "fortune" of these doctors benefits them alone; how could it eliminate the suffering of the sick? People do not understand this and confide their lives to these "fortunate doctors." Even when health is damaged and lives are lost, people still do not comprehend. This is an extreme example of befuddlement. How sad.

The testimony of Wu Cheng and Luo Tianyi, in conjunction with the currency of the term sangiu liuwo, evince the continuous growth of the popular medical tradition in the Song-Jin-Yuan period and show that these healers of the popular tradition, men and women alike, remained highly competitive despite elite disapproval. The consolidation of the scholarly tradition did not hinder the careers of popular practitioners. Government authorities periodically tried to regulate these practitioners, but always in vain. Lu Kun (1536–1618) in the late Ming proposed that an appointed local medical administrator should order all medical practitioners exercising their trade in his jurisdiction, men and women alike [italics added], to undergo an examination. Each chooses a specialty. They should be divided into three categories according to their results. Those belonging to the first one could be given a proper medical training [by book]; those of
the middle category, hardly literate, should be taught only to memorize individual prescriptions; those of the last category should be allowed only to sell medicines but forbidden to treat patients.  

Liu's proposals were never implemented, but they betray how robust the popular tradition remained centuries after the consolidation of the scholarly tradition. This tradition was even recognized as intrinsically valuable by some experts, such as the scholar-pharmacist Zhao Xuemin 趙學敏, who recorded the words of an itinerant doctor in his Collection of Proper Methods (Chuanya 转雅), first published in 1759.

The split between the scholarly and the popular medical traditions occurred during the long Song-Yuan-Ming transition, and persisted thereafter. This change was closely related to the emergence of several new elements during the Song: the popularization of printing; the growing importance of literati lineages, whose cultural and socio-economic prestige was now linked to the civil service examinations; and the rise of the Daoxue school. Although medical learning was never incorporated into the civil service examinations and never became a priority within elite education, it was nevertheless appropriated by the increasingly dominant Confucian tradition and the literati stratum in the Song and after. The bookish, theoretical side of the classical medical heritage favoring pulse-reading and prescription of medicines developed into a scholarly tradition that gradually overcame initial regional differences to become an eclectic and synthetic body of learning during the Yuan-Ming transition. The increasing influence of southern culture came only later, in the Ming-Qing period.

The popular tradition, in contrast, continued probably very much in the same vein as before the Song, with some regional variation. Marginalized—but not effectively controlled—by the medical elite, popular healers remained influential in society, for they could not be replaced by the elite, who, after all, "civilized" only certain, but far from all, aspects of the ancient medical tradition.


CHAPTER 10


Index

Abu-Lughod, Janet, 62-63, 70
Academies, private, 23, 26; and Neo-Confucianism, 255, 257-58, 262-63, 273-75, 279, 302; publishing by, 289, 295, 305
—individual academies: Baifuhua Academy, 444-488; Chengnan Academy, 263; Four Worthies Academy, 263-64; Hengcheng Charity School, 263; Hongruan Academy, 258; Lize Academy, 262-64; Longchuan Academy, 444-488; Nanyuan Academy, 258; Qihan Academy, 277; Renahan Academy, 444-488; Shangcai Academy, 272; Taiji Academy, 120; Wuyi Academy, 268; Wuwun Academy, 263; Yuequan Academy, 263, 444-488
Adachi Keiji, 159, 171
Agricultural systems, 121; crop rotation and, 153-54, 159-61, 175; double-cropping, 12, 122-3, 156-57, 159-60, 165, 173; fertilizer and, 154, 157-59, 174; regional variation in, 54. See also Agricultural Irrigation; Land; Land/labor ratio; Rice
Agricultural growth of, 11, 171-75; in Jiangnan, 136-55, 158-82; technology, 153-54, 156-57, 173-74; yields, 167-71, 174-75. See also Agrarian systems
Ajall, Saiyid, 121

Akan Khan, 84
Amitabha Buddha, 194-95, 200
Ancestral halls, 35, 205
An Lushan rebellion, 245
Annales school, 48
Arighi Böke, 81
Asian regional networks, 57, 64-67
Asiatic mode of production, 39
Autocracy, 22, 40, 52-53, 86-87, 101, 104
Ayurbarwada (Yuan Emperor Renzong), 236

Bai Juyi, 170
Balazs, Erzsebet, 62
Barfield, Thomas, 118
Baru Mongke, 84
Bayan, 78
Bentley, Jerry, 58, 64
Bernal, Karl, 435-65, 437-94
Bian Que, 386, 397
Biji (miscellaneous writings), 71-72, 294
Birge, Bertine, 26-28, 69-70, 94
Black Death, 57, 65, 138
Bloch, Marc, 404-33
Bo Yi, 279
Bol, Peter, 28, 69
Bookstores, 106-7, 300
Bourdieu, Pierre, 47
Braudel, Fernand, 48, 61-63
Bray, Francesca, 33
Brook, Timothy, 109