Traditional Chinese Medicine as an Australian Tradition of Health Care

by

Rey Calingo Tiquia
BA (Manuel Luis Quezon University, Philippines), Bachelor of traditional Chinese Medicine (Beijing College of TCM, Beijing, China), MSc (University of Melbourne)

A thesis submitted in total fulfilment of the requirements of the degree of Doctor of Philosophy

History and Philosophy of Science

Faculty of Arts

The University of Melbourne

July 2004

Produced on acid-free paper
Abstract

This thesis is an intervention in the on-going 'conversation' between traditional Chinese medicine (TCM) and Western biomedicine. It suggests how that conversation can be improved by putting the emphasis on practices and de-emphasising mutual theoretical explanation. I consider some episodes in the one hundred fifty year history of TCM in Victoria and argue for new ways of translating between knowledge systems, proposing the idea of a 'translating knowledge space'. I elaborate ways of understanding the 'TCM body' and treatment modalities in the light of this proposal.
Declaration

Except where otherwise acknowledged, the work presented in this thesis is original

and my own, and has not been derived from, or presented in, any earlier work of mine.

I declare that this work is less than 100,000 words in length, exclusive of bibliographies

and appendices.

[Signature]

--- July 2004
ACKNOWLEDGEMENTS

I am indebted to my principal supervisor, Professor Helen Verran, who was the guiding light that helped this dissertation come to life, grow and find its way through the dark alleyways in the course of its long journey to eventual completion. My project on the practice of traditional Chinese medicine (TCM) in Australia first saw light when I attended the Masters of Science course subject ‘Science in Society’ in 1991. Looking over past draft chapters of my MSc minor thesis, essays and two (or three) ‘bundles’ (draft chapters) of my PhD dissertation (all in all, about six plastic boxes of documents which occupied one of my two treatment rooms), I can see that Helen spent countless hours reading and re-reading them and then making extensive pencilled commentaries on them. This is discounting the hours she spent replying to my persistent and numerous e-mails and telephone inquiries. Like the bamboo tree, Helen demonstrated in action that she is a constant and reliable supporter of traditional Chinese medicine (TCM).

I have to thank my Australian patients i.e. the ‘TCM bodies,’ who were not only direct participants in this study but also, in a way, provided the ‘scholarship fund’ that kept my private TCM practice and this study afloat for almost one and a half decades. Special mention has to be made of Colin Ryan, who did a careful reading of the dissertation. I therefore dedicate this work to all of them.

I would like to acknowledge the support I received from the friendly and helpful librarians and staff of the East Asian Collection and Special Collections in the Baillieu Library at the University of Melbourne. I would like to specifically mention Bick-Har Yeung, Lo-Pei Kneale and Anne Hoban.

I extend my gratitude to the organisers of the Australian and international conferences, symposia, and seminars who invited me to participate and present different aspects of my thesis. They include Professor Gary Warne, Doctor Amelia Dozzi and Mr Frank Kelly from the Royal Children’s Hospital International; Professor Paul Komesaroff and Ms Kylie O’Brien from the Baker Medical Research Institute and Monash University; Doctor Adrian Mar, editor of the Qi 2000, which is the annual publication of the Chinese Medical
Association (Vic.) Inc.; Professor John Fitzgerald, Sophie Couchman and Paul Mcgregor from the Chinese Heritage of Australian Federation Conference; Carey Robinson, Assistant Director Wildlife Protection, Environment Australia, for the invitation to present a paper before the ‘Healthy People - Healthy Wildlife: A Symposium on Traditional Medicine and Wildlife Conservation,’ Royal Melbourne Institute of Technology, 17 March 1999; Doctor Waltraud Ernst from the Department of Sociology and Social Policy, University of Southampton, who organised the conference ‘Plural medicine - orthodox and heterodox medicine in Western and Colonial countries during 19th and 20th centuries’ (1998); Ms Long Siew Chen from the Eu Yang Sang Chinese Herbal Company in Singapore; Livia Kohn and Liu Xun from Boston University who organised the ‘Daoism and the Contemporary World Conference,’ 5-7 June 2003.

I would like to thank Ms. Terry Smyth, a curator of the Royal Botanic Gardens in Melbourne who facilitated my ‘initial encounter’ with some of the plant Chinese materia medica thriving in Australia. My gratitude extends to Professor Rod Home for arranging this visit.

I am grateful to the Wellcome Trust for the invitation they extended to me to attend and participate in the ‘Closed-Door Research Conference on Complementary and Alternative Medicine’ in London in March 2000. I would particularly like to thank Verena Collins, the Conference Administrator of the Wellcome Trust, for organizing all the travel arrangements and accommodation that made my stay in the United Kingdom a very memorable one.

I would like to thank the History of Science Society for providing travel-grant funding which enabled me to present the core theoretical framework of my thesis before the History of Science Society’s 2002 meeting in Milwaukee, Wisconsin USA.

I would like to thank my daughter, Ana Marikit Tiquia, a media art student, and the artist who did the line illustration of the body chart. And last but not least, I would like to pay homage to my wife, Margaret Fuary, a life partner, engaging discussant, and Australian cultural mentor. I am grateful for her frank feedback to some of the ideas exemplified in this thesis which made me and this thesis more robust.
### TABLE OF CONTENTS

**Prologue:** 1

*A Brief Consideration of how interactions between traditional Chinese Medicine and Western Biomedicine have Unfolded over the Past Half Millennium*

- Early interaction Between Medical Traditions 1
- Institutionalisation of Western Biomedicine in China 5
- TCM in the Communist era 8
- Translations 11
- Tang Zong Hai 12
- Wu Rui Pu 13
- Zhang Xi Chun 15
- Zhu Pei Wen 15
- Yun Tie Qiao 16
- Endnotes 20

**Chapter 1**

*Snapshots of Working Knowledge Traditions Together in an Era of Globalization, and My Participation in that Emerging Knowledge Space*

- Traditional Chinese Medicine: A Globalising Phenomenon 22
- An International Meeting on TCM-Towards Joint Research 25
- The Narrator- A Practitioner of TCM In Contemporary Australia 30
- Participating in TCM in Australia at the end of the Twentieth Century 34
- A Controversy 41
- Construction of a ‘Dialogical Space’ ? 44
- Randomised Control Trials-A Translation Issue 47
- Performing a "Translating Knowledge Space" 58
- Endnotes 68

**CHAPTER2**

*Contemporary Traditional Chinese Medicine and Western Biomedicine:*

*Some issues Associated with Contingent Assemblage of Translating Knowledge Spaces* 71
Possibilities for Translating Assemblages 79
Asymmetrical Translations: Scientising TCM Objects 84
Practising Traditional Chinese Medicine—Local Knowing 89
Qi 氣 in Action and Transformation 91
Differentiating Clinical Patterns 101
Conceptual Templates 102
The Eight Principal Patterns Ba Gang 八脈 103
Restoring Balance 107
An Exemplary Case 108
Language Use As Exemplary Translating Practice 111
TCM Clinical Practice 116
Endnotes 120

CHAPTER 3 125
Glimpses of an Australian Traditional Chinese Medicine Past 125
Exhibit One 129
The Medicine Bottle 128
The Bottle Label 132
Bottle Contents: Yao Powder 133
An ‘Iron Boat’ Yao Grinder 鐵船 134
The ‘Bottler’ - F.S. Goon 136
The Fang or Formula of Prescribed Materia Medica 137
A Standard balancing tool Tian Ping 138
English instructions for boiling a decoction 140
Exhibit Two 141
TCM Practitioners and Diphtheria in the Colony of Victoria 146
Lo Kwai Sang 148
The History of Diphtheria in Traditional Chinese Medicine 152
A Controversy 155
‘The Trial’ 158
Exhibit Three 165
Endnotes 173
Appendix 1 to Chapter 3 175
### CHAPTER 4

- **The TCM Body in a Translating Knowledge Space**  
  Page 176
- Ballarat, Bodies, ‘Maps’ & ‘Icons’  
  Page 176
- Does TCM Have a Body?  
  Page 178
- ‘Orbs’, ‘Structure/Functions’ and Modernity  
  Page 179
- The Body Chart  
  Page 181
- Inner Body Landscapes and Acu-tracts  
  Page 182
- Illustration no.1  
  Page 183
- Illustration no.2  
  Page 184
- Illustration no.3  
  Page 185
- The Generation of the Inner Organ Body Chart  
  Page 186
- Anatomy, Forensic Medicine, and Medical Education as Well as Medical Facilities  
  Page 187
- Yang Jie- ‘The Anatomist’  
  Page 190
- ‘The Dissection’  
  Page 193
- The Body-As-Machine  
  Page 194

Male human body with acu-points and acu-tracts against an osteological background  
Page 196

- A Translating Image: The Body As A Living Bamboo Tree  
  Page 197
- An Ode To the Inner Body Landscape  
  Page 203

The TCM Body, The Corporate Body of TCM Practitioners and the ‘Body of Yao ‘- A Three-way Mirroring  
Page 208

- Acu-tract map (front view)  
  Page 209
- Acu-tract map (back view)  
  Page 210

### Endnotes

- Appendices to Chapter 4  
  Page 224
- Appendix 1 The Inner Body Landscape  
  Page 224
- Appendix 2 “The Five Visceral and Six Hollow Organs”  
  Page 225
- Appendix 3 Portraiture of the Inner Organs  
  Page 226
- Appendix 4 Inner Body Portraiture  
  Page 227
- Appendix 5 “Ming Tang Ventral/Dorsal Inner Organ Portraiture “  
  Page 228
- Appendix 6 Ming Tang Inner Organ Portraiture  
  Page 229
Appendix 7a Doctor Benjamin Hobson’s *Treatise on Midwifery and Diseases of Children* 230
Appendix 7b Biomedical drawing of an infant coming out of birth canal 231
Appendix 7c Biomedical illustration of inner and outer uterus 232
Appendix 8a Front cover of the book *State of Viscera and Anatomy* 233
Appendix 8b Respiratory system ‘superimposed’ on TCM ‘lungs’ 234
Appendix 8c Reproductive system ‘superimposed’ on TCM ‘urinary bladder’ 235

CHAPTER 5

‘Doing’ the Qi in a Translating Knowledge Space 236

*TCM Treatment Modalities* 236

The *Yao* 藥 239
The Medicinal Value of *Yao* 241
*Yao* In China 243
Chinese Materia Medica 244
Western *Yao* 248
Thriving Chinese Materia Medica in Australia 249
Chinese Materia Medica and Endangered Species 255
Chinese Materia Medica and Biomedical Entities - The Interactions (CMMPPPI) 257

*Yao* and the TCM Practitioner: Chinese Materia Medica and Rhyming Poems 261

Chinese Materia Medica and Rhyming poems or *Ge jue.* 263

Acupuncture As A Therapeutic Practice That Balances the Flow of Qi--- 269
Acupuncture Charts and Figurines 270
The Twelve Regular Acutracts 273
The Acupuncture Bronze Figurine - Anatomical Tool 276
Acupuncture Mechanism: ‘Plausible’ or ‘Practical’ 279
Intervening in the Qi, Clinical Trials and the Translating Knowledge Space 284
James Lind’s Wholistic Clinical Trial Circa 1774 289
Evaluating Yao in the Twenty-first Century 292

Endnotes 301

Appendix 1, Chapter 5 305

Appendix 2, Chapter 5 Table of essential plant yao growing in Australia 306

CHAPTER 6 316

Recognising Qi 316

An Encounter with the Qi in Melbourne, Australia 316

Qi, 'Chee,' 'Energia' 317

Using Materia Medica To Bring Down Maria’s Rising Asthmatic Qi 318

De Qi and the NH&MRC In Australia 321

Practical Mechanism of Paul’s Case 323

A ‘Live’ Practical Mechanism of Acupuncture 324

Acupuncture and Qi Transformations 氣化 325

The Most Comprehensive Description of the ‘De Qi 332

The De Qi, The Acupuncture Stimulation/ Response and the Acu-tracts 337

Needham’s Encounter With the Qi 340

The Shen Effect and the Placebo Effect 341

Endnotes 345

BIBLIOGRAPHY (English language materials) 347

BIBLIOGRAPHY (Chinese language materials) 379
List of Tables, Figures and Illustrations

1. ‘Stroke order’ step-by-step construction of the Chinese script for
   the word ‘medicine’ 115
2. An Australian TCM Herb Bottle Circa 1901 130
3. Electric power generated ‘iron boat’ grinder developed in contemporary
   China 135
4. Bronze iron boat grinder in use 136
5. A formulae of prescribed Materia medica 138
6. A Standard Balancing Tool 139
7. English Instructions for Boiling a Decoction 140
8. Lo Kwai Sang’s advertisement in the Balarat Evening Post in 1874 147
9. Lo Kwai Sang 149
10. Evening Post 13 May 1875 151
11. Diphtheria Cure-Clinical Trial, Victorian Hansard 1874 163
12. The Australian Medical Journal 1874 164
13. Bottles in Bendigo 1852-1930 175
14. Body Illustration No.1 183
15. Body Illustration No. 2 184
16. Body Illustration No. 3 185
17. Yang Jie 191
18. Acu-tracts superimposed upon modern anatomical diagrams 196
19. Acu-tract Map - Front View 209
20. Acu-tract Map - Back View 210
21. The Inner Body Landscape 224
22. The Five Visceral and Six Hollow Organs 225
23. Portraiture of the Inner Organs 226
24. 16th Century Inner Body Portraiture 227
25. Ming Tang Ventral/Dorsal Inner Organ Portraiture 228
26. 1875 Ming Tang Inner Organ Portraiture 229
27. Front Cover of the book Treatise on Midwifery and Diseases of Children 230
28. Biomedical Drawing of Infant Coming out of Birth Canal  
29. Biomedical Illustration of Inner and Outer Uterus  
30. Front Cover of the book *State of Viscera and Anatomy*  
31. Biomedical Illustration of Respiratory System Superimposed on TCM Lungs  
32. Biomedical Illustration of Reproductive System Superimposed on TCM Urinary Bladder  
33. Dichroa febrifuge  *Chang Shan*  
34. Gardenia jasminoides  *Zhi zi*  
35. Platycodon grandiflorus  *Jie geng*  
36. Ligustrum lucidum  *Nu zhen zi*  
37. Paeonia lactiflora  *Bai shao*  
38. Rosa laevigata  *Jin ying zi*  
39. An English language version of Yee Quock Ping’s medical credentials  
40. Table of Plant *Yao* Growing in Australia
Prologue: A Brief Consideration of how Interactions between Traditional Chinese Medicine and Western Biomedicine have Unfolded over the Past Half Millennium.

This thesis is concerned with practising traditional Chinese medicine (TCM) in contemporary Australia. In the beginning, by way of background, I look very briefly at how interactions between TCM and Western biomedicine unfolded over the past half a millennium. This brief overview is followed by a beginning chapter which provides some detailed snapshots of what might be called the ‘social life’ of traditional Chinese medicine in contemporary modern society. It also serves in part to exemplify and justify what might be seen as the odd methodology of my thesis which attempts a syncretic ‘double insider’s’ explication. I try to be ‘inside’ both the analytic tradition of contemporary science studies and ‘inside’ contemporary TCM practice and analysis. Chapter 2 extends this into issues of theory, and Chapter three further exemplifies my approach by presenting three exhibits of a TCM past in Australia. Chapters 4, 5, and 6 then give re-readings of entities embedded in contemporary practice of traditional Chinese medicine in today’s Australia.

Early Interactions Between Medical Traditions

For almost half a millennium traditional Chinese medicine and biomedicine have been abutting each other, yet for the most part failing to generatively translate each other. This marathon conversation, or lack of it, between the two medical traditions has unfolded for the most part in China. It has been embedded in the diverse trajectories of colonialism, imperialism, feudal dynasties, the republic, modernity, Maoism, science and scientism.
During the late Ming and early Qing dynasties (1500-1700) in China, which also coincided with the Renaissance or modern period in European history, European missionaries came to China bringing with them artefacts of technoscientific: microscopes, telescopes, triangular prisms, thermometers, timepieces, barometers, sundials and world maps connected with the local Chinese Yin-Yang landscape. This ‘landscape’ was dominated by such things as ornate porcelain China, fine silk, acupuncture needles, Chinese materia medica, bronze acupuncture models, Feng shui compasses and moxibustion. From this historical encounter ensued four centuries of conversation between these embodiments of Western European and Chinese civilizations. Within the ranks of the European missionaries were science and medical practitioners who discovered the efficacy of technoscientific and medicine in spreading the Christian faith. S.M. Hillier and J.A. Jewell, in their book *Health Care and Traditional Medicine in China, 1800-1982* (1983), wrote about the ambivalence of European and American medical missionaries when balancing evangelical work with the practice of scientific medicine. This is reflected in a quote from the 1887 maiden editorial issue of the *Chinese Medical Missionary Journal*:

Our calling as physicians is to relieve bodily suffering and to make the benevolent work auxiliary to the higher and more important object of making known the Gospel to those who are in ignorance of the message of salvation.

We find prevailing in China not only false systems of religion but false theories of medicine and while we aim to give them a system of religion founded on external truth, we will also endeavour to introduce a knowledge of the sciences on which is founded a rational system of medical practice.  

Doctor Thomas Colledge, a British medical missionary who worked in China in 1827, stated that
those societies that now send missionaries, should also send physicians to this
benighted race who on their arrival in China should commence by making themselves
acquainted with the language; and in the place of attempting any regular system of
teaching or preaching, let them heal the sick and administer to their wants, mingling
with their medical practice, such instructions either in religion, philosophy, medicine,
chemistry etc. as the minds of individuals have been gradually prepared to receive...³

Among the earliest notable European missionary pioneers were the following: Matteo Ricci,
who came to China in 1583; Nicolaus Longbardi, 1597; Julius Alni, 1613; Joannes Terrenz 1621;
Michael Boym , 1647; Pere Parennin; Jacobus Rho, 1624. At this time missionary activities
centred around the territory of Macao.

Through the proselytising activities of the European missionaries, initial connections between
traditional Chinese medicine (TCM) and biomedicine ⁴ began. A two-way transfer and
‘translation’ of medical knowledge ensued. Knowledge of human anatomy and physiology was
‘translated’ into the Chinese language through the works of Terrenz, Rho, Longbardi and
Parennin. Terrenz’ translations on anatomy were entitled *European General Principles on the
Human Body* (*Tai Xi Ren Shen Gai Shuo*) 泰西人身概說, while Longbardi, Terrenz and Rho
co-authored the Chinese anatomy book *Pictorial Principles of the Human Body* (*Ren shen tu
Shuo*) 人身圖說. On the other hand, the Frenchman Parrenin wrote an anatomy book at the
end of the 17th century in the Manchu language entitled *Complete Record of the Standard
Human Body upon Imperial Order* (*Yin Ding ge ti quan Lu*) 銀錠個體泉路. This book was
submitted to the Emperor Kang Xi but was never published. In 1692, the Chinese emperor
Kang Xi was cured of malaria by a decoction of quinine prepared by two missionary priests.

At this historical juncture, TCM practitioners and Western European science and medical
practitioners seem to be ‘translating’ each other i.e. connecting and relating to each other
generatively and in symmetry, with each side gaining in its own terms. Influenced by the above-mentioned knowledge of human anatomy, a TCM practitioner by the name of Wang Kan Tang advocated that TCM practitioners specializing in the TCM discipline of ‘Bone Correction’ (zheng gu - now known as ‘traumatology’) must have knowledge of skeletal anatomy. Similarly, Wang Hong Han, a TCM practitioner who lived during the 17th century in China, developed a text entitled *The Origins of Medicine Yi Xue Yuan Shi* 醫學原始. He thought that what the Europeans refer to as the ‘four elements’ of water, wind (Qi), fire and earth 水，風（氣），火，土 四 元素, were similar to China’s ‘five elements’ (wu xing 火, wood, earth, metal and water), which connect with the principles of Tai ji and Yin and Yang. He explained the TCM principle of ‘Gate of Life’ 命門學說 in terms of Western medical principles of viviparity (foetal birth 胎生). Wang was reportedly a Christian convert and thus often engaged the European missionaries in discussions on Western medicine.

Translations of the TCM body of medical knowledge into the European languages and cultures transpired through the medium of Michael Boym, a Polish missionary who came to China in 1643. While in China he translated selections from classical Chinese medical texts concerning pulse examination, TCM theory and materia medica into the European languages. One of his works is *A Record of Chinese Plants* (Zhong Guo Zhi Wu zhi), written originally in Latin. This was the earliest work to introduce yao 藥 (Chinese materia medica) into Europe. During the 17th century, acupuncture was introduced in Europe. In 1683, the Dutch physician William Ten Rhyne published his book *On Rheumatism*, which introduced the use of acupuncture for the treatment of this condition. However, his treatise on the technique of acupuncture and the Chinese system of anatomy upon which it was based was looked upon as a mere item of curiosity by the elite group of European doctors. At this time, acupuncture was described in
major dictionaries as an ‘Asian mode of bloodletting’. Between the end of the 18th century and the second decade of the 19th century, however, acupuncture became very popular in Europe. At this time it was being used in some hospitals in Paris to treat rheumatism, gout and sciatica, and medical experimentalists started looking at it. In Britain its popularity had come to the point where one gout-sufferer who had been cured of the disease with acupuncture named his race horse ‘Acupuncture’. 7

Institutionalization of Western Biomedicine in China

The rapid industrialization of Europe during the 18th and 19th centuries provided the impetus for massive technoscience advances which in turn hastened colonial global expansion. Along with gunboats and tall ships, European (mainly British) and American missionaries moved into China, accompanied by medical men, smallpox vaccines, opium and other technoscience artefacts.

The Canton Missionary hospital, the first Western European missionary hospital established in China, was founded on 4 November 1835. The hospital building was on the ‘second floor of a large room where 200 patients could be comfortably seated and prescribed for; in addition, the house afforded shelter to at least forty inpatients’. It was located at Factory No. 7, Funtai Hong, San-taulan Street, which was quite close to ‘foreign factories’. The Reverend Doctor Peter Parker, one of the biomedical health practitioner pioneers involved in setting up the hospital, has this to say about the local Chinese response to the institution of the hospital:

It was after a long effort that a place was found for a hospital, and when at length a suitable building was rented and previous notice had been given, on the first day no patients
ventured to come, on the second day, a solitary female afflicted with glaucoma
came, the third day half a dozen... 8

In 1838, the Medical Missionary Society in China was founded to bring the practice of
Western European medical missionary medicine to China. It owed its inception to the works of
Doctor Colledge. At its inaugural meeting on 21 February 1838, held at the rooms of the Canton
General Chamber of Commerce, the aims of the society were resolved to be:

To give a wider extension and a permanency to the efforts that have already been made
to spread the benefits of rational medicine and surgery among the Chinese, a Society be
organized at Canton under the name of "The Medical Missionary Society in China";
that the object of this Society be, to encourage gentlemen of the medical profession
to come and practice gratuitously among the Chinese, by affording the usual aid of
hospitals, medicine and attendants; but that the support or remuneration of such medical
gentlemen be not at present within its contemplation. 9

The inaugural meeting of the society also decided to elect officers and establish the qualification
and duties of the biomedical health practitioners to be employed, set up a library, a museum
and a foundation, and establish administrative works.

In 1887 the China Medical Missionary Journal was published in Shanghai. 10 The first article in
its maiden issue of March 1887 was written by Doctor Boone, entitled ‘The Medical
Missionary Association of China - Its Future Work’.

In the establishment of a Medical Journal we have taken a great step forward. In our
Quarterly journal we have now, for the first time, an organ in which to express ourselves,
to report upon our work, and to enable us to gather the constantly increasing mass of
observation and experience for the good of our body and the world in general. 11
From the port cities of Macao and then Hongkong into the Chinese interior up to the northern capital of Beijing, missionary hospitals, biomedical clinics and biomedical schools were established in rapid succession. By 1937, there were 300 hospitals with 21,000 beds established by British and American missionaries. There were also 600 small-scale medical clinics. By 1915, 23 missionary medical schools as well as 36 nursing and midwifery schools had been set up in China.  

This institutional expansion of biomedicine in China was accompanied by a corresponding increase in trained personnel. Chinese practitioners of biomedicine were trained locally or were sent to Europe and America to undergo training. Correspondingly, these pedagogic endeavours required the necessary education materials, and massive work went into the translation of biomedical books and texts from European languages. The ‘College of Single Language’ or Tong Wen Guan 同文馆 was set up to meet this demand. Foremost among these translators was Doctor Benjamin Hobson. In addition, biomedical health professional journals in both the Chinese and English languages appeared all over China.

Hence, through the global institutionalization practices of the European and American missionaries and Western biomedical practitioners, biomedicine established itself in China to sit side by side with TCM institutions and practitioners. As one TCM historian has pointed out, ‘in Chinese society there emerged two systems of medicine, biomedicine (xi yì) and TCM (zhong yì)’. But the relationship between the two medical systems quickly became an asymmetrical one. As the medical historians Huard and Wong observed in their book Chinese Medicine (1968), the European incomers were convinced of their technical, military and scientific superiority and ‘could not imagine the existence of a standard of values other than their own’. (Huard et al. 1968, 131).
Prolegomena

TCM in the Communist era

Confronted by a set of values other than its own, TCM found itself grappling with the very difficult issues relating to its viability, survival, transformation and reform. Some people called for its abolition; others called for its reform by 'grafting' TCM with Western science; still others desired its complete 'westernization' or 'scientification'. It was at this point that, at the turn of the 20th century, another European western and 'scientific' set of values made its way into China which radically changed the destiny of that country, including that of TCM. As Mao Tse Tung, the founder of the first communist state in China, stated in his selected works: 'The salvos of the October Revolution brought us Marxism-Leninism'.

Replicating the success of the 'theory and practice' of the Russian Bolshevik Revolution in the Chinese social context, Mao, using the dictum that 'political power grows out from the barrel of a gun,' led a nation-wide revolution which overthrew the semi-colonial and semi-feudal order and established a Communist state which he referred to as the 'people's democratic dictatorship'. Among the major policy issues confronting the new state in the early 50's were those of reform of TCM and the relationship between TCM and biomedicine. Following the Marxist epistemological dogma of dichotomizing theory from practice, Mao developed the concept (which later evolved into a party and state policy) of 'integration' (jie he) of the theory of biomedicine with the theory of TCM i.e. Zhong Xi Yi Jie He 中西醫結合, the common English translation of which is 'integrated traditional and Western medicine'.

In contemporary Chinese communist jargon the term jie he is commonly used with the meaning to combine, integrate or unite entities, concepts or people (as in 'integrating with the workers, peasants and soldiers') in a decontextualized manner. One talks of 'integrating theory with practice' (lilun yu shijian xiang jiehe) or of integrating the universal theory of Marxism with
the concrete practice of the Chinese revolution - *ba Mokesizhui de pubian zhenli yu Zhongguo de juti shijian xiang jiehe*. Referring to the integration of TCM and biomedicine, Mao used the term *jiehe* in 1956 in a formal meeting with a team of Chinese musicians. However, the content of this meeting was made public only in 1977 in the *Guang Ming Daily*. Mainland Chinese TCM historian Si Yuan Yi, in his review of the work of 'integration of TCM and biomedicine' (which he referred to as a *duchuang* or 'original creation') quoted Mao as saying:

> We have to learn contemporary foreign things. After studying them, then we study Chinese things. We have to accept the strong points that foreign things have. This will create a 'leap' *yuejin* in our own things. Chinese and foreign things must be organically integrated *youji de jiehe*. We must not apply mechanically *taiyong* foreign things (to the Chinese situation). ¹⁷

In an earlier essay *On New Democracy*, written in January 1940, Mao, in an elaboration of the notion of a 'national scientific and mass culture,' deployed a vivid food-digestive process metaphor to picture this process of 'organic integration'. He said:

> To nourish her own culture China needs to assimilate a good deal of foreign progressive culture, not enough of which was done in the past. We should assimilate whatever is useful to us today not only from the present-day socialist and new-democratic cultures but also from the earlier cultures of other nations. For example, from the culture of the various capitalist countries in the Age of Enlightenment. However, we must not gulp any of this foreign material down uncritically, but must treat it as we do our food - first chewing it, then submitting it to the working of the stomach and intestines with their juices and secretions, and separating it into nutrients to be absorbed and waste matter to be discarded before it can nourish us. To advocate "wholesale Westernization" is wrong. China has suffered a great deal from this mechanical absorption of foreign material. Similarly in applying
Marxism to China, Chinese communists must fully and properly integrate the universal truth of Marxism with the concrete practice of the Chinese revolution.\textsuperscript{18}

But the ultimate aim of ‘reforming’ TCM through the ‘integration of biomedicine and TCM’ was to elevate it to a ‘scientific’ level. As the TCM historian Si Yuan Yi pointed out in a commentary to Mao’s instructions: ‘As for study of medicine, we have to use Western contemporary science to research (“study” yanjiu) the guizu pattern of development of China’s traditional medicine, and thus develop China’s own “new medicine”.’\textsuperscript{19}

The program of scientising traditional Chinese medicine (TCM) began in Communist China when laboratory experimental technique was introduced into TCM research in 1959.\textsuperscript{20} In 1960, with the use of of the Western pharmaceutical drug cortisone, a Chinese researcher developed a laboratory animal model replicating the TCM clinical pattern of Yang deficiency yang xu. The efficacy of a traditional herbal formula traditionally used to address this clinical pattern was supposedly successfully ‘tested’ using this animal model. This signalled the emergence in the People’s Republic of China (PRC) of the so-called school of ‘integrated Chinese and Western Medicines’ ZhongXi YiJiehe. The standardized universal yardsticks generated in the laboratory became the criteria by which traditional Chinese medicine had to be measured and accepted as scientific. Without due regard for the different contextual requirements of TCM as a body of medical knowledge with an ancient history, a whole set of research projects were undertaken to make the parameters of TCM more ‘scientifically objective’.
Translations

Confronted by a hegemonic scientific translation network which refused to ‘negotiate’ with TCM, how did the TCM practitioners respond? In their assessment of the interaction between TCM and biomedicine within the period of 150 years from the end of the 19th century up to the middle of the 20th century, medical historians Lin Zhao Geng and Yan Liang, in their co-authored book *History of Acupuncture Medicine* (1995), outlined four trends of thought which emerged out of the interaction between the two systems of medicine in contemporary history:

1) Those who think that there are similarities *xiang tong* 相通 between the two. Hence, they proposed a ‘converging and connecting’ *huitong* 汇通 between TCM and biomedicine. The representative practitioners are Wu Rui Pu, Zhang Xi Chun and Ding Fu Bao. We also add Tang Zong Hai 唐宗海, who is one of early pioneers of this school of thought.

2) Those who think that TCM and biomedicine are different, each having its correct and wrong, superior and inferior aspects. This thinking advocates the ‘joining’ *can he* 参合 of biomedicine and TCM, taking strong points from one to make up for the weak points of the other. This is the thinking of ‘joining together and compromising’ *can he zhezhong* 参合折衷 (‘joining together and converting their respective inner feelings’). The idea of ‘Chinese learning as the “substance” and Western learning as “function” or *zhongti xiyong* ‘ and the idea of ‘preserving the quintessence of Chinese culture’ *guocui* are examples of this line of thought. The representative thinkers here are Zhu Pei Wen and Zhou Xue Qiao.
3) Those who think that biomedicine and TCM are two distinct and relatively independent medical systems. They advocate the coexistence of the two and their respective autonomous development i.e. the preservation of the TCM way of thought. They do not oppose, however, the continued existence and development of biomedicine in China. The representative is Yun Tie Qiao.

4) Those who think that the two medical systems are completely different. Biomedicine is right and TCM wrong, biomedicine superior and TCM inferior. They advocate the abolition of TCM i.e. to develop biomedicine or the ‘Westernization of TCM’. This is the ‘Europeanization thinking’. It amounts to the ‘scientisation of TCM,’ which means that in the realm of theory TCM must be abandoned. The representatives are Yu Yun Qu and Lu Yan Lei.

Among the ‘converging and connecting’ group or Hui tong group are TCM practitioners who saw ‘similarities’ 相同 in the clinical approaches between the two medical systems:

**Tang Zong Hai** 唐宗海 (1847-1897), was a late Qing scholar and TCM practitioner, and one of the earlier advocates of the ‘converging and connecting’ huitong of TCM and biomedicine. Tang hailed from the province of Sichuan in Southeast China. He studied the Confucian classics during his early childhood, and aspired to be a physician when he witnessed the deterioration of his father’s health. In 1873 his father coughed out blood and passed out blood ‘from below’. A famous physician was consulted but without good results. From then on Tang consulted many Yao Formularies and known physicians on diseases related to blood, and in 1884 he wrote the book *On Blood-related Clinical Patterns* 血證論. In 1889 Tang passed the imperial
examinations and was appointed to the Imperial Board of Rites (Li bu). Well known to his contemporaries as a physician, he travelled to many places in China, including the capital Beijing. Tang advocates the ‘converging and connecting’ of TCM with biomedicine. His main aim in doing this is to use biomedicine to ‘validate’ TCM and thus prove that TCM is not ‘unscientific’. He thinks that both TCM and biomedicine have their strong and weak points. He says that there are gains and losses in both ancient and modern times. In the light of circumstances one must consider both what is in China and what is foreign to bring about the ‘most beautiful’ and ‘most perfect’ medicine. As for the converging and connecting of biomedicine and TCM, Tang thinks that biomedicine sees the heart xin as the organ from which blood vessels xue guan come out and from which blood pours out. The heart also has blood vessels through which blood returns to it. That through which blood enters, biomedicine refers to as a ‘vessel’ guan 管. TCM calls it mai 脉. These two refer to one and the same thing er er yi ye. Tang also points out some glaring differences between TCM and biomedicine. He said that

biomedicine conducts anatomical dissection to confirm what it sees shi yun... It stops at “the knowing” of the form xing (of the body). It does not know about the Qi. What it has anatomically dissected can only confirm the form of the cadaver si shi. How can it see the Qi transformation qi hua of a living human being?”

In 1892 Tang wrote his book Quintessence of the Medical Classics (Yijing Jing Yi), which contains his ideas on the ‘converging and connecting’ of TCM and biomedicine.

Wu Rui Pu 呉瑞浦 (1871-1951), was born in Fujian province in southern China and passed away in Singapore. He learned TCM from family tradition and became familiar with
biomedicine when practising TCM in his hometown in Amoy, an early area of activity by Western European missionaries. As the historian Yu describes his practice, he had a unique understanding of how convergence and connectivity can be effected between TCM and biomedicine. He contended that in treating diseases biomedicine puts stress upon differentiating disease entities as well as localization in the use of medicines. It emphasizes the biao (manifestation) of disease entities. On the other hand, TCM puts the stress upon differentiating clinical patterns bian zheng. TCM bases itself upon the examination shen of the clinical patterns and on seeking the cause (of the condition). It puts the stress upon the ben (‘root’) of things. Wu states:

Now we discuss the ‘warm febrile diseases (wen re bing). As for this zheng (clinical pattern) biomedicine sees it in terms of low or high fever and a type of infectious common cold (gan mao). It sees it as a disease entity. It tests and investigates the body temperature. It looks for the fungus (mei jun); gives injections, does auscultation; tests the urine; tests the faeces; uses different types of antipyretic drugs as well as laxatives to bring down the fever. When the patient is restless upon waking up or going to bed, and feels dazed, it uses medicine to calm the brain. If there are micro-organism and bacteria, methods of annihilating the bacteria are used. That is how it is practised.

As for our country’s method of treatment (TCM), first one has to investigate whether the condition is in the Qi or in the blood xue; see in which visceral organ systems or in which hollow organ system(s) it is to be found; then determine whether it is an exterior or interior (clinical) pattern; whether there is phlegm or food stagnation. One examines the disease condition and the shape of the body Qi, then decides whether to use the cold draining method or cooling the heat; whether to warm and move the Qi or whether to move it downwards; whether to generate body fluids, to connect with the body fluid in order to bring the sweat out, or to tonify the Yin to nourish the Anti-pathogenic factor, thereby alleviating fever. 24
On the other hand, **Zhang Xi Chun** 張錫純 (1918-1934), author of the book *Records of TCM and Western biomedicine in Combination* (*Yi Xue Zhong Zhong Cen Xi Lu*), advocates the use of biomedical health knowledge to clarify TCM concepts. He also uses both TCM materia medica (*yao*) and Western pharmaceuticals in his practice. In this book, he recorded the use of 45 pharmaceutical drugs.

**Zhu Pei Wen** 朱沛文, who represents one of the ‘second trend of thought,’ was born at the middle of the 19th century and hailed from Nan Hai county in the southern Guangdong province. He came from a family of traditional doctors. Zhu learned TCM from his father, who was a well-known physician. As well as reading traditional TCM texts like the *Neijing* and *Nanjing* he acquired biomedical knowledge by going to hospitals and witnessing anatomical dissections. In one of his writings Zhu said:

> I have been to Western hospitals and had personally observed *zang fu* in real form. Seeing the ‘substance’ *ti* and ‘function’ *yong* of the *zang fu* I realize that Chinese and Western principles are not exactly similar. Looking at what they respectively meant, both have their rights and wrongs. There is no bias. There are those which are appropriate for Chinese (medicine); there are those suitable to Western (methods).

Zhu thinks that TCM is ‘good at thoroughly examining the *li* while being quite clumsy in *ge wu*’ (investigating things).

When one excessively relies upon the investigation of the *li*, this can lead to *xu* (‘emptiness,’ ‘abstractions’). Western (medicine) is focused (*zhuan*) upon investigating things but falls short in examining the *li*. However, closely focusing upon ‘things’ can lead to *gu* (‘firmness,’ ‘solidity’ or ‘dogmatism’).
In 1892 Zhu wrote a book entitled *A Balanced Compilation of Chinese and Western Inner Organ Images* (*Hua Yang Zangxiang Yaozuan*). Consulting both the Chinese texts and illustrations or charts of the inner organs *zang fu* and Western texts (i.e. Chinese translations from Western languages) and illustrations of human anatomy and physiology, Zhu made a comparison. In the segment entitled ‘On the “substance” and “function” of the Heart Inner Organ,’ he said:

That which the heart generates is blood. That which the heart stores is the ‘spirit’ *shen*.

What the Chinese meant is very true. On the other hand, Westerners see the heart as responsible for moving the blood. They see movements of awareness, feelings as being all attributable to the brain *nào*. Hence for all illnesses affecting the blood, both Chinese and Western methods treat the heart. But for all illnesses affecting the spirit *shen*, Western methods know of treating the brain. How can it (the Western method) know of the heart as a place where the spirit is stored? The brain is the ‘impulse’ *ji* "for movement. This is because the brain *nào* is generated by the kidneys *shen*. There is a external/internal crossover connection between the heart and the kidneys. Hence, when illnesses sets in, both are affected. Hence in all illnesses affecting the spirit it is appropriate to treat both the heart and kidneys.

Zhu thinks that although there are ‘connectivities’ between both TCM and biomedicine there are also differences. Thus he advocates those aspects which can be connected while preserving the differences. In this sense, the historian Yu Shen Chu thinks that Zhu Fei Wen saw the clinic as the site from which connecting both systems of medicine may be verified *yan zheng*.

**Yun Tie Qiao** (1878-1935), orphaned at an early age, came from Wu Jin county in Jiang Su province in eastern China. He studied the ancient Chinese classics at an early age, became a teacher at 16 years old, then passed the exams to enrol into the Shanghai South Seas Public School for four years. He subsequently worked as a school teacher in Shanghai and
Changsha, and then was the editor of the Commercial Press as well as chief editor of the monthly publication *Monthly Novels* for 20 years. He translated the Western novel *Cardamon Flower* (*Dou Kou Pa*), which was received reasonably well. Three of his children died of ‘febrile cold disease’ or *sheng han*, which made Yun change career and pursue the study of medicine, becoming an apprentice of the famous physician Wang Lian Shi. Looking after patients during the daytime and writing books at night, Yun wrote twenty-five books over ten years. He also ran a TCM school, wrote his own lectures and had more than 400 students. In his later years Yun was paralyzed in bed. This did not stop him from dictating to his daughter the contents of his last book, *A New Book on the Disease Huo Luan Huoluan Xin Shu* 霍亂新書. According to the medical historian Zhen Zhi Ya, Yun Tie Qiao was *gong zheng* ‘fair’ in his attitude towards both TCM and biomedicine. In one of his books he said:

Today TCM and biomedicine are equal in standing...biomedicine’s *li* on life is anatomy, while *Neijing*’s *li* on life is *Qi hua* (Qi transformation). *Neijing*’s *Wu Zang* (Five Inner Organs) is not anatomy’s *Wu Zang*, rather it is the Qi transformation of the Five Inner Organs. Hence, what TCM refers to as ‘heart disease’ *xinheng* is not similar to what biomedicine refers to as ‘heart disease’. What is good about biomedicine is that it can treat serious diseases; on the other hand, TCM treats (diseases) in a ‘refined way’ *jing* as prescribed by the *Neijing*. Similarly, it can also treat serious diseases. If some say that it is absurd *huangmiu* not to talk about anatomy in the study of medical treatments, then it is also absurd in the study of medical treatment not to talk about the *li* of the ‘comings and goings’ *sheng fu* of the four seasons, hot and cold, *yin* and *yang*.

Talking about the reform of TCM and its relationship with biomedicine at that historical period, Yun pointed out the ‘progressive’ capacity of TCM at that time to ‘mix-it-up’ *zhouxuan* with biomedicine. In his book *On the Study of the Treatise on Febrile Diseases* (*Shanghai Lun Yan Jiu*) he stated:
Talking about today’s reform of medicine, we have only to ‘mix-it-up’ *zhoucuan* with Western medicine *xiyang yixue*. There is no other way... TCM has its progressive *yinjin* values. It must absorb the strong points of biomedicine *xiyi*, and combine and change *huahetai* with it (biomedicine).

Responding to the proposal by the Institute for National Medicine *Guo Yi Guan* to unify disease nomenclature by making biomedical nomenclature the standard while getting rid of the ‘old medicine’ nomenclature, Yun stated:

The method (used) by biomedicine is to fix (disease nomenclature) to the ‘focal’ *bing zao* as well as to fix nomenclature in accordance with the pathogenic bacteria *bing jun*. On the other hand, TCM fixes the (disease) nomenclature in accordance with the *Zang Fu* as well as fixing the nomenclature on the basis of the ‘state-of-the-Qi’ *Qi hou*. We should never force the two into one *qiang he wei yi*. 31

An earlier version of a variation of the second trend of thought - Chinese learning as the ‘substance’ and Western learning as ‘function’ *zhong ti xiyong* - is the Chinese approach of adopting a Sinicized ‘barbarian’ learning *yi xia bian yi*. This is a culturally solipsistic way of dealing with a ‘foreign culture,’ whereby what is ‘alien’ has to be ‘translated’ first into the local traditional Chinese system of values before it is internalized and absorbed.

Chinese medicine historians Lin Zhao Geng and Yan Liang contended that the emergence of these trends of thought in China is closely related to the incremental projection of the institutional influence of biomedicine in China, which went hand in hand with the decline of
the influence of the traditional institutions of TCM. Eventually, in February 1929, the trend of thought which called for the scientising, westernization and 'abolition' of TCM gained the upper hand. A resolution was proposed by Yu Yun Qu (a rabid advocate of the abolition of TCM) at a special conference organized by the newly established Ministry of Health entitled: 'The abolition of the old medicine in order to clear away obstacles to medicine and public health'. In its interaction with biomedicine, TCM, a tradition of health care with four thousand years of history, came very close to extinction.
Prologue

1 In the long history of Western medical practice, technoscience provided the important ingredients for the structuring of its medical system. Current philosophers of science view science as ‘technoscience’ i.e. a knowledge system that is closely linked to society and nature and vice-versa. They see no dichotomy between science and technology: each is an extension and embodiment of the other. Hence the term ‘technoscience’.


4 The practice of Western science-based medicine or biomedicine has been through more than two thousand years of development, starting in the time of Hippocrates (460-379 BC). During its development, it went through the four stages of library medicine, bedside medicine, hospital medicine and finally the present laboratory medicine. (Erwin Ackerknecht, *A Short History of Medicine*, Baltimore, John Hopkins University Press, 1982.)

5 Zhen Zhi Ya et al., *Zhongguo yi xue shi* [History of Medicine in China], Shanghai kexue jishu chubanshe, Shanghai, 1984, pp. 110 & 118.

6 The ‘Four Elements’ refers to ‘Earth, Air, Fire and Water,’ which are part of the ancient Doctrine of the Four Humours developed by the Greek philosopher Empedocles and further developed by Hippocrates and Galen. These four elements correspond to the properties of dryness, coldness, warmth and wetness, which in turn correspond to the ‘humours’ (fluids) of black bile, yellow bile, blood and phlegm. (Roy Porter (ed.), *Medicine: A History of Healing Ancient Traditions to Modern Practices*, New York, Marlowe & Company, 1997, p. 20.)

7 Ibid. p. 113

8 K. Chimin Wong et al., op.cit., pp. 315-316

9 Ibid. p. 316-319

10 Pierre Huard et al., op.cit., p. 155

11 K. Chimin Wong et al., op.cit. p. 466

12 Zhen Zhi Ya et al, op.cit., p. 114


14 Bai Shou Yi (ed.), *An Outline History of China*, Beijing, Foreign Languages Press, 1982, p. 527

15 In my Master’s thesis I have pointed out that the notion of dichotomy between theory and practice takes its root from the Maoist theory of cognition which sees knowledge generation as going through a ‘revolutionary leap’ from a lower perceptual stage to a higher conceptual state i.e. from a lower level practice to a higher level theory. Mao Tse Tung, in his work *On Practice*, said that ‘the first step in the process of cognition is contact with the objects of the external world; this belongs to the stage of perception. The second stage is to synthesise the data of perception by arranging and reconstructing them; this belongs to the stage of conception, judgement and inference. It is only when the data of perception are very rich (not fragmentary) and correspond to reality (are not illusory) that they can be the basis for forming correct concepts and theories’. (Committee for the publication of the Selected Works of Mao Tse-Tung, *Selected Works of Mao Tse-Tung*, Vol.1, Peking, Foreign Languages Press, 1967, p. 302.

16 There is a monthly medical journal published in China called *Chinese Journal of Integrated Traditional and Western Medicine*, translated from the Chinese Zhongguo Zhongxiyi Jiehe Zzhi 中國中西醫結合雜誌. It specifically publishes research conducted from this ‘new’ academic discipline in China.

17 Si Yuan Yi, *Zhongguo Yi xue Shi* [History of Chinese Medicine], Renmin weisheng chubanshe, Beijing, 1984, p. 124

The English phrase ‘gulp down uncritically’ in this quote was originally written as *shengtun huobo* 生吞活剥, an old Chinese proverb which literally means ‘to eat alive and to skin alive’ (Chen Xin Wang et al. (1984), *Chengyu, yanyu, changyong ciyu huibian* [A collection of Chinese idioms, proverbs and phrases with English translation], Zhishi chubanshe, Beijing, p. 300. On the other hand the words ‘nutrients’ and ‘waste’ were originally written in Chinese as *jinghua* 精华 and *zaobo*. These are two technical terms in traditional Chinese medicine. *Jinghua* 精华 is the ‘quintessentials or essence’ derived from food and then spread to all parts of the body; while *Zaobo* 剩柏 refers to ‘dross or waste matter’ left over from a fermentation process. The ‘quintessentials’ are *yang* substances which are light and pure, while the dross are *yin*, impure or thick, and descend.

19 Si Yuan Yi, op.cit., p. 124

20 Yang Wei Yi, ‘Zhongti xiyong yu zheng de dongwu xingxing’ [With Chinese learning as the ‘Substance’ Western learning as ‘Function’; and the animal model of TCM clinical patterns], *Beijing zhongyi dao da sie si sisheng zhoujian xiaoqin lunwen ji* [Thesis Collection on the Occasion of the 40th Anniversary of the Foundation of the Beijing TCM University], Xueyuan chubanshe, Beijing, 1996, pp. 172-176


22 This school is referred to by medical historian K. Chimin Wong as the ‘Anglo-Chinese Group’.

23 Zhen Zhi Ya et al., op.cit., pp. 118-119

24 I am using A.C. Graham’s translation of ‘ti’ as ‘substance’ and ‘yong’ as function. In his book *Two Chinese Philosophers* Graham said: ‘The word *ti* (literally “body”) has a wide range of meanings, but it resembles the English word “substance” in being used both for a solid body and also, as in this pair of terms, for what is assumed to underlie the changing surface of a thing’. (A.C. Graham, *Two Chinese Philosophers: Ch’eng Ming-tao and Ch’eng Yi-ch’uan*, London, Lund Humphries, 1958, p. 39.)

25 Li Jing Wei, *Zhongyi renwu cidian* [Dictionary of Chinese Medical Personages], Shanghai Cishu chubanshe, Shanghai, 1988, pp. 532-533

26 Zhen Zhi Ya et al., op.cit., pp. 118-119

27 Yu Shen Chu, *Zhongguo yixue jianshi* [An outline history of Chinese medicine], FuJian kexue jishu chubanshe, Fujian, 1993, pp. 417-420

28 Ibid pp. 417-420


30 Zhen Zhi Ya et al., op.cit., p. 119

31 Yu Shen Chu, op.cit., pp. 386

32 Zhen Zhi Ya et al., op.cit. pp. 119-120

Chapter 1: Snapshots of Working Knowledge Traditions Together in an Era of Globalization, and My Participation in that Emerging Knowledge Space

Traditional Chinese Medicine: A Globalizing Phenomenon

1. There are over one thousand five hundred primary TCM practitioners in Australia.¹ In terms of health care services they provide, it is estimated that, annually, there are 2.8 million TCM consultations, accounting for an annual turnover of A$84 million. In the United States, there are now 7,000 Chinese medicine practitioners. An estimated twelve million patients in the US visit a Chinese medicine practitioner every year,² while in Hongkong about 7,000 TCM practitioners are registered.³

2. On August 5, 2001, using a common search engine, I searched the internet. Five thousand two hundred and thirty web sites were found containing the phrase ‘traditional Chinese medicine’. Browsing through these thousands of web pages I found a growing global network of information about TCM educational institutions, TCM on-line journals, acupuncture organizations, Chinese herbal distribution centres, Qigong meditation centres, museums featuring TCM classics and artefacts and individual practitioner web sites. Looking at the addresses of some of these web sites one can see that the institutions they identify are located in China, Australia, Canada, United States, Britain, Europe, South Africa, Taiwan, Singapore and Hongkong, among other countries.

³ A World Health Organization (WHO) fact sheet on ‘traditional medicines’ confirmed the growing popularity of traditional Chinese medicine and other alternative medicine systems in Asia, Western Europe and North America. The fact sheet states that in China traditional
medicines (herbal preparations) account for 30% to 50% of total medicinal consumption. In 1993, the total sales of herbal medicines amounted to more than US$2.5 billion. In Japan, from 1974 to 1989, there was a fifteen-fold increase in the consumption of herbal preparations, which is enormous compared to the mere 2.6 increase in the consumption of ‘mainstream’ pharmaceutical drugs. This made the Japanese the world’s highest per capita consumers of herbal medicines.  

4. In response to the growing popularity of TCM, governments around the world are legislating for and regulating TCM medical practice. The Canadian province of British Columbia recently introduced legislation to regulate several therapeutic TCM modalities such as acupuncture, Chinese herbal medicine, Tuina and Qigong. The provincial government concurrently decided to introduce ‘by-laws for the current College of Acupuncturists which will allow the registration of acupuncturists to start immediately’. 5 Almost all states in the United States of America have passed legislation regulating ‘Oriental Medicine’. In November 1995, through a law passed by the Executive Yuan, the parliament of Taiwan established a Committee on Chinese Medicine and Pharmacy. This committee is a semi-autonomous body ‘under the supervision of the Department of Health (DOH)’, charged with the task of ‘upgrading the quality of Chinese medicine doctors’ and the quality of Chinese medical care. 6 In the People’s Republic of China, the Administrative Bureau of TCM under the Ministry of Health has been set up to oversee TCM services, research and development.

5. In international conferences, seminars, and through the world-wide web, TCM scholars and practitioners are liaising professionally as practitioners within their field of expertise as well as with health professionals from other science and health-care traditions. In an international conference of the Australasian Association for History, Philosophy and Social Studies of Science (AAHPSSS), held in Melbourne, Australia on June 25, 2001, a special panel
on 'Traditional Chinese medicine and science' was organized with two conference speakers presenting papers. The World Federation of Acupuncture-Moxibustion Societies (WFAS) is a global non-governmental federation of seventy acupuncture associations based in Beijing, and representing 50,000 acupuncture practitioners world-wide, which celebrated its tenth anniversary at its fourth international conference in the United States in September 1996. The International Association for the Study of Traditional Asian Medicine (IASTAM), an association of academic scholars and practitioners of Asian medical systems including TCM, Ayurvedic, Islamic medicines and others, was founded in Australia in 1977 and held its fifth international conference in 2003 in Halle, Germany. ChiMed, a group of scholars looking into the history of Chinese medicine, has over ninety-three scholars from every continent of the globe in their discussion list.

6. Using the global reach of the internet, TCM diagnostic computer software and a new type of granulated herbal powder, TCM practitioners in the United States launched web sites in the internet promoting their 'On Line TCM consultations’. Doctor Robert Kelly, who holds a certificate from a two year education program from the International Institute of Chinese Medicine, provides on-line TCM consultation for a fee of US$28.99. The prospective client first fills in a detailed diagnostic form on-line and receives TCM advice after two days via email. Kelly can also post herbal medications within a week. Similarly, Nam Jeong from Chicago provides on-line TCM consultation through computer software which he also sells. The patient or the practitioner can input signs or symptoms into the screen and the software will decide the TCM diagnosed clinical pattern and the corresponding herbal formula to be prescribed. There are two hundred and twenty two symptoms to choose from, out of which one hundred and ninety-nine clinical patterns are accessed.

7. TCM educational programs are found in universities and institutes of higher learning all over
the world. The leading producers of TCM practitioners are the TCM education institutions in the People's Republic of China. These institutions have been afforded a nomenclature upgrade by the authorities in China recently. A decade ago these education institutions were referred to as 'TCM colleges'. Nowadays they are referred to as 'TCM universities'. TCM degree courses are being offered by the Beijing, Nanjing, Guangzhou, Shanghai and other provincial TCM universities to local and overseas students. In recent years, joint educational Bachelor degree programs have been arranged with numerous universities and colleges from other countries.

8. Parallel to this process of TCM globalization is the continuing increase in health consumer usage and patronage of complementary and alternative medicine(s) (CAM) which includes TCM in the West. Each year in the United States, fifteen billion dollars is spent on non-conventional therapies, while here in Australia it is a billion dollars annually. In these two countries, health consumers spent twice as much on alternative and complementary medicines as they spent on orthodox pharmaceuticals. In Great Britain one in five people use CAM therapies, spending about 500 million pounds annually. 10 Resonating with this major shift in health consumer sentiment is a gradual but increasing openness of biomedical health care practitioners to other forms of heterodox medicines like TCM. In some cases biomedical practitioners are not just opening themselves to alternative forms of treatments but are becoming practitioners of heterodox medicine themselves.

An International Meeting on TCM -Towards Joint Research

The Wellcome Trust is an international charitable biomedical research institution established in London under the will of the late American pharmacist-entrepreneur Sir Henry Solomon Wellcome (1853-1936). Henry Wellcome and Silas Mainville Burroughs established the
pharmaceutical firm Burroughs Wellcome and Co in England, which pioneered the large scale manufacture of compressed pharmaceutical drug tablets. Subsequently, Henry Wellcome established chemical and physiological laboratories in London which in 1894 produced the diphtheria antitoxin. In March 2000 the Wellcome Trust convened a closed door one-day research meeting in London on ‘complementary and alternative medicine’ (CAM). As President of the Alliance of Chinese Medicine Associations of Australia, I was invited to attend and facilitate a workshop of the research meeting. Seventy-eight international delegates attended, most of them from the emerging field of CAM research. A significant number of delegates were biomedical practitioners doing research in CAM. There were many CAM researchers from Britain and the United States, and a number of delegates from European countries and Australia.

In Great Britain, complementary and alternative medicine (CAM) means a heterodox collection of discrete health practices which differentiate themselves individually and collectively from the orthodox practice of biomedicine. It includes such health practices as acupuncture, Alexander Technique, aromatherapy, chiropractic healing, herbal medicine, homeopathy, hypnotherapy, massage and body therapies, naturopathy and nutrition, osteopathy reflexology, shiatsu and Yoga. A recent discussion paper defined CAM as a ‘practice which refers to a wide range of health interventions originating from different cultures across thousands of years of history’. It should be noted that among this range of CAM healing traditions, TCM as a distinct body of medical knowledge and practice is not included. Instead, two of its treatment modalities, acupuncture and Chinese herbal medicine, are TCM representatives in this line-up of alternative therapies in Great Britain.

During the morning plenary session, researchers from Britain, Europe and the US spoke of the research activities in their respective regions, with time reserved for questions. The afternoon
was devoted to workshops where delegates split into several small groups and issues related to CAM research were tackled. Late in the afternoon, in the plenary session, we listened to reporteurs from various workshops. Before the plenary session a discussion document was circulated, entitled *Integrated Health Care: A Way Forward For the Next Five Years?*. This was published by the Foundation for Integrated Medicine on behalf of the Steering Committee for the Prince of Wales Institute on Integrated Medicine (1997). Each major plenary session speaker cited a TCM artefact or modality in their presentation. The director of the Wellcome Trust spoke about the use of *Qing Hao Su* as a front-line treatment of malaria in South east Asia. The major speaker, Doctor Holgate, related stories on acupuncture, while the major presenter from Europe, Doctor David Aldrige, introduced the use of an innovative practitioner-based research methodology with regard to two TCM disciplines, Qigong and *Yang sheng* (Nurturing Life).

Stephen Holgate is Professor of Immunopharmacology at the University of Southampton, chairman of the Research and Development Working Group for the Prince of Wales Initiative on Integrated Medicine, and an adviser to the chairman of the British House of Lords Select Committee on Science and Technology. He gave a talk on CAM research in the UK. He spoke of the reasons why people are ‘voting with their feet’ and trying alternative therapies: fear of side effects from orthodox treatments and people wanting to control their therapies. He complained about the lack of evaluation culture in CAM and the heterogeneity in CAM. Above all, he stated that orthodox practitioners want to know the ‘plausible’ mechanism (science-based) of how CAM works i.e. the underlying mechanism of each of the above-mentioned fourteen CAM medical traditions. After his presentation, I made the point that in order to know how each of the CAM therapies work it is only practical and ‘scientific’ that researchers should follow each of the CAM practitioners and see how they ‘work,’ in the same way that Bruno Latour followed the scientists around, thereby learning how science
works. To this Professor Holgate replied:

Thank you. That is a very helpful suggestion and one that cuts across the things we are talking about. I think that quite remarkable discoveries have been made, that is in the technology front, which enabled us to re-modern science. I have read recently an article in the prestigious National Academy of Science journal about the workings of brain imaging in looking at various changes in blood flow and metabolism and they were able to show that by pricking one particular area on the foot, the vascular pressure fell and an area in the brain lit up as the needles were put somewhere else. And yet these meridians and the discussions we had... around how acupuncture works... lots of good has been gained in the study of its mechanism. Here we have a very concrete mechanism which eluded a lot of detailed scientific exploration. And that is a very reductionist science indeed. And from these two extremes we need something that matches. And your suggestion to get together philosophically is a very good one.

I quote this exchange as an encapsulation of a common response of biomedicine to TCM practitioners. It also helps me identify a central point of my thesis. I propose that a useful way for biomedicine and TCM to work together is to turn to the actualities of clinical practice. I was not interested in a philosophical tête-à-tête but rather was more keen on the practical engagement. I envisaged practitioners from alternative traditions being able to discuss how a needling 'prick' gets translated into 'acupuncture' or vice-versa through the medium of diverse clinical practices, instead of reducing these practices to a 'vascular pressure' which 'lights up' in the brain. I adopt the now common position in the sociology of science, that the role of theory in the sciences and in other knowledge traditions is much overrated. Following recent moves in sociology of science I turn to consideration of practices. 13 Getting together 'philosophically' is a sentiment commonly expressed by biomedical practitioners. I have come to understand that this statement by practitioners and authorities of biomedicine refers to a concern with theory, in particular theories of causality. Biomedical health practitioners often
express a desire to understand TCM theory, but when I have struggled to elaborate the central conceptual elements of TCM practice, my interrogators fail to recognise what I articulate as theory, apparently on the basis that it is not causal theory. My view is that TCM practitioners and biomedical doctors need to look for ways to understanding each other’s practices as practices.

Doctor Simon Strauss, Director of the National Committee on Complementary and Alternative Medicine, discussed the status of research on CAM in the United States. He spoke of the system of investigators funded by the committee doing the research in conjunction with CAM practitioners. Most members of the US delegation I spoke to before and during the conference were looking only at the use of Randomized Control Trials (RCT) in their research in CAM.

In the workshop that I participated in, facilitated by Doctor Alfred Fishman from the University of Pennsylvania School of Medicine, it was stated at the outset of the workshop that there is only one research methodology, and that is RCT. A co-participant, Vincanne Adams from the Anthropology, History and Social Medicine Department of the University of California in San Francisco, recorded Doctor Strauss as saying that there is little room for negotiation about the ‘gold standard’: the randomized controlled clinical trials, preferably double blind, with exploratory things being tolerated so long as they have a ‘scientific basis’.

Placebo controls and simplest designs are the best. 14

This too picks up a theme of my thesis: evaluative regimes are outcomes of traditions of practice. Evaluation which makes sense within biomedicine will not necessarily transfer to TCM, and vice-versa.

The last plenary speaker was Doctor David Aldridge, a British researcher doing medical research work in Germany. Doctor Aldridge pioneered the work in developing and guiding the
social science research tradition in music as a therapy. He is an advocate of the use of the single-case design methodology. In contrast to Doct or Strauss’ advocacy of ‘investigator-led research,’ Aldridge advocates ‘practitioner-based research’ and a methodology which does not abdicate any element of the therapist’s practice. He claims that research skills are based on the experience of clinical practice and appropriate methodology. He said that social scientists must bring rigor into science, and that research brings new knowledge pertinent to the situation where it is applied.

As TCM, a non-European and non-scientific medical tradition, finds its own space in an emergent global setting, the issue of how to work with other cultures and traditions of healing, like biomedicine, becomes important. How can the full healing potential of this tradition of health care be mobilized in a globalized community? Different medical traditions must move into interactive and symmetrical conversations.

The Narrator - A Practitioner of TCM in Contemporary Australia

Having given some contemporary background to my study, I turn now to locate myself as a researcher of TCM as an Australian health care tradition. As a practitioner of TCM in Australia for the past two decades I have been both observing and participating. Necessarily, I translate/interpret events or happenings which continue to shape the ‘life’ of TCM in Australia. With regards to these ‘life’ happenings I am a familiar stranger. As a practitioner of TCM I am peculiarly familiar with these events. It is a sense of familiarity which belongs to someone who is an ‘insider’ (nei hang in Chinese). This is my openly declared professional bias. On the other hand, as a ‘stranger’ vis-à-vis these events I am an ‘outsider’ or wai hang. I stand outside and witness these events, striving to maintain a balanced stance and temper my personal and hence partial inclinations. I hope in this way to tell a holistic and unbiased story.
For more effective communication with my readers, I would like to reveal part of my ‘inner’ TCM practitioner-self as viewed from my outer ‘stranger-self’. My patients here in Melbourne refer to me as ‘Doctor Rey’. I was born fifty-five years ago on Boxing Day in one of the impoverished southern districts of Tondo in the sprawling metropolis of Manila. My mother christened me ‘Rey’ from ‘Kristo-Rey,’ words of Spanish derivation which translate as ‘Christ-the-King’ in English.

I am a product of the public school system in the Philippines (six years primary and four years secondary) and went to university to complete a Bachelor’s degree in political science as a preliminary degree to studies in law. But during my sophomore year as a law student at the University of the Philippines in the early seventies, a series of dramatic political, economic and cultural events in Manila changed my life. I found myself in the eye of a storm of student rebellion against the Philippine’s Marcos Regime which eventually took me to the ‘tail-end storm’ of the cultural revolution in China in 1971. I was part of the first fifteen-member Philippine Youth Delegation to visit Communist China. Our delegation consisted of university students, a woman journalist from the now defunct Manila Times, university lecturers, university student council officers, a Muslim student from the south of the Philippines and a Catholic priest. It was a friendship delegation intended to establish links between the youth of China and the Philippines. Our delegation visited communes, factories, hospitals and places like Yenan where Mao conducted his revolutionary activities, and we talked with leaders of the Red Guards in Beijing and Shanghai. In our visit to large hospitals and commune hospitals we were shown how acupuncture anaesthesia worked. A couple of weeks into our tour of China, the officials of the Chinese Friendship Society or Youxie met with all the members of our delegation to inform us that the Writ of Habeas Corpus had been suspended by President Ferdinand Marcos in the Philippines, and that hundreds of student youth and workers’ organization leaders were arrested. Our Chinese hosts also showed us copies of the Manila
Times featuring the names of five members of our delegation (including myself) in the ‘Marcos blacklist’. Our Chinese host then relayed to us the Chinese Government policy of offering refuge to people who were persecuted for their political beliefs or ‘scientific undertakings’.

After completing our tour of China, our delegation decided that those who felt that they might be arrested upon returning to the Philippines might stay behind in China, while those who felt that they faced no danger of arrest could return home. Five members of our delegation decided to stay behind in China while the rest went back to Manila. We learned later that the woman journalist and a number of university lecturers were subsequently arrested and incarcerated.

With the prospect of a long-term sojourn in China, I decided to study Mandarin by myself for a year. This enabled me to converse in Chinese and read the Chinese-language newspaper the People's Daily. Eventually, after the Cultural Revolution, universities re-opened in China, and I was offered a government scholarship to undertake formal Chinese language studies at the Beijing Language Institute and TCM Bachelor’s degree program studies at the Beijing TCM College. I commenced my TCM studies as part of the TCM Foreign student Class 1975, consisting of about fifteen students from Japan, Pakistan and Sri Lanka. It was a four-year full-time Bachelor degree course in TCM. All of us were housed in old style courtyard accommodation at the back of the Dong Zhi Men TCM Hospital in the eastern suburbs of Beijing. Most of our TCM subject lectures were conducted in a classroom inside the courtyard, while our clinical practice studies were conducted in the outpatient department and wards of the hospital. There were also Chinese students who lived with us in the courtyard; these acted as our ‘classmates’ (they belonged to the TCM Chinese class 1975) and as our ‘hosts,’ and also looked after us in terms of our living conditions. Western medicine lectures like anatomy, physiology and pathology were held at the Beijing TCM College campus at the north eastern outskirts of Beijing. In our lectures on Western medicine subjects we were joined by Chinese students from the same batch as ourselves. All the lectures and clinical practice training were conducted in Mandarin.
The Beijing TCM College ran TCM courses before the Cultural Revolution. Most of the students came from the socialist bloc countries like the Soviet Union, Korea and Vietnam. Our TCM class 1975 was the first batch of foreign students to embark on a TCM Bachelor degree course after the Cultural Revolution. Our batch was also the first that came from the ‘West’.

Looking back, therefore, the curriculum, course materials, and pedagogical approach and even the place where we lived had an element of experiment. It was in reality an attempt to implement the Communist Party’s line on TCM education, integrating TCM with biomedicine as it related to TCM education for foreign students from the West. This system of integrating TCM with biomedicine is one of the variety of eclectic and ambivalent systems of translation between the two knowledge systems. This attempted ‘synthesis’ and ‘syncretism’ of the two eventually leads to the ‘displacement’ or ‘erasure’ of the TCM practice of bian zheng lun zhi.

The closing days of the seventies and the beginning of the decade of the eighties marked the completion of my TCM studies. I had spent ten years in China. This historical period in Chinese history can be characterized as a transition from the tail-storm of the Cultural Revolution to the whirlwind of the ‘opening up’ and capitalist reform i.e. ‘socialism with a capitalist face’.

At this time, a connection with Australia made another change to the course of my life. This connection led to my marriage in Beijing with Margaret Fuary, an Australian school teacher from Melbourne who was a student of Mandarin at the Beijing Languages Institute. Hence from the ‘whirlwind’ of capitalist reforms in Beijing, I found myself in the thick of the TCM ‘willy willy' in Australia.
Participating in TCM in Australia at the end of the Twentieth Century

When I arrived in Australia more than two decades ago in 1982, there was no such entity as ‘TCM’. Instead, Australia was in the grip of what the mainland Chinese media refers to as ‘acupuncture fever’ zhenjiu re. Because of television and extensive media coverage of the Nixon China visit, acupuncture in Australia enjoyed a wide clinical legitimacy. Biomedical health practitioners and a number of what we now collectively refer to as complementary and alternative medical (CAM) practitioners all ‘do acupuncture’. There were a number of privately run acupuncture schools and colleges and a number of acupuncture associations. Medicare even provided rebates for biomedical health practitioners offering acupuncture services. Hence when I started private practice in Victoria I mainly did acupuncture, lectured in private acupuncture colleges, became a member and officer of a number of acupuncture associations and started writing about acupuncture. Aside from acupuncture my training and expertise included internal medicine or nei ke and traumatology gu shang ke.

The 90’s saw the gradual emergence, legitimation and self-defining of TCM as a body of medical practice in Australia. A loose organization called the Australian National TCM Liaison Committee (NTCMLC) was established, consisting of acupuncturists who saw themselves as practising within the paradigm of TCM, Chinese herbalists, bone setters turned Chinese therapeutic massage practitioners, practitioners trained in mainland China and others. They started addressing issues of unity, legitimation, identity, communication and education within the TCM and wider Australian community. Meeting in the various state capitals, the committee was able to agree to a curriculum standard for TCM education in tertiary institutions. Subsequently, TCM tertiary courses in VUT, RMIT, UTS and in numerous private TCM colleges in Melbourne, Sydney and Brisbane were established one after the
other. At the newly established Victoria University of Technology, where a four-year full-time Bachelor degree in Applied Health Science-Acupuncture was introduced in 1992, I started to lecture on the foundation concepts of TCM.

On March 9, 1993, three days before the federal election, after a period of intense lobbying by the NTCMLC, the Labor Federal Health Minister Mr Brian Howe responded to a communication I sent him as part of my work as an official of the National TCM-Liaison Committee. He stated:

Labor acknowledges that many Australians choose Chinese medicine and acupuncture services and that practitioners of these services provide an excellent holistic, and in many cases preventative, health services. I am happy to assure you of my support for Chinese medicine and acupuncture and for the registration of practitioners in these areas on public health and safety grounds.

I support and encourage coordinated action by States and territories leading towards the development of formal registration processes for alternative health care providers. I would suggest that as the registration of Chinese medicine and acupuncture practitioners is the direct responsibility of State Health Ministers that you continue to make representations to them.19

Exploiting the unpopularity of the GST being proposed by the Liberal Party, the Labor Party won the 1993 Australian federal election, with Paul Keating becoming Prime Minister. Brian Howe’s health portfolio was taken over by Graham Richardson. Following both Howes’ and Graham Richardson’s suggestion, TCM practitioners and their professional associations directed their registration lobbying efforts towards the state governments in Melbourne, Sydney and Brisbane.

While juggling my time with lecturing at VUT, engaging in private practice as well as my fair share of household chores, and lobbying Australian politicians, in 1992 I also commenced my
part-time coursework for a Master of Science degree at the Department of History and Philosophy of Science at the University of Melbourne. In this postgraduate study I developed a profound understanding of science as a field of practice which critiques the received view of science as a body of universal, ‘all-season,’ decontextualized theoretical frames. Adopting this new view of science as local practices that assume life in specific contextual situations, I developed the notion of ‘theory-as-practice’ of traditional Chinese medicine. This is the main content of my Master of Science minor thesis ‘Connecting Traditional Chinese Medicine and Western Scientific Medicine’ (1996). It is from this preliminary work that this current thesis has grown.

In 1994 two widely publicized incidents in the cities of Melbourne and Sydney provided the impetus for a more serious move towards state regulation and legitimation of Chinese medicine in Australia. In January of that year, Arnhem Hunter, an Australian Aboriginal fourth-generation pearl diver from Broome, Western Australia, was on a visit to Sydney. Making use of his stay in the city, he consulted a Chinese medicine practitioner for soreness of his joints. Four hours after taking three cups of a brewed decoction containing the Chinese herbal ingredient aconite, the trainee bookkeeper and musician ‘began to sweat, his forearms tightened, his lips and mouth went dumb, and he began to “spin out”’. 20

Hunter was rushed to the intensive care unit of the Prince of Wales Hospital, where he was pronounced clinically dead. It took twenty four hours for the twenty medical hospital staff to revive the patient whose heart supposedly stop beating nine days before. The New South Wales Police and Department of Health investigators reportedly investigated a traditional Chinese medicine practitioner from Pitt Street in Chinatown, as well as the herbal brew which he prescribed. 21 A week later, the Australian Customs operatives in Sydney seized 1000 packages of ‘medicines containing musk deer extracts and almost 4,000 packages of medicine made from other endangered species’. 22
In the morning of August 12 in Melbourne, police and Health Department operatives raided the premises of a Chinese herbalist where Chinese herbal preparations and Western pharmaceuticals were seized. A spokesperson from the Department of Health and Community Services said that the herbal preparations contained ‘traces of the prescription-only steroid drug Dexamethasone and the bronchial dilator theophylline’.  

The above two incidents involved the use of substances (aconite and Western pharmaceutical drugs) in restricted schedules. Except for drugs available over the counter, pharmaceuticals can only be prescribed by biomedical health practitioners.

The incident involving Arnhem Hunter was discussed at a national meeting of the NTCMLC in Sydney at that time. In the case of Melbourne police raids, TCM practitioners and their associations wrote a letter to the Medical Officer expressing their concern over the incident and proposed an urgent meeting with him to explore the possibility of setting up a ‘liaison body that could establish protocols for resolving issues and problems regarding the dispensation of herbal preparations in this state’.

On October 7 a meeting was organized between Victorian TCM practitioners and officials of the Drug and Poison Therapeutic Goods Unit of the Victorian Department of Health and Community Services. As an official of one of the TCM associations, lecturer on TCM at the Victoria University and Melbourne University researcher, I was invited to the meeting. Minutes of which were taken by a Health Department official and and myself. I then sent a copy to my research supervisor.

At the start of the meeting, an ‘Information Sheet’ was distributed under the name of the Department outlining relevant Australian legislation on the use of scheduled drugs and
poisons. Mr. Keith Moyle then explained these various laws and how they are applied in the regulation of poisons and drugs. I asked which Chinese herbs were covered by the schedule. The Health Department people did not know, and I gave them a copy of the NTCMLC brief on this matter. I also gave the Health Department representatives a brief introduction to 'Chinese herbal preparations with pharmaceutical ingredients' (CHPPI) and the history of their use in China, and showed them a copy of a Chinese book published in 1983 (1,730 pages long, almost half a kilo in weight and 2.5 inches thick) entitled *Compilation of Chinese Materia Medica Preparations* (*Zhong Yao Zhiji Huibian*). In this book, out of 2,700 herbal preparations compiled from 1949 to 1977, 40% would be herbal preparations with pharmaceutical ingredients. I therefore suggested the need to educate the community and the Health Department with regard to such Chinese herbal preparations. Mr Moyle said that there had been another police raid on a TCM practitioner's premises, that all the patients who took the Chinese herbal preparations containing steroids were of European background and that one suffered from irreversible side-effects. He said that the patients took the preparations with the belief that they were just having herbs without drugs. He concluded that the community and the Health Department had the obligation to ensure that such incidents would not happen again.

In reply to Moyle I said that it was in the pursuit of this obligation that we had proposed this meeting, and that members of our TCM organizations could deal with this problem. We could not, however, readily influence those outside our professional associations. Moyle pointed out that registration of TCM practitioners was not the brief of this meeting. I proposed that a more formal liaison group be established between the Department of Health and Community Services and the various TCM Victorian associations represented at the meeting, which could deal with problems related to TCM practice. Moyle suggested that those present could write a letter to the Department introducing their organizations, describing their code of ethics and
giving contact numbers and address.

The following year, on September 15, 1995, a news release from the Office of the Health Minister announced that the State Government and practitioners of traditional Chinese medicine ‘have joined forces to launch a comprehensive study of its application in Victoria’.

The study has been prompted by the increase in demand for traditional Chinese medicine by Victorians of all ethnic origins, complaints from consumers on the use of herbal preparations, some of which have been adulterated with potent western medicines, and difficulties in controlling this area. 27

This government-sponsored study originally cost $50,000. 28 This increased to $110,000 29 and subsequently to $125,000, consisting of $80,000.00 contributed by the Kennett government in Victoria, $40,000 from the New South Wales government and $5,000 from the Queensland government. 30 Its purpose was to look into the practice of TCM in Victoria, the services offered, risks and benefits from the practice, qualifications and numbers of TCM practitioners. Two committees were established to oversee this study, the TCM Review Committee and the Research Reference Committee. 31 On September 12, 1995, I received an invitation from the Director of Public Health, C. W. Brook, to be a member of the Research Reference Group. Eventually I was asked to be part of the research project team from the University of Western Sydney which won the government tender to undertake this Victorian Government study.

The terms of reference of the TCM Review Committee were:

   1.1 The nature and extent of the services, diagnostic methods, and therapies offered
or used by practitioners of Chinese medicine.

1.2 The qualifications, proficiency and competency of persons teaching and practising Chinese medicine.

1.3 The risks associated with the delivery of Chinese medicine services, diagnostic methods and therapies.

1.4 The organizations representing practitioners, their memberships, charters and links with China based traditional Chinese medicine Administration and educational institutions.

1.5 The relationships between the practice of Chinese medicine and the practice of Western medicine.

2. To investigate whether there is a need for registration of Chinese medicine practitioners and regulation of herbal preparations, and make recommendations on these matters to:

2.1 The Department of Health and Community Services.

2.2 The AHMAC Working Group on the Regulation of Currently Unregulated Health Occupations.

2.3 The Federal Therapeutic Goods Administration.

3. To liaise with other states concerning the need for a national approach to regulation of Chinese medicine. 32

As the ‘project manager’ of this review of TCM practice in Victoria, I did liaison work, participated in, organized and chaired some meetings, and supervised the survey of the TCM Workforce. I also wrote a monograph for the Project team entitled ‘Introduction to Chinese Herbal Medicine’ and searched volumes of Chinese-language TCM journals from my private library, covering a period of more than ten years. These became a major part of the ‘raw data’ from which Doctor Ian McDonald 33 wrote his ‘Evaluation of Human Clinical Trials of Chinese Herbal Medicine’. In April 1996 an ‘Interim Report on Traditional Chinese Medicine Research Review’ was submitted by the project team to the Public Health Branch of the Victorian Department of Human Services. This report included an unabridged version of Doctor McDonald’s ‘Evaluation of Human Clinical Trials of Chinese Herbal Medicine’. 34

In November 1996 the final recommendations of the TCM Project Team, entitled Towards a
Safer Choice: The Practice of Traditional Chinese Medicine in Australia, were launched at the Museum of Chinese-Australian History in Chinatown, Melbourne. One of the major recommendations of the research team was the statutory occupational regulation of TCM in the state of Victoria.

A Controversy

I take up my story again as the newly elected Labor government in Victoria prepared to introduce the Chinese Medicine Registration Act 2000 in the Victorian Parliament. This triggered opposition from the main biomedical professional group - the AMA. The controversy highlighted the problem of communication and conversation between orthodox and heterodox medical practitioners in Australia and in the state of Victoria in particular.

Generating an antecedent version of the Chinese Medicine Registration Bill, now law, was a major project of the previous State Government. In May 2000, the Chinese Medicine Registration Bill went through the second reading in the Lower House of the Victorian Parliament. In August of the same year, in a forum held at the University of Melbourne, bilateral support for the Bill was expressed. With an unexpected change of government, however, the Bill lapsed.

When news spread about the intention of the Bracks government to introduce their version of the Bill early in 2001, dissension erupted. The AMA and other biomedical health practitioner organizations were vocal in their opposition. Newspapers carried headlines like 'Revolt on Chinese Medicine!,' 'Doctors Call for Block on New Law' and 'Doctors resist Chinese Watchdog!'. The Victorian state president of the AMA, Doctor Michael Sedgeley, was quoted as as saying that 'doctors were very unhappy with the legislation because it would
allow an outside organization to oversee standards in the medical profession'. Through the AMA web site Doctor Sedgeley said that 'of added concern to doctors is the requirement that medical practitioner acupuncturists will have to answer to the Chinese Medicine Registration Board rather than their own medical board. It is completely unacceptable to doctors to have "non-medically" qualified people directing their clinical practice'. In a media release circulated among the electronic media and in turn handed to an official of a TCM association by a television reporter, it was stated by Doctor Paul Hemming, speaking on behalf of the Royal Australian College of General Practitioners, the Australian Medical Acupuncture College, the Australian College of Herbal Medicine and the Australian College of Physical Medicine, that the proposed Bill "will create a new class of people carrying out related medical procedures without being registered under the Medical Practice Act of 1994". The AMA called on their members to write to their parliamentary representatives to oppose the Bill.

On the other hand, officials of practitioner organizations of Chinese medicine sent letters and petitions urging the new government to introduce the Bill. The Alliance of Chinese Medicine Associations of Australia, the Chinese Medicine Unit of the Royal Melbourne Institute of Technology and the Australian Chinese Medical Research Council jointly signed and sent a petition to the Health Minister for this purpose. The petition put forth six grounds in favor of the introduction of the Bill, including the broad community and bipartisan support for the Bill, the legitimation and continued practice of TCM in the state, the high standards of practice that would be established, the provision of a mechanism to identify well-trained TCM practitioners thereby safeguarding public health and safety, the regulation of TCM having been a recommendation of a major government research committee, and that the Bill was an example of the multicultural nature of the state of Victoria and the pluralism of medical traditions and cultures there.
What was interesting to me about this controversy was the complete absence of any space for dialogue between the representatives of the two traditions of health care. Perhaps the most paradoxical and unfortunate consequence of this controversy was the deletion of a provision of the previous Liberal Government Bill that could have instituted such a relational space between discrete medical institutions in Victoria. The final clauses contained in the previous version of the legislation provided for ‘consultation’ between the Chinese Medicine Registration Board and other health professional boards on matters of ‘standards of training and clinical practice’.

The enactment of the *Chinese Medicine Registration Act 2000* by both Houses of the Victorian State Parliament marked the beginning of a new era in the history of the Australian health care system. The old era of ‘medical dominance’ which began with the occupational registration of biomedical health practitioners in the middle of the nineteenth century is now giving way to an era when one can hope for a more symmetrical translation and better cooperation among a constellation of health care traditions, including biomedicine. Like other complementary and alternative (CAM) practices, traditional Chinese medicine (TCM), a non-European and ‘non-scientific’ health care tradition, is, after two centuries of exclusion, marginality, subjugation and subordination, taking its rightful place in the Australian medicinal community. This Act of the Victorian Parliament has freed TCM from the status of ‘subjugated medical knowledge’ to make it an autonomous medical practice which will devote its four millennia old techniques and resources to the health of the Australian community.

Being a non-European and ‘non-scientific’ medical practice, TCM will always have a challenging relationship with Western scientific traditions of health care. Transcending medical cultural boundaries is always a daunting task. To have healthy communities of men, women
and children, however, different medical traditions in Australia have to learn to talk and listen to each other. In this sense they have to mutually and symmetrically translate to one another as equal members of one big Australian health care family. The first significant step towards this protracted learning process of communicating and translating to each other took place on July 20, 2000 at the Royal Children’s Hospital in Melbourne - a major Western laboratory-based medicine institutional space devoted to the care and health of children of all races, creeds and walks of life.

Construction of a ‘Dialogical Space’?

One early evening of April last year, as I was finishing a hectic day seeing patients, I received a phone call from Doctor Amelia Dozzi, a member of the steering committee of the Royal Children’s Hospital International (RCHI). Doctor Dozzi proposed a meeting between Doctor Helen Verran (my PhD supervisor), Doctor (now Professor) Gary Warne (an endocrinologist), Frank Kelly (Director and business manager of the RCHI) and myself. The RCHI is the international arm of the Royal Children’s Hospital. Its aims are to ‘improve the health of children and adolescents everywhere’ and to ‘create opportunities for the Royal Children Hospital, its staff and students’. The RCHI runs over fifty collaborative research and teaching programs all over the world and aims to establish ‘footprints in the Asia Pacific Region’. The Royal Children’s Hospital itself is a three hundred and thirty bed paediatric hospital affiliated with the Faculty of Medicine of the University of Melbourne. It provides care for sick infants, children and adolescents in the states of Victoria and Tasmania, and specialized paediatric care for a number of patients coming from south-east Asia, Nauru and Fiji.

According to Doctor Dozzi, Doctor Warne and Mr Kelly were interested in discussing the
possibility of a seminar covering TCM practice and health care, an undertaking supposedly to be followed by a small research project. According to Doctor Dozzi, Doctor Warne had just came back from China 'very impressed' with TCM over there.

On April 12, I attended a meeting with Professor Warne, Doctor Dozzi and Frank Kelly. At the start of the meeting Professor Warne asked what TCM registration was all about. I told him that it was all about politics. I then gave them an account of my work as TCM project manager and its connection with the Victorian Government's preparations to introduce legislation for the registration of TCM practitioners. I also told them about my recent trip to London to attend a closed-door research conference on CAM and told them how impressed I was by the biomedicine practitioners in Britain, who were very open and positive about alternative systems of medicine compared to those doctors in Melbourne who opposed the legislation. I said that this demonstrated the chasm between TCM and biomedicine - one which needed to bridged.

Professor Warne proposed a TCM seminar at the Royal Children's Hospital to preface a collaborative research project that the RCHI was negotiating with a hospital in Changsha, the capital of Hunan province in China. The TCM seminar would be an inaugural seminar of a series of health seminars being organized by RCHI. The proposed date of the TCM seminar was July 20. Possible themes of the seminar were 'Practising TCM' or 'Chinese Medicine Today'. The speakers would be from the Department of Human Services, the Chinese Consulate, the AMA, Amelia Dozzi and myself. I was asked to prepare the program of the seminar.

In the morning of the day of the TCM seminar I received a fax from Professor Warne, who
would be chairing the seminar, saying that ‘there is a very high level of interest in the seminar and we plan to have a video link set-up in the foyer in case there is an overflow’.

As I walked in I noticed a poster, which put a number of questions to the audience:

Traditional Chinese medicine is widely seen in the community as an alternative to Western medicine and many parents take their children to TCM practitioners.
The Victorian State Parliament recently passed legislation to set up a Register of practitioners. Do you want to know what the regulations mean?
Are you interested in becoming involved in research comparing TCM and Western medical approaches?
Should RCH consider opening its doors to TCM?

The seminar was well attended. Professor Warne stated in his opening speech that the seminar represented ‘an acknowledgement of a famous medical tradition that we want to know more about, that is, TCM’. His Excellency the Chinese Consul-General Wu Rong He called on the scholars from both medical traditions to collaborate in researching this ancient body of knowledge.

As the first speaker of the seminar, I was asked to talk about the philosophical foundation of TCM. My paper was entitled ‘Philosophical underpinnings: How can we develop ways of communicating in mutually respectful ways? Making a “Translating Knowledge Space” between traditional Chinese Medicine and Western Laboratory-based medicine’. This later evolved into a major theoretical framework of this thesis. I proposed that a communication space i.e. a ‘translating knowledge space’ be instituted between TCM and biomedicine, one not structured by the axes of domination. Within this translating knowledge space, the local
enactment of the disparate practices of TCM and biomedicine and their interactions through a symmetrical translation network constituted an emergent knowledge space through which the two knowledge systems could be locally compared, contrasted and worked together. Such a space would enable TCM and biomedicine to understand each other’s positions.

Randomized Control Trials - A Translation Issue

Allan Bensoussan, who heads the Research Unit on Chinese Medicine at the University of Western Sydney, tackled the problem of randomized clinical trials as an issue straddling TCM and biomedicine. He said that Chinese trials in general ‘do not meet the stringent methodological standards to be broadly acceptable to the Western medical community’.

In his talk, entitled ‘Evidence-based Practice In Chinese Medicine,’ Bensoussan said that TCM is now a significant part of the Australian health care economy, with $90 million being spent by consumers on TCM consultations alone. Bensoussan observed, however, that TCM has a ‘weak scientific base’ (i.e. a weak evidence base), and for purposes of regulation of the practice in Australia, this can present a problem. He pointed out that, in the United States and Germany, governments will not use Chinese clinical trials for regulatory purposes, and concluded that there is a pressing need to lift the standards of TCM clinical research. In order to achieve this, he said, it was necessary to acquire quantifiable clinical trial evidence.

In searching for evidence of the efficacy or risks of Chinese medicine modalities such as acupuncture and Chinese herbal medicine (CHM), Bensoussan looked back at the 1996 Victorian government funded study into the practice of TCM, which included, among other things, a review at the clinical trials published in the English-language and Chinese-language literature. Seven criteria had been used in assessing the value of the CHM clinical
trials. This time Bensoussan looked again at the clinical trials, using the Cochrane Collaboration Levels of Evidence as his evaluation tool. According to the Cochrane Collaboration there are six levels of research studies from which a graduated scale of evidence can come. These are:

- **Level I** Strong evidence from at least one systematic review of well-designed RCT (randomized control trial)
- **Level II** Strong evidence from at least one RCT
- **Level III** Well designed trial without randomization
- **Level IV** Non-experimental evidence;
- **Level V** Expert Opinion
- **Level VI** ‘Someone told me’

Bensoussan said that, using the Level 1 criterion, he was able to find ‘evidence’ of acupuncture efficacy for some medical conditions. Using the second level he found evidence of efficacy for CHM in the treatment of irritable bowel syndrome, ^3^ eczema and hepatitis C. He said that the Cochrane Collaboration researchers are now in China with plenty of work on their hands.

With this structure of values being used in measuring the efficacy of TCM modalities, it looks as though the ‘practice values’ of Western laboratory-based medicine do not ‘translate’ symmetrically with the practical values of bian zheng lun zhi. The ‘gold standard’ used in the evaluation of purified pharmaceuticals is being deployed to structure the values to be applied in evaluating a herbal formula that fit a contingent clinical pattern or zheng in Chinese.

Evidence generated by and based upon the ‘experimental clinic’ is being used to validate the efficacy or safety of medicinal objects/subjects in the TCM clinical microworld.
Charlie Xue, a TCM practitioner, senior lecturer and coordinator of the RMIT (Royal Melbourne Institute of Technology) Chinese Medicine Unit, presented his research on the use of TCM in the treatment of asthma and hay fever. Xue did a literature review of clinical trials conducted in China on the use of acupuncture and CHM (Chinese herbal medicine) in the treatment of these two conditions. At the outset he pointed out that Chinese medicine and Western medicine do not have fundamental differences: ‘They just use different terminologies and look at the same person and same condition from different perspectives’.

In case of asthma, Xue described the clinical patterns zhenghou (he translated it into English as syndrome differentiation) of asthma - wind heat, wind cold and organ deficiencies - and pointed out that there are many Chinese medicine ways of managing this condition, from acupuncture to CHM. ‘What I propose here is extracted from the text book,’ he said. In his personal comments on the management of asthma he identified broad management methods divorced from their individual and contingent clinical patterns. He said that in China acupuncture is administered daily for asthma while in the West it is administered once a week.

As for hay fever, Xue said that the ‘pathogenesis’ and ‘etiology’ are similar to asthma. They are both due to weak immunity (Western medicine): ‘accumulation of damp’ (TCM) and upper respiratory tract infection (WLM). He uncovered three RCTs (randomized control trials) on the use of CHM in China and eight RCTs on the use of acupuncture. The potential mechanism is similar to asthma, he said. His general conclusion: ‘Further studies are needed to evaluate the clinical efficacy and safety by exploring sound methodology and adhering to Chinese medicine theory for acupuncture and CHM’.

Anna-Louise Carlton was introduced by Professor Warne as the ‘driving force’ behind the review of TCM practice in Victoria and the person ‘behind the passage of the Chinese
*Medicine Registration Act 2000*. Carlton is a Project Manager in the Workforce Branch, Policy Development and Planning Division of the Department of Human Services Victoria. At the start of her presentation, Carlton introduced herself as an ‘educated consumer of CM (Chinese medicine)’. She said that she and her child take the Chinese preparation *Gan Mao Ling* for common colds. Last year, however, when her child was afflicted with salmonella poisoning, she chose to take her to hospital to receive Western medical management. However, she added that her child also was administered Chinese herbs for this condition.

Carlton then outlined the process and stages she oversaw, through which a regulatory and statutory structure has been set up to regulate the practice of TCM in Victoria over the past five to six years. One particularly potential volatile issue (which she acknowledged was pointed out in my paper) was the deletion of a previous version of the Chinese Medicine Registration Bill (the Liberal Government Bill) that provided for consultation between the Chinese Medicine Registration Board and other health occupational boards on matters of TCM standards of training and clinical practice. As matters stand with the current legislation, conflicting levels of TCM professional, technical and ethical standards could arise from various health occupational registration boards e.g. the Chinese Medicine Registration Board, the Medical Board of Victoria, the Chiropractic Board and the Nursing Board regarding the regulation of practitioners who practice TCM modalities like acupuncture.

At the conclusion of her presentation the floor was open for questions from the audience of mainly WLM practitioners, which Professor Warne referred to as ‘the dialogue’.

There was one query about how to deal with a parent of a red-haired child who refuses to have vaccination because a TCM practitioner told her that vaccination generates ‘heat’; and what relation there is, if any, between ‘heat’ and a ‘red-haired’ child. Prof. Warne also asked whether moxibustion, which looks ‘awful,’ and acupuncture and massage, which look
'equally awful,' can be used for children. One person asked how acupuncture can be explained in terms of anatomy and physiology, and another. And another where money for TCM research in Australia would come from.

With regard to the queries on the reading of acupuncture through anatomy and physiology and the issue of vaccination, I referred to the issue of translation and communication between TCM and WLM i.e. accessing both cultures of healing and being able to relate the practices of one to the other.

I would say that, judging from the audience's queries and the response from other speakers, it seems that people were bypassing each other. The audience and speakers themselves seem not to be listening to each other. It appeared that everyone was very polite and keen to avoid any engagement. From the tone and structure of the seminar it looked as if people who attended were not there to be open and be changed. However, the seminar, as I see it, was an opportunity for cultural and technology transfer. TCM and WLM, as Australian traditions of health care, should be open to change and transformation. The seminar was an opening to dialogue. It was not a marketing exercise.

The randomized control trial (RCT) is the basic clinical evaluative tool used by Western laboratory-based medical practice in assessing the efficacy of medical treatments. Historically, it originated in the form of agricultural tests developed by the British statistician Ronald Fisher during the early decades of the twentieth century. However, it was in 1946 that the RCT was first used significantly for evaluating the clinical efficacy of streptomycin in the treatment of tuberculosis. A clinical trial is defined by Friedman 'as a prospective study comparing the effects and value of interventions(s) against control in humans'. 'Prospective' means that patients receiving a new treatment are not compared with patients who received a
different form of treatment in the past. ‘Control’ refers to the comparisons made, which could either be between a cohort of treated and untreated patients or between a novel or standard treatment. In order to determine whether the effect of a treatment is the result of psychological factors the comparison is made between patients receiving potent drugs and those receiving a ‘placebo’ i.e. sugar pills and real tablets (Vincent et al. 1997, 156-157).

When both patient and doctor are both kept in the dark as to which is the real drug and which is the placebo, the clinical trial is considered ‘double-blind’. When only the patient is kept ‘blind’ then the trial is ‘single-blind’.

Ted J. Kaptchuk, an instructor in medicine at the Harvard Medical School, and author of a popular book on TCM, traced the history of the the RCT for the 1998 issue of the Bulletin of History of Medicine, referring to its metaphorical character as ‘laboratory’ and ‘machine’.

For the medical elite struggling to take medicine more of a science,
Fisher’s ideas offered a method with the appearance of scientific exactitude that could imitate the determinism and objectivity of the laboratory model and mimic the mechanical and mathematical precision of hard science. Clinical research could free itself from human judgement and resemble the precision of the laboratory.
The perceived scientific rigor of the RCT could legitimately stake a claim to much of the terrain that had previously clung to medicine’s “art”. The RCT offered the dream of the scientist who arrives at new knowledge by a completely mechanized procedure.

Another key feature of the RCT is ‘randomisation’. This means that patients are allocated by chance, which in the case of the trials involving streptomycin in 1946 involved the allocation of
patients through the consultation of sealed envelopes deposited in centralized locations (Vincent et al. 1997, 155).

The RCT is a standardized tool used in evaluating the efficacy of a single pharmacologically active purified drug with regard to the palliation or cure of diseases of the body. (This description is based on remarks in Doctor Ian McDonald’s unpublished paper, entitled ‘The Benefits and Status of Scientific Research in Traditional Chinese Herbal medicine: An Evaluation of Human Clinical Trials’.) The question is then asked, can we translate this WLM evaluation standard into a TCM evaluation tool which can measure the efficacy of TCM treatment modalities like acupuncture and Chinese herbal medicines?

Professor Paul Komesaroff, Associate Professor at the Department of Medicine, Monash University, and director of the Baker Medical Institute, writing on the scientific and ethical issues relating to the use of complementary medicines, pointed out in an article published in the Medical Journal of Australia (1998) that ‘complementary therapies in general, and traditional Chinese practices in particular, are in principle not susceptible to assessment using randomised-trial designs’.

In particular, a review of the use of RCT in the evaluation of the therapeutic efficacy of acupuncture found serious methodological flaws like poor design, inadequate measures and statistical analysis, lack of follow-up data, problems in measurement of outcome as well as in design and choice of control groups (Vincent et al., 1997, 181-182). Specifically, serious questions have been asked by researchers on the suitability of using the ‘double-blind’ feature of the RCT in evaluating acupuncture, a therapeutic methodology requiring practitioners skilled in TCM diagnosis, acupuncture point location, complex needling manipulation targeted to a particular patient, and the sensing of de Qi and transmission of the Qi chuan Qi by
both practitioner and patient.

It is difficult to see how a trial of acupuncture could be double blind. It would mean that the person giving the treatment would not know whether he was giving true or sham treatment, and he would therefore have to have little or no experience as an acupuncturist!” (Vincent et al., 1997, 165)

Early last year, an internet debate among subscribers of ChiMed, an international internet discussion list of scholars and academics involve in traditional Chinese medicine studies about the role of placebo in RCT-dominated research into acupuncture, clarified important issues regarding the way research on this ancient therapy should be conducted in the West. Catherine Kerr from Harvard Medical School, responding to a contention that ‘acupuncture has not proven to be clearly superior to randomized clinical trials,’ argued that RCT’s have much less success in evaluation of procedures. Kerr, who was then involved in the Harvard Medical School research on ‘Acupuncture and Placebo’ and ‘Qigong and Cancer’ stated:

Randomized control trials were developed to test PILLs...They were designed to remove the non-specific problems of investigational bias and patient expectancy. To strip the pill’s effects down to it’s pure SPECIFIC chemical form. RCT’s have been much less successful at evaluating PROCEDURES (such as surgery and psychotherapy) because in procedures, almost always there can only be single-blinded trials (does anyone want a surgeon who can’t tell if he is really performing the procedure?).

Kerr also gave some very insightful comments about acupuncture and the imaginary Qi:
Anyway, it may be most useful to think of acupuncture as a kind of ancient meditation or “biofeedback”... It may be that “qi” is an experiential phenomenon and that the way acupuncture works is by leading a patient’s awareness to the fascia below the skin. This awareness may have some efficacy in bringing more blood to the area which in turn may produce pain relief distally.

In 1996, an ‘appendixed’ segment of a report which recommended statutory regulation of the practice of TCM in Victoria looked at the appropriateness of the randomized control trials in evaluating Chinese herbal medicines. This ‘appendixed’ segment was actually a study conducted by the epidemiologist Doctor Ian McDonald, then a Professorial Associate at the University of Melbourne and Director of the Centre for the Study of Clinical Practice based at the St. Vincent’s Hospital in Melbourne. Looking into the status of human clinical trials conducted in China (1983-1996) on the efficacy of Chinese herbal medicine (CHM), Doctor McDonald, who was officially commissioned to do the study, prefaced his report by saying that it should be stressed at the outset that to apply the Western analytical method of the clinical trial to the evaluation of an aspect of Traditional Chinese medicine (TCM) exposes a mismatch inherent in the intellectual paradigms of two cultures, and that ‘the application of modern analytical reductionist methods to the evaluation of a wholistic approach to treatment is problematic both as an exercise in scientific research and as a claim to representing an evaluation of the practice of TCM’. (Bensoussan et al. 1996, 341-342)

Pointing to the difficulties faced even by WLM clinical studies in conforming to the rigors of the RCT, McDonald most importantly drew attention to more magnified difficulties of using this evaluation technique in assessing the efficacy of Chinese herbs.
The randomized controlled trial faces greater problems in evaluating traditional Chinese Herbal Medicine than it does when confronted by purified drug in the Western setting...The aim of Western medicine is to identify a single pharmacologically active pure agent with known effects. In a herbal decoction, there are multiple herbs, and the composition is not uniform from the point of view of the character of each ingredient and the formula for each patient. Each ingredient has multiple constituents which can interact with each other in a reinforcing or inhibitory way, according to factorial mathematics of combinatorial probability. Even worse, these complex dynamic interactions tend to manifest quite unpredictable and unexpected (emergent) properties which could be either important for clinical effectiveness or a cause of toxic effects. On top of these difficulties, it has already been suggested that in the case of eczema, it is quite possible that clinical benefit depends on actions on multiple physiological pathways operating simultaneously. The problems confronting a reductionist approach to ‘controlling’ this degree of complexity are formidable indeed. (Bensoussan et al. 1996, 359-360)

A study conducted between 1998 and April 1999 by the Jean Hailes Foundation and Monash University, using the randomized double-blind controlled trial to evaluate the efficacy of Chinese medicinal herbs on menopausal symptoms, further demonstrates the limits of this standard clinical evaluation in assessing a modality of TCM. First of all the ‘trial design did not accommodate the diagnostic and therapeutic principles of Chinese medicine’. Furthermore the study also did not allow ‘for modification of herbal constituents during the studies according to individual responses’. Hence it was not surprising that the result of the study found that ‘CHM was no more effective than the placebo’. TCM practitioners contacted by the media to comment on the above study stated that the study was flawed ‘because it used a set herbal formulae for all patients contrary to the usual
practice in traditional Chinese medicine in which formulas were tailored and adjusted depending on the patient’s response. 47

TCM practitioners also said that the randomized placebo controlled model used ‘was the standard for Western medicine but was at odds with the holistic nature of traditional Chinese medicine’. 48

If the RCT ‘gold standard’ cannot be used to evaluate the efficacy of TCM modalities, are there any alternative clinical evaluation standards that can be used? Has TCM generated any clinical evaluation standard at all in its millennial historical development? In my Master’s thesis (1996), I proposed that the Four Evaluation Techniques Si Ping 四評, a clinical evaluation standard or template derived from the TCM practice of bian zheng lun zhi (‘proposing treatment principles on the basis of the diagnosed clinical pattern’), be employed in clinically evaluating the efficacy of therapy or therapies administered to a specific patient. Acupuncture, herbs, foods or massage therapy are chosen and administered on the basis of the presenting clinical pattern of a particular patient. The clinical efficacy of these therapies is also assessed on the basis of changes in the clinical pattern i.e. changes in the symptoms. On the subsequent visit, concentrating upon the patient’s major complaints and other symptoms, the practitioner refers to the medical case record and assesses the patient’s response to the therapy.

Using the Four Evaluation Techniques, data on the symptoms observed after the therapy are observed, interrogated, listened to, smelled and palpated. These data are examined, verified and compared with data on symptoms collected and recorded in the medical case records during the previous clinical visit. Using the Four Evaluation Techniques, the clinical pattern is ‘retraced’ to see if the therapy achieved the aim of bringing about balance. Hence, every subsequent visit
or consultation is a process of evaluation of the therapy administered during the previous visit. During these visits, presenting symptoms are used as indicators of efficacy of the therapy administered.

As we can see, there are profound differences between the RCT and the Four Evaluation Techniques. RCT’s are mainly employed in evaluating the efficacy of purified pharmaceutical drugs regarding the cure or palliation of disease of the body, while the Four Evaluation Techniques are employed in assessing the efficacy of acupuncture, herbs, food, massage and so on with regard to (in Doctor McDonald’s words) ‘the relief of symptoms’ embodied in the diagnosed clinical pattern or zheng hou. This difference between the two evaluation standards exemplifies differences between power practices between the two knowledge systems. And these differing power practices are relevant in the current Australian negotiations over clinical evaluation standards, taking place as they are in an arena dominated by the power practices of science. Understanding clinical evaluation standards in this way is to take standards for what symbolic interactionists call ‘folk concepts’. Seeing them as strategic accomplishments of two disparate systems implies that they cannot be translated into each other. They are practically incommensurable - the standards of one system will not work in the other. But it does not follow from this that the two systems cannot be employed together in reasonable ways at the local level. When RCT and the Four Evaluation Techniques are seen as ‘tools’ it is possible to articulate between the two sets of practices, and cooperation at the local level can be systematized.

**Performing a ‘Translating Knowledge Space’**

Almost a year after the TCM-WLM dialogue at the Royal Childrens Hospital, on May 25, 2001, a more significant and much wider dialogue between different Australian traditions of
health care occurred at Baker Medical Research Institute at the Alfred Hospital in Melbourne.
This meeting was called by Kylie O’Brien, the Project Manager of the Institute. She invited me to attend the meeting as President of the Alliance of Chinese Medicine Associations.
Several months before, I had received a letter from the Baker Medical Institute signed by Kylie O’Brien and Professor Paul Komesaroff regarding the ‘Victorian Complementary Medicine Research Alliance (VCMRA) Questionnaire’:

As we are sure you recognize, complementary medicine is growing rapidly in this country and it is widely agreed that there is a need for good quality research. However, we feel that such research needs to stay true to the complementary medicine theory and practices on which it is based. This has not always been appreciated in the past, as a result of which studies have often suffered from inappropriate designs. We would like to address this question systematically by promoting ways in which complementary medicines can be researched in harmony with both established scientific techniques and their underlying principles and practices.

The CAM (complementary and alternative medicine) meeting was held at the Alfred Hospital, with forty or fifty participants in the meeting. They included Jocelyn Bennet, the editor of Diversity, a magazine catering to complementary therapists and a member of the panel assisting the Chinese Medicine Registration Board of Victoria, Doctor Vicky Kotsirilos (a conventional doctor now practising 'complementary medicine' and president of the Victorian Integrated Medicine Association) and Pauline McCabe, a senior lecturer on naturopathy at La Trobe University. Also present were Marc Cohen from the Monash University Complementary Medicine Research Center, Anna Louise Carlton from the Victorian Health Department, and Charlie Xue, a newly appointed member of the Chinese Medicine Registration Board of Victoria and the coordinator of the Chinese Medicine Unit at RMIT.
The meeting was chaired by Professor Paul Komesaroff, who had written an article entitled ‘Use of Complementary Medicines: Scientific and Ethical Issues’ for the Medical Journal of Australia in July 1998, in which he made a general survey of the scientific, ethical and clinical issues related to the use of complementary and alternative medicines in Australia.

Paul briefly described the nature and purpose of the meeting and distributed a five page document entitled ‘Victorian Complementary Medicine Cooperative Research Centre Project-Project Summary’. The main aim of the project is to stimulate research and development of complementary medicines in Victoria and ‘establish a framework to facilitate the development of a research-based Victorian herbal medicine industry that markets high quality preparations of herbal extracts for both local and international consumption according to world’s best practice’. It is also intended to ‘contribute to educational and cultural development’ in the area of CAM. The project summary specifically referred to five areas:

1) Research into and development of herbal medicines, including both basic and clinical research;

2) Assessment of existing evidence concerning the uses and effects of these medicines;

3) Development of appropriate intellectual tools for the study of complementary medicines that take account methods of use and the cultural settings in which they are applied;

4) Development of educational programs to inform the community about the uses and effects of complementary medicines; and

5) Effective and appropriate marketing of new products.

Financial support for the project will come from government, industry and academic institutions. Income will also be generated according to the project summary from the ‘development of new intellectual property capable of generating income from both national and international markets’. To provide infrastructure for this undertaking, the project summary proposed the establishment of a Reference Group consisting of a chair (to be assumed by the Director of Public Health), two scientists, two complementary practitioners,
two consumer representatives, two medical graduates and two persons with interest in philosophical or social aspects of complementary medicines. A project officer will be appointed to run the project and be accountable to the Reference Group.

According to Paul, the idea about the project came from the Director of Public Health, Professor John Catford. It got underway last year and work on the project started early this year. The idea grew out of a desire to develop a coordinated and rigorous approach on the use of CAM. He said that currently CAM is very popular and has a wide variety of practitioners. However, there is very little ‘conventional research’ on it. Little is known also about its potential risks. He also pointed out that there is very little comprehensive data about CAM. Currently, he said, there is a study being conducted by an Honours student on the use of CAM in the treatment of HIV AIDS. He also mentioned some problems and issues surrounding the use of CAM i.e. gaps between conventional and complementary practitioners and interactions between different medicines. He said that these issues can easily be addressed if they are brought into the open.

Paul said that the current stage of the project i.e. Victorian Centre for Research into CAM, is at the point of developing a proposal. The priorities as he sees it will be in the area of ‘substance related medicines’ and possibly acupuncture. As for the structure for the project, he sees the research centre as an ‘organization without walls’ where things will be run democratically. The centre will stimulate-facilitate, survey the field and identify people and industries. Funding will come partly from government, partly from community support and partly from people with commercial interests. The immediate goal of the centre is the production of a booklet which will serve as a discussion document. It will deal with philosophical, cultural and ethical issues. He sees ‘scientific’ issues as the most difficult area in the study.
Paul identified three areas which needed discussion and ventilation. These are: objectives (of the project), organizational structure, and funding. At the start of the general discussion there was a suggestion that we introduce ourselves. More than half of the participants identified themselves as CAM practitioners raised their hands. There were three conventional doctors, a number of academics, and a number of representatives of industry and different CAM schools. There were also a number of representatives from the University of Melbourne. Representatives also came from the research, education and policy, and regulation sectors.

At the start of the discussion I spoke of the problem of defining the parameters of CAM in the Australian context. I said I was a Chinese medicine practitioner and was not used to being categorized as a CAM practitioner. I spoke of a CAM closed-door research conference that I attended last year in London, where there was an attempt to define which health traditions are included within complementary and alternative medicines. I suggested that among the diverse health traditions within CAM, as well as CAM and conventional medicine here in Australia, each health tradition should have equal status and none should have a privileged position.

Jill Teschendorff, a nursing academic at Victoria University of Technology, proposed that in health practitioner-patient interactions the term 'medicines' should be changed to 'relationship'. Pauline McCabe proposed another terminology change - that CAM be changed to 'complementary health care'. Marc Cohen raised the issue of CAM postgraduate training. A woman herbalist-scientist discussed the philosophical aspects of clinical trials. She pointed out the difficulties associated with using double-blind clinical trials when practitioners are treating patients as individuals and when herbal doses change the course of treatment. Shelley Beer, a TCM lecturer from VUT and a member of the Victorian Chinese Medicine Registration Board, complained of CAM students not being able to secure scholarship for their studies. Vicky
Kotsirilos complained of lack of funding for CAM research.

At this point the chair drew the participants' attention to the issue of relationship between CAM and conventional medicine. McCabe raised the issue of different diagnostic parameters of the diverse health traditions within CAM, speaking of the predominance of the medical (Western) diagnosis. She said that there is a need for understanding different ways of prescribing.

Taking the cue from Professor Komesarroff on the issue of relationship between CAM and conventional medicine research, and referring also to the matters raised by McCabe, I spoke of the problem of the dominant 'ideology of science' with regard to traditional Chinese medicine. I said that in my current research I had looked at 500 years of interaction between Western medical science and TCM and had uncovered the domination of TCM by the ideology of science (later in the discussion Paul Komesarroff referred to this phenomenon as the 'risk of medical imperialism').

I said that this phenomenon is still apparent in China as the country marches towards the 'four modernizations'. The concept of integrating TCM and Western medical science in China essentially means the hegemony of science over the practice of TCM. I said that we were fortunate to be able to hold this meeting and discuss the issue of interaction between conventional medicine and CAM at this time for we could draw appropriate historical lessons. I spoke again of the need to structure and develop a non-hegemonic interactive 'translation' between TCM and Western laboratory-based medicine as well as between all the diverse traditions of health care in Australia.

Phillipa Rothfield, a lecturer in the Philosophy Department of La Trobe University and
a member of the panel assisting the Chinese Medicine Registration Board of Victoria, said that she agreed with my idea of 'translation,' especially in the light of the dominance of the methodology of double-blind clinical trial in China. She said that CAM is not a homogenized entity and methodology is an issue. How should research be conducted? Should there be just one template or a number of templates? She said that what is needed is 'a form of research which can talk to other forms of research'. They should be able to communicate with each other. She said that translation is an issue: research into CAM should be able to generate something together. As for the issue of organizational structure, Phillipa said the idea of a 'network' is something that is 'de-centred'. She suggested that the issue of communication is very important and requires a more 'centered' structure.

Raymond Carroll, principal, founder and senior lecturer of the College of Natural Medicine in Mulgrave, Victoria, informed the meeting that he had just come back from China and had personally witnessed the 'modernization of TCM in China'. He said that 'the more TCM is modernized and becomes more scientific the more it becomes more acceptable to the Chinese'. At a conference he attended, he saw volumes of papers written on the 'scientizing' of TCM.

In my Master's thesis (1996), I have argued against the value of science as a general choice for an evaluation system for TCM practice and modalities. Specifically, I have argued against the use of the values, standards and theory generated from the laboratory, a system of evaluation which translates TCM practice into laboratory replications. And in China this is precisely the path being taken by researchers evaluating the practice and modalities of TCM. In 1985, a researcher writing about their experience in using animal models to test the efficacy of TCM therapies had this to say:
How to use animal pathological model in theoretical research in the discipline of integrated TCM and WSM is a new problem. This is due to the fact that traditionally TCM mainly relies upon the Four Examination Techniques (observing, interrogating, listening, smelling and palpation) to “differentiate clinical patterns” (bian zheng). It (TCM) does not have a laboratory or a discipline like patho-histology with which to evaluate things. (Zhang Jia Qing, 1985, 430)

Many subsequent speakers then contributed to the idea of enhancing communication. Marc Cohen talked about communication between the medical profession and non-medical profession in a group practice setting. He said that, in this situation, every doctor has three natural therapists to refer to, while each natural therapist refers some patients to medicos. Asunta Hunter, a natural therapist academic, suggested that CAM practitioners and conventional medicos should mix socially so that they can reliably refer to one another. Someone also suggested e-mailing brief CVs to each other. A paper was circulated for everyone to write their name and email addresses, so that CAM practitioner and other health care practitioners could communicate with each other.

I left the Alfred Hospital feeling very happy about the meeting, reflecting on the words ‘organisation without walls’ and ‘research which can talk to other forms of research’. I recalled the London ‘closed door’ CAM research meeting where I thought there were RCT ‘walls’ appearing everywhere and RCT research which talked down to other forms of traditional research. I also recalled the Royal Children’s Hospital TCM Seminar with TCM practitioners and WLM practitioners ‘talking past each other’.

In this Victorian CAM Meeting, I thought everybody ‘performed’ a translating knowledge space. WLM, TCM and CAM practitioners were communicating, relating and translating to
each other symmetrically. I did not see any signs of ‘medical imperialism’. Australian traditions of health care are definitely moving forward from medical dominance to symmetry and harmony between different medical traditions.

In presenting these snapshots of where and how TCM is located, discussed, and imagined in the contemporary world, I have tried to illustrate my claim that it is a globalising phenomenon. There are of course strong and continuing elements that link up with Chinese cultural pasts, but in many places these cultural influences in TCM are strongly mediated by Western traditions of thought, practice and politics. At the same time, my images of TCM in various global locales are designed to do more than show the contemporary situation of TCM. In this chapter I have also tried to exemplify the methodology I adopt in this thesis.

I am a practitioner of TCM with its characteristic modes of practice, imagery, justification, and sociality. I am also a student in the Western academy which likewise has characteristic modes of practice, imagery, justification and sociality. To varying extents these modes are strange to each other. I am in a ‘double insider position’. My thesis must be recognisable as such within the traditions of the Western academy, and within the intellectual traditions of TCM. Over the many years I have been involved with this project or balancing act, first in studying for my Master’s degree, and subsequently in my work as a doctoral research student, I have come up with what I take to be a syncretism of acceptable methodologies. Being both highly reflexive and highly descriptive, it is to a degree ‘odd’ in both traditions. Is it legitimate? This can only be answered by exemplification. The thesis is both exemplification and justification of my method. As I write these words I recognise that its legitimacy has yet to be determined.
My next chapter deals with issues that are generally identifiable in both traditions as ‘theoretical’. At the conclusion of that chapter I present an image of the TCM clinical encounter, briefly comparing and contrasting it with the clinical encounter characteristic of Western biomedicine. I present the TCM clinical encounter as characterised by interaction of three equally agential figures: the uneasy patient, the disciplined practitioner, and the materialities of practice. This becomes a central translating figure in my thesis. I present this figure with its three agential modes as one around which a translating knowledge space might develop. This configuration of the clinical encounter can serve both to connect and separate TCM and Western biomedicine. Enabling possibilities for simultaneous connection and separation is vital to the working of a translating knowledge space. My configuration of the TCM clinical encounter allows a contradictory claim that frames my thesis. The clinical encounters of TCM and Western biomedicine are absolutely different while simultaneously being fundamentally the same. Placing contradiction as a framing device is, of course, controversial to say the least. I claim that, done explicitly and reflectively as I am doing it here, this odd framing allows the development of a translating knowledge space.

I elaborate on my configuration of the TCM clinical encounter in the chapters that follow.

My third chapter presents glimpses of a TCM past in Australia and is a beginning in showing what is involved in taking seriously my image of the TCM clinical encounter as a ‘negotiation’ between three equally agential figures. In subsequent chapters I attend to the TCM body, and the agential materialities of herbal medicinal and acupuncture practice.
ENDNOTES

Chapter 1

1 Primary TCM practitioners are those whose main occupation is Traditional Chinese Medicine. There are also practitioners from other health disciplines like Western biomedicine practitioners, nurses, osteopaths, physiotherapists and chiropractors who use one or two modalities of TCM like acupuncture as an adjunct to their practice. They are referred to as non-primary TCM practitioners. There are about 3,000 of them in Australia. (Alan Bensoussan et al., *Towards a Safer Choice The Practice of Traditional Chinese Medicine in Australia*, Sydney, University of Western Sydney, 1996, p. 1.)


4 WHO Information Fact Sheet N134 September 1996.


13 David Turnbull, *On With the Motley: The Contingent Assemblage of Knowledge Spaces*, Department of History and Philosophy of Science, University of Melbourne, PhD, 1996.


16 This student movement was referred to as the ‘First Quarter Storm of 1970,’ which was directed at US imperialism and the former Philippine president Ferdinand Marcos. Jose Lacaba put together an anthology on this historical event (Jose F. Lacaba, *Days of Disquiet, Nights of Rage*, Manila, Anvil Publishing, 1982).

17 The ‘Writ of Habeas Corpus’ is a Latin legal term used in the Philippines and elsewhere: ‘you may have the body’. It is a ‘writ ordering a person to be brought before a court or judges, especially so that the court may ascertain whether his detention is lawful’. [P. Hanks (ed.) *Collins English Dictionary*, Sydney, Collins, 1979, p. 656] This ‘writ’ was suspended by the Marcos government in 1970 as a prelude to the eventual declaration of martial law in the Philippines.

18 The book *Encounter With the Qi* by the American WLM practitioner David Eisenberg gives a good account of the teaching of TCM to foreign (Western) medical students of TCM. It also gives a good account of the condition of the TCM college and its hospital structure.

19 ‘Willy willy’ is a whirlwind or dust storm, from the Yindjibarndi word ‘willi-willi’ or from the WembaWemba word ‘wilang-wilang’. (Bruce Moore (ed.), *The Australian Pocket Oxford Dictionary*, 4th edition, Melbourne, Oxford University Press, 1996, p. 1253.)
Brian Howe expressed support for registration of Chinese medicine practitioners (personal facsimile communication, March 3, 1993)


AAP, ‘Crackdown on Herbal Cures,’ *The Australian*, 4 January 1994, p. 4


R. Tiruia et al. proposed an urgent meeting with Chief Medical Officer (personal communication, 19 August 1984)

Officials of the Department of Health and Community Services included Keith Moyle, who heads the Drug and Poison Therapeutic Goods Unit of the department, David Newgreen, a toxicologist, and a certain ‘Greg’ who took minutes of the meeting. The TCM association representatives were Professor Li Kai Zhu, head of the Australian Chinese TCM University Alumni Association; T. Chiang Lin, chairman of the Chinese Medicine Management Committee, Chinese Medicine Unit, RMIT; Noel Lim, from the Society of Chinese Medicine and Acupuncture; Professor Xun Chuan Ji, from the Federation of Chinese Medicine and Acupuncture Society; and Kai Ping Jin from the Aust-China Group; and Glenys Savage from the Australian Traditional Chinese Medicine Academy.

In my postgraduate research studies in the Department of History and Philosophy of Science at the University of Melbourne, I have looked into the nature of CHPII in the light of the incident of TCM practitioners prescribing herbal preparations laced with pharmaceutical ingredients. The result of this study was written into a paper entitled ‘Chinese Herbal Preparations With Pharmaceutical Ingredients (CHPII) Technological Artefact Under Deconstruction,’ Department of History and Philosophy of Science, University of Melbourne, 1994


ibid. p.2


Review of Traditional Chinese Medicine Discussion, *Paper 1*,


The TCM Review Committee was vested with ‘real powers’ and composed of ‘select’ members; while the Research Review Committee was ‘subordinated’ to the TCM Review Committee and thus composed of ‘neutralized’ members. This pattern of establishing a system of ‘dual’ or multiple committees with ‘diluted’ and undiluted powers in various stages of the TCM registration process was replicated several times.


Doctor Ian McDonald was then a Professorial Associate at the University of Melbourne and Director of the Centre for the Study of Clinical Practice, St. Vincent’s Hospital, Melbourne. He was commissioned by the TCM Project Team to research and write this evaluation.


The Australian medical historian/sociologist Evan Willis in his book *Medical Dominance: The Division of Labor in Australian Health Care* (1989) uses the term ‘medical dominance’ to describe the hegemony of Western laboratory-base medicine over the dispensation of health care in Australia since colonial times.


This study, commissioned by the Victorian Government, looked into the benefits and risk associated with acupuncture and Chinese herbal medicine. It produced a report: *Towards A Safer Choice: The Practice of Traditional Chinese Medicine in Australia* (1996)

A brief introduction to the background of each speaker's was distributed to the audience before the seminar commenced. Carlton's introduction was the longest and most comprehensive. It mentions that her work within the workforce branch included reviews of occupational regulation legislation under National Competition Policy, including reviews of Victorian legislation governing optometrists, chiropractors, osteopaths, physiotherapists, medical practitioners and nurses. Since starting work on the review of Traditional Chinese Medicine Carlton now deals with many of the policy issues that arise in relation to 'complementary therapies'. She has recently completed a report for Community Services and Health Training Australia to assist them in the development of competency based standards for complementary therapies industries. She is currently responsible for implementation of the Victorian Chinese Medicine Registration Act 2000 with a project manager from the Department of Health and Human Services. She spoke about the process and stages through which the Chinese Medicine Registration Act 2000 went, from the survey in 1995 up to the passing of the bill in the Victorian Parliament in May of this year.


The World Book Multimedia Encyclopaedia C.D. (1999) defines placebo as a 'substance that doctors sometimes use as medicine, even though it contains no active ingredients. A placebo brings about an improvement or even a cure in some patients. They are sometimes called "sugar pills". Doctors also may administer placebo injections which usually contain salt water or sterile water. Doctors believe the effectiveness of placebos depends on the patient's belief that the substance is actually medicine. In many cases, this belief provides psychological boost that can improve the patient's condition. A trusting relationship between the patient and physician can increase the placebo's effectiveness. In addition, there is some evidence that endorphins and other neurochemicals play a part in the placebo effect. Endorphins may be the body's natural pain killers'. World Book Multimedia Encyclopaedia, 1999, World Book, Inc., 525 W. Monroe, Chicago, IL 60661


Ibid. p. 71

Ibid. p. 68

M. Toy, 'Menopause Herb Remedy in Doubt,' The Age, 15 July 2001

Ibid.
Chapter 2: Contemporary Traditional Chinese Medicine and Western Biomedicine: Some Issues Associated with Contingent Assemblage of Translating Knowledge Spaces

The notion of a ‘knowledge space’ I use in this thesis comes from the work of David Turnbull, On With the Motley: The Contingent Assemblage of Knowledge Spaces (1996). Turnbull sees knowledge as a ‘heterogeneous assemblage’ of people, places and practices which are site specific and thus inhabits a ‘space’. He contends that this ‘knowledge space’ is sustained by the social labor of creating equivalences and connections. To demonstrate the constitution and workings of a variety of knowledge spaces, Turnbull presented accounts of how cultures and traditions (those of the Australian Aborigines, Anasazi, Inca, the Pacific navigators and the contemporary technoscience knowledge space) ‘format’ their respective knowledge spaces. Turnbull paints the picture of the Chartres cathedral as an ‘experimental knowledge space,’ and traces the long historical process involved in the construction of the world ‘map’ as a cartographic knowledge space.

I suggest that there is a need to construct a new translation space between biomedicine and traditional Chinese medicine here in Australia. It should be one that is founded upon a new understanding of science and its close relation biomedicine as knowledge systems which sit alongside other traditions. Instead of generating hegemonic scientizing theories, this translation space will generate knowledge which sees locatedness as characteristic of scientific knowledge. This is the postmodern age of disbelief in the metanarratives of science, rationality and objectivity, where ‘lived lives, the diverse, the complex...the unique’ are favoured, and more importantly the local, ‘which acknowledges individuality, complexity and subjectivity
of personal experience," making and materializing a space that 'runs across' (trans-) disparate and heterogeneous medical knowing, a space where traditional Chinese medicine and biomedicine can relate in mutuality with each other, is indeed vital. Such a space, where both distinct traditions of health care can trans-relate, 'create convergencies and homologies' as well as 'equivalences,' 'analogues and connectivities, is referred to as a translating knowledge space. The constitution of this space, wherein the 'forms of life' which emerge from clinical microworlds are translated symmetrically, is essential if the resources which have their origins in many places and times are to be put into effective use in dealing with diseases, illnesses, pathologies, disharmonies, clinical patterns, deadly micro-organisms, febrile warm noxious Qi, microbes and so on. To have healthy communities of men, women and children, medical traditions have to learn to talk and listen to each other.

In recent times, a new understanding of science as a knowledge system is indeed emerging. Instead of generating universalizing 'theories' which are applied everywhere, this new scientific outlook sees locatedness as characteristic of scientific knowledge. Sociology of knowledge (SSK) in Great Britain began the move, while the translation theory in France and symbolic interactionist group in North America evolved similar approaches.

The re-conceptualization of science as an assemblage of heterogeneous local practices... allows for the unprivileging of science and serves to undo the great divide between modern science and other knowledge systems. They are at root the same, because all knowledge is local and contingent assemblage. It is this recognition that allows for the possibility of full and equitable comparison between knowledge production systems."
This new outlook, which sees knowledge systems such as science as local in character, puts into sharper focus the epistemological role of theory in knowledge generation. Are they the universal, absolute, and rational representation of the natural world which is the ‘truth’ for all places and all times?

According to Joseph Rouse, scientific knowledge ‘is fundamentally local knowledge embedded in practices that are not fully abstractable into theories and context-free rules for application’.\(^5\)

The view that knowledge systems are local first of all considers practice to be the starting point in knowing things. Our knowledge of things is embedded in our doing, our work and our experiences. Scientific knowledge specifically starts from the practice of science, which includes such activities as creating microworlds, keeping track of phenomena in microworlds, daily laboratory work and familiarity with laboratory equipment.

Secondly, in knowing things we have to establish their context. The doing of things defines the situation or context of how, where and why they are done. According to Susan Leigh Star, ‘scientific theories begin with situations’ and ‘situations are the organization of perspectives and lived experiences’.\(^6\) In the case of science, the laboratory defines the context of how, where and why scientific knowledge is produced.

Thirdly, the local context or situation of doing things unifies the supposed ‘active knower’ and ‘passive nature’ into an inseparable but dynamic whole. Knowing things is not achieved by an ‘active knower’ representing ‘passive nature,’ but involves the forms of life which emerge as we intervene in nature. Scientific work, therefore, is not just observing data about nature, but also involves those forms of life which emerge from nature, and, according to Ian
Hacking, involves the ‘creation of phenomena’.\textsuperscript{7}

Once a particular method of doing things or seeing things has been developed in one locality and used successfully in dealing with local contingencies, it becomes ‘clotted,’ as Star would describe it, and acquires systematization and ‘coherence’. These practices (with certain modifications to suit another locality) are then transferred and used to deal with another set of contingencies in a different locality. This process of successfully modifying a local set of practices to deal with another set of contingencies is called the ‘plasticity’ of a particular knowledge system. This process, according to Rouse, is the ‘adaptation of one local knowledge to create another’.\textsuperscript{8}

The view which sees knowledge as local and embedded in practice, is a critique of the standard representationalist view in science which upholds the universalizing role of theory in knowledge production. It puts theorizing forward as the main activity of value in knowledge production. That is to say, all knowledge is a mere abstraction of the objective world. Rouse, in emphasizing science as a field of practice, said that ‘action has its own kind of understanding which cannot be reduced to theoretical representations’. He stated, furthermore, that theoretical representation ‘is indifferent to local situations’.\textsuperscript{9}

With this representationalist view, according to Rouse, the ‘local world within which we find ourselves amid meaningful things (equipment) and intelligible practices has been decontextualized and replaced by projected theoretical world pictures’.\textsuperscript{10} Consequently, with the back-up of material, rhetorical and social technologies, standard theories of science like ‘objectivity’, ‘truth’, ‘facts’ and ‘reason’ have been used as universal yardsticks to which
every locale in every corner of the world should measure up.

As a result of this new scientific understanding of local knowledge, which critiques the notion of mimetic universality, and was developed by such philosophers of science such as Susan Leigh Star, Bruno Latour, Joseph Rouse, Helen Verran and David Turnbull, the practice of TCM known as bian zheng lun zhi is reconstituted and reconceptualized in the Australian locale.

People may ask how such an ancient practice of medicine, which involves ‘proposing treatment principles in accordance with the pattern of clinical phenomena’ or bian zheng lun zhi, can survive virtually unchanged for almost four millennia and still be relevant to today’s health requirements. The answer lies in the fact that it does change with the local conditions of the patient, who may be Chinese, Australian or Japanese, and who may exist in an ancient or modern sociopolitical context. As a body of local knowledge anchored in practice, bian zheng lun zhi, borrowing from the words of Joseph Rouse, is capable of ‘adaptation’.

Bian zheng lun zhi, therefore, is a system of knowledge which is anchored in local conditions. It is a medical practice which emerged from and became systematized amid the local health contingencies in ancient China, and then extended in time and space to other locales in China, Japan, Asia, Europe, America and Australia. It consists of medical practices that ‘adapt to different local circumstances, to meet the heterogeneity of the local requirements of the system (plasticity) and the capacity...to incorporate many local circumstances and still retain a recognizable identity (coherence),’ as the feminist philosopher Susan Leigh Star puts it. According to Star, plasticity and coherence are the two factors which make a system of
knowledge ‘robust’.

Science which is reconceptualizing and reconstituting itself, like TCM, is also a system of knowledge that is embedded in local practices. It is a system of knowledge which science brings to life in the practice of creating and manipulating artificially contrived phenomena in the laboratory. Doing science within the context of the laboratory includes, according to Rouse, the local configuration of equipment in the laboratory, the instruments and microworlds established by using them, ‘craft knowledge’ in using these instruments and devices and knowing one’s way about the local setting of the laboratory.

It is in the context of the laboratory that entities like the microbe, laser, electrons, organic and inorganic cells and tissues are studied, manipulated and researched. Knowledge of these microworlds, which is generated within the local conditions of the laboratory, is then ‘translated’ to deal with problems affecting the macro world. To be successful in this, the microworld generated within the laboratory has to be manipulated to fit into the macro world, or the macro world has to be transformed to accommodate the requirements of the microworld. Translated into the context of the clinical space, laboratory entities like microbes, lasers, electrons, genes, organic and inorganic cells and tissues become clinical, diagnostic and therapeutic tools in the hands of biomedical health practitioners, who

map the presences and absences of a vast range of things in our unwell bodies. And they have a vast technology to help in this mapping enterprise. This mapping is seen as the first step in working towards putting the machine of the body back into good working order.12

The local practice of biomedicine involves the complex process of arriving at clinical
judgements which incorporate ‘a large clinical experience, knowledge of patients as people, the
collective wisdom of clinical traditions, deep biomedical understanding, epidemiological insight
and ongoing familiarity with the relevant literature’. The practice of this medicine ‘is an art -
an ill-defined combination of experience and judicious use of knowledge’. It is individual
clinical expertise which ‘understands the uniqueness of each patient’. Evidence-based medicine
‘informs but not replace individual clinical expertise’.  

While TCM and Western biomedicine are both unique in their respective ontologies,
epistemologies, history, methodology and notions of evidence, we can see that both are
generated and rooted in located clinical practices. While bian zheng lun zhi constitutes the
TCM knowledge space, the clinical mapping of laboratory microworld constitutes the
biomedical knowledge space. Clinical space is therefore a platform upon which TCM can
translate symmetrically and generatively to biomedicine and vice versa.  

Reconstituting and reconceptualizing science and biomedicine through the de-networking of
the totalizing frames of rationality, objectivity and scientificity, so that they work with TCM
as local bodies of knowledge, we see a spectacle of diverse range of knowledge spaces where
TCM and biomedicine can freely perform in their local colors. Within the TCM knowledge
space, we witness the clinical performance of bian zheng lun zhi bringing into life as
heterogeneous local assemblages of TCM practices such medical objects as changshan , the
diphtheria powder, yao, acupuncture needles, moxa sticks and TCM practitioners. We see
biomedicine situatedly enacting individual clinical expertise, clinical judgements founded upon
a ‘deep biomedical understanding,’ clinical experience, knowledge of patients as people, the
collective wisdom of clinical traditions, epidemiological insight, and on-going familiarity with
relevant literature, and simultaneously bringing into life such medical objects and subjects as biomedical practitioners, injections, pharmaceuticals, clinical tests and immunizations as heterogeneous assemblages of biomedical practices. We see biomedicine ‘repositioning itself as biopsychosocial practice in which health maintenance - rather than disease [and its] elimination - is becoming the locus of health care organization and intervention’. 15

The local performance of disparate practices of technoscience, TCM and biomedicine, and their interactions through a symmetrical translation network, constitute an emergent knowledge space. Through this space the two knowledge systems can be locally compared and contrasted, worked together and translated symmetrically and reciprocally, thereby materializing a translation knowledge space. Emergent practices draw on both traditions in the context of the clinic i.e. places where sensitized medical practitioners of both traditions ‘negotiate’ with patients.

Within this translating knowledge space, clinical objects such as diphtheria powder, changshan, immunizations, acupuncture needles and injections assume life in the heterogeneity of shared clinical spaces. In the asymmetrical translating spaces of the past, changshan and the diphtheria powder were ‘detached’ or decoupled from the TCM knowledge space and from its knowing agents and then recycled as lifeless ‘mirrors of reality’ within the proposed translating knowledge space. Now these heterogeneous medical objects are seen as tools, constituted by two sets of practices and providing the possibility of articulating between them. In this way, changshan and other tools, while assuming life within their respective localized medical practices, at the same time assume another life as ‘sensitizing agents’ that give Western laboratory-based medical practitioners a way to understand TCM practice and
vice versa. Within this translating knowledge space, disembodied ‘isolated alkaloids,’
‘engendered facts’ and DNIC* as universalizing metanarratives are not allowed to
hegemonically rob localized practices of life.

Possibilities for Translating Assemblages

Turnbull talks about an ‘assemblage’. What is an ‘assemblage’? What is its relationship to a
knowledge space? An assemblage is a ‘getting-together’ of different people, places, nature and
the things that they do. They come together, stick with one another and begin to ‘clot
together’. In this sense, they share a space. Within this assemblage, entities keep their
differences - factors which can ‘unclot’ them while at the same time building commonalities
which can enhance that ‘clotting’.

TCM is a ‘getting together’ of practitioners of Chinese medicine, their practice, their patients,
their tools of practice, acupuncture, herbal medicine, Qi, blood, clinical microworld, acu-tracts
and clinical patterns. It is an assemblage of all of these ‘actors’ and actants. TCM practitioners
in Australia, while coming from different technical backgrounds, also share standards of
clinical practice as they intervene to put the uneasy body into the right Yin and Yang balance.
As the TCM assemblage moves in time and space it connects with another assemblage of an
entirely different kind: the biomedical assemblage, which is a ‘getting-together’ of biomedical
practitioners, their laboratory microworlds, health bureaucracies, medical journals and so on. In
Australia, standardized and institutionalized medical training disciplines ‘clot’ the
practitioners together.
I will call translation the interpretation given by fact-builders of their interests and that of the people they enroll (Latour 1987, 109).

It should be clear why I used the word translation. In addition to its linguistic meaning (relating versions in one language to versions in another one) it has also a geometric meaning (moving from one place to another). Translating interests means at once offering new interpretations of these interests and channelling people in different directions (Latour 1987, 116-117).

Within this assemblage humans and non-humans communicate and relate to each other i.e. they translate each other. But different people and things use different linguistic mediums to communicate. Turnbull sees knowledge as ‘contingently assembled’ practices of people from various traditions, times and places. And from these locales, this ‘assemblage’ moves and connects with other locales and people through the medium of social strategies and technical devices. These interconnections or linkages create the ‘space’ where people perform their knowledge. Critiquing the notion of the received view in science, which sees the theories of objectivity, rationality and the scientific method as the benchmark for all non-scientific knowledge traditions, Turnbull puts forth the thesis that all knowledge systems including Western science have a common feature - their local and situated nature. What makes each knowledge system different and unique is the way they establish equivalence and connections through the deployment of certain social strategies and technical devices. Examples of social devices are processes of standardizations, while examples of technical devices are maps, calendars and books. 17 Hence, Turnbull talks of a ‘shared knowledge space’ where disparate knowledge traditions can work together:
So given the lack of universal criteria of rationality the problem of working disparate knowledge systems together is one of creating a shared knowledge space in which equivalences and connections between differing rationalities can be constructed. Communication, understanding, equality and diversity will not be achieved by others adopting western information, knowledge and science and rationality. It will only come from finding ways to work together in joint rationalities and in knowledge spaces constituted through these joint rationalities (Turnbull 1996, 18).

The distinctive features of a knowledge space are its heterogeneity, complexity and diversity. Talking about the heterogeneity of technoscientific culture, Turnbull refers to it as the amalgam of entities like ‘places, bodies, voices, skills, practices, technical devices, theories, social strategies and collective work’. Different scholars from the emerging discipline of Science and Technology Studies (STS) refer to this ‘amalgam’ as ‘episteme’, ‘paradigm’, ‘actor networks’, ‘self-vindicating constellations’, ‘standardized packages’, ‘boundary objects’ and ‘reconfiguration’. Turnbull suggests instead the use of the term ‘assemblage’.

Knowledge spaces have a diversity of components: people, skills, local knowledge and equipment that are linked by social strategies and technical devices or ‘heterogeneous engineering’. From this spatialized perspective universality, objectivity, rationality, efficacy and accumulation cease to be unique and special characteristics of technoscience knowledge, rather these traits are effects of collective work of the knowledge producers in a given space.

Following David Turnbull, I see traditional Chinese medicine in Australia as an assemblage of such things as practitioners, patient bodies, yao, clinical microworld, Qi, acupuncture needles, acupoints, TCM professional associations, registration boards and association newsletters.
Entities (humans and non-humans) within a heterogeneous assemblage constituting a knowledge space all have agency i.e. capacity to act. The first actions of entities in an assemblage is to make connections and interact. These are the ‘operations that link’ \(^{21}\) places, bodies, voices, skills, practices, technical devices, theories, social strategies and collective work. Subsequently, they ‘describe and organize a whole world filled with entities (actants) whose identities and interactions are thereby defined’. \(^{22}\) These operations and actions are what is referred to in STS and Actor Network Theory (ANT) as the sociology of translation. Bruno Latour, in his seminal work *Science in Action*, sees the notion of ‘translation’ in three layers i.e. linguistic, geometric and in terms of the notion of *interessment*. Linguistic translation, according to Latour, is relating versions of one language to versions in another. Geometric translation is ‘moving from one place to another,’ while *interessment* refers to translating interests, which means ‘at once offering new interpretations of these interests and channelling people in different directions’. Furthermore:

In the geometric sense of translation it means that whatever you do, and wherever you go, you have to pass through the contenders’ position and to help them further their interests. In the linguistic sense of the word translation, it means that one version translates every other, acquiring a sort of hegemony: Whatever you want, you want this as well. \(^{23}\)

John Law refers to these operations as ‘heterogeneous engineering’. \(^{24}\) Entities within a assemblage translate each other. i.e. they interact, interpret, ‘displace,’ and sometimes ‘betray’ each other. Entities within an assemblage are rendered or translated ‘unequally,’ ‘asymmetrically’ or sometimes ‘displaced,’ and sometimes the other way around, depending upon how action or interactions (i.e. power relations) are mutually projected and structured
between them. The word ‘translation’ stands for ‘action’. However, Michel Callon takes the view that translation ‘extends the traditional definition of action’. He sees the process of translation as ‘definitions inscribed in intermediaries’. He also refers to ‘intermediaries’ as ‘mediums’. These intermediaries or mediums may be material entities such as round table discussions, public declarations, texts, technical objects, embodied skills or currencies. Callon sees the translation process as acted out by a ‘translator’, the ‘translated item’ and the ‘medium’ upon which the translation is inscribed.

Discussing the interactions and translations of entities in an assemblage in a knowledge space, Watson-Verran and Turnbull make the following claim:

Assemblages constitute connections and contrive equivalences between locales in knowledge systems. In research fields and bodies of technoscientific knowledge/practice, otherwise disparate elements are rendered equivalent, general and cohesive through processes that have been called “heterogeneous engineering” (see Law 1987a). Assemblages are also power practices. Understanding them in this way picks up on the notion of power as strategic and involved in meaning making. Here the relations of power and knowledge are understood as invested in material, social and literary practices of discourse and representation, discipline and resistance.

I therefore see assemblages as the ‘medium’ or intermediary through which ‘places, bodies, voices, skills, practices, technical devices, theories, social strategies and collective work’ translate each other. Through this medium, translators, actors and actants ‘define’ each other. If the mutual definition is satisfactory to each actants in an assemblage, then it can be considered a successful translation. Otherwise it is a failure. As Callon states:
A successful process of translation thus generates a shared space, equivalence and commensurability. It aligns. But an unsuccessful translation means that the players are no longer able to communicate. Through a process of misalignment they reconfigure themselves in separate spaces with no common measure. Translations thus both flow through and are held in place by intermediaries.  

*An assemblage is a translation medium.*

**Asymmetrical Translation: Scientising TCM Objects**

While TCM is now finding its own knowledge space in a changing world, for more than two centuries it has suffered the fate of being displaced by the hegemony of science. With this type of ‘displacement’ the TCM knowledge space is recomposed or translated as the mirror image of science.

Linguistic translation is the rendering of a version of the guest language into the host language, in the way that the Chinese word 疾 ‘yi’ (Chinese guest language) ‘translates’ into English as ‘medicine’. To translate the Chinese word 疾 ‘yi’ into the English word ‘medicine’ the translator must be conversant with both languages and thus understand the local practical context which gives life to their respective meanings. On the other hand, in hegemonic scientific translation, science, the ‘host language,’ renders all other knowledge systems including TCM, the ‘guest language,’ into the metanarratives and universal frames of objectivity, rationality, ‘facts’ and DNIC. That is, paraphrasing Latour’s definition of a geometric sense of translation, ‘at once offering one universal interpretation of all the interests of all knowledge systems including TCM, and channelling them in one universal direction’.
Local practices like *changshan*, which assume life in a TCM knowledge space, are ‘translated’ into such lifeless frames as ‘isolated alkaloid’ or ‘chemically harmful’.

Scientific translation of TCM places the therapeutic resources assembled through thousands of years of practice at the doorstep of science. Herbal medicines, acupuncture and so on all become sources of novelty and innovation for science. The move follows the conventional line which accepts the domination by science of all other knowledge traditions. It is effectively a silencing of TCM, and feeds the hegemonic tendencies of science. With this policy of scientising TCM, biomedical entities are taken as unproblematic ‘real’ entities, and TCM therapies are standardized with respect to these entities. TCM is translated into therapies in the biomedical sense. This leads to a domination of TCM whereby the standards of biomedicine determine the terms of the translation. It could lead to the extinction of TCM as an expanding body of practice and knowledge.

In China, when laboratory experimental technique was first introduced into TCM research in 1959, the program of scientific translation began. In 1960, with the use of the Western pharmaceutical drug cortisone, Chinese researchers developed a laboratory animal model replicating the TCM clinical pattern of *Yang deficiency* *Yang Xu* 阳虚. The efficacy of a traditional herbal formula traditionally used to address a specific and localized clinical pattern was supposedly successfully ‘trialed’ using this animal model. *2*

Eventually, the so-called school of ‘integrated Chinese and Western medicines’ *zhong Xi Yi jie he* emerged. The standardized universal scientific yardstick generated in the laboratory became the criterion by which TCM was to be measured accepted and ‘translated’ as ‘scientific’.
Without due regard for the different contextual requirement of TCM as a distinct knowledge space with a long ancient history, a whole set of research projects were undertaken to make the parameters of TCM more 'scientifically objective'. These research projects included the 'objectification' of specific TCM practices and concepts such as the Four Examination Techniques si zhen, the TCM Conceptual Template like the Eight Principal Patterns ba gang bian zheng, and other TCM methods and modalities. The rationale for the program to make TCM scientifically objective is attributed to the supposed low level of 'science' when these practices emerged and developed during ancient times and the perceived problem of the inclusion of 'subjective and perceptive' elements in TCM practice. Explaining the background of the program of 'objectification' of TCM, Professor Chen Wei Yang commented:

In the course of its protracted development, TCM like all other sciences also paid great attention to fixing values and standards of quantity, quality and localization. For example, the use of the standards of length, capacity and volume and weigh du liang heng in writing and prescribing herbal medicines; the use of "the fingers as unit of body measurement" tong shen cun in locating acupuncture points and acupuncture channels; the use of correlations between respiration and pulse rate to fix a rapid or slow pulse etc. were all used as standards for categorizing different clinical patterns... These standards played an enhancing role in the academic development of TCM. However, due to the restrictions imposed by the level of science of those times, these standards factored in elements of subjectivity zhu guan and perception zhi guan. They (the ancient standards) were cast on a very wide scale which made them less accurate objectively and quantitatively. These made it difficult to do accurate standardizations which in turn affected the further heightening of the development of TCM. The use of modern scientific methods (including biomedical methods) to conduct research on TCM concepts like the Four Examination Techniques, Eight Principal Patterns Patterns of Internal Organ System, Patterns of the Acupuncture Channels, Qi and blood, therapeutic principle Chinese herbal medicine, herbal formulae etc., involves the use of an objective,
quantitative, qualitative and localized observation index. It involves the use of concrete quantity, image etc. to describe and record phenomena which will then cast TCM in a more definitive and clearer form.  

Hence in China today, in order to make TCM ‘scientific’ and thus bring about advances in TCM research, researchers are reaching for ‘elevating’ concepts from the ‘most advanced scientific theory’. TCM concepts like the Yin and Yang, Five Elements, or Five Phases, the Qi are to be ‘lifted’ to the higher level with ‘Kuhnian normal science,’ ‘systems theory,’ cybernetics, biochemistry, physiology, pathology and so on. Donning the scientific garb of ‘systems theory,’ TCM’s Yin and Yang can then circulate through the Kuhnian cyclical paradigm of clinical practice - discovering the problem, hypothesis - experimentation - and finally higher theory formation. The laboratory is displacing the clinic as the site from which TCM practices can be assessed and evaluated.

Here in the West we also have a fair number of people who share similar conventional views on science and TCM. A scholar of Oriental studies, Paul Unschuld, in his book *Medicine in China*, saw the ‘theory’ of TCM, such as Yin and Yang and the Five Elements (Unschuld refers to the Five Elements as Five Phases) as the instantiation of the universalizing paradigm of cause and effect between corresponding phenomena.

In the history of medicine in China, two basic paradigms appear to have provided the entirety of all therapy systems documented with durable core. These two paradigms, known in other cultures as well are (1) the paradigm of cause-and-effect relations between corresponding phenomena, and (2) the paradigm of cause-and-effect relations between non-corresponding phenomena.
Following this international fashion of making TCM more 'scientifically acceptable,' local biomedical researchers here in Australia, who are equally convinced of the universalizing translating capacity of science, had a look at acupuncture - a core TCM modality. In 1986 a group of biomedical researchers commissioned by the National Health and Medical Research Council (NHMRC), the national medical research institution in Australia, published a report on acupuncture which included a 'scientific explanation' of the analgesic effects of this ancient therapy. Disregarding the context and content upon which the practice of acupuncture assumes life, the NHMRC acupuncture researchers 'elevated' the practice of acupuncture analgesia from its 'lowbrow' and (to borrow from the words of Kuhn) 'pre-scientific' level of acupuncture channels and Qi to the 'higher' scientific theoretical level of DNIC (Diffuse Noxious Inhibitory Controls).

This theory of DNIC is the product of an animal experiment involving anaesthetised rats which demonstrated that certain neurones in the spine can be inhibited by strong noxious stimuli applied to any part of the body distant from the excitatory receptive field. It was referred to as diffuse noxious inhibitory controls 'to distinguish from the stimulus from the less intense non-noxious stimuli'.

The authors of the NHMRC report on acupuncture used this universalizing theory on pain and nociception to 'displace' and 'translate' the local and specific nature of this ancient TCM therapeutic modality. The report admonished would-be acupuncture researchers to abandon such 'mystical explanations' such as the Qi 氣 (which the report refers to as 'Chi ') and acupuncture channels.
These ways of understanding TCM have put an undue premium upon the universalizing role of scientific theory, using such criteria as such as rationality, objectivity and scientificity, with other knowledge systems such as TCM being seen as inadequate in terms of these theoretical standards. They have taken Western ‘rationality and scientificity as the benchmark by which other cultures and knowledge systems should be evaluated’. Any such unilateral ‘scientific’ translation of TCM ends up fragmenting the practical logic of TCM. Laboratory research in the biomedical sciences is quite remote from the world of clinics and decisions of practising clinicians of any kind. The central issue becomes biological and empirical. Laboratories rather than clinical consulting rooms become the only legitimate space of TCM knowledge-making.

Practising Traditional Chinese Medicine—Local Knowing

One of the dire consequences of the grand move to scientize TCM is the fragmentation of its practice. As a result of years of ‘hegemonic translation’ by the universalizing theories of science, the practice of TCM has been reduced to an animal model, CT scan image, DNIC or X-ray picture. Hence the need to pick up the fragments of TCM practice from various scientising locales of the past and present, and reconstitute them within a new framework of understanding i.e. one of practice. As the science philosopher Joseph Rouse would say, we have to present TCM as a ‘field of practical activity’ i.e. a field of practice.

Traditional Chinese medicine (TCM) is a body of medical knowledge that developed and became systematized over a period of four millennia. Its practices represent a coherent body
of knowledge, including a standardized method of recognizing disease phenomena and a variety of standard therapeutic methods: herbal and food therapy, acupuncture and tuina (massage), as well as a range of disease preventative methods like Qigong, Tai Ji Quan and Yang Sheng or ‘nurturing life’.

TCM practice is also embedded in the Chinese characters which refer to it zhong 中 and yì 養. Zhong translates as ‘centre,’ halfway between two extremes or ‘the mean’. Yi can be used to mean medicine, to cure, or a doctor. More clues come from the three components of the ideographic script yì. The upper left portion of the script is made up of an arrowhead in a quiver 医, and the right hand portion represents the right hand about to engage. Together they mean targeting the arrow against the evil influences that cause imbalance and deviation. The lower portion 虚 represents an ancient vase used for storing fermented liquor, a medicinal decoction or an elixir.

Zhong Yi 中醫 refers to a systematic knowledge which puts a premium on balance, harmony and moderation, accurately interrogates patterns of signs and uses herbal decoctions to specifically target a pattern of illness, understood as a phenomenon of disharmony or imbalance. Practising traditional Chinese medicine can be summed up in four Chinese words: bian zheng lun zhi. This can be translated as proposing treatment principles in accordance with the differentiation of patterns of clinical phenomena. Bian 辨 to differentiate; zheng 證 evidence of or pattern of clinical phenomena; lun 论 in accordance with; zhi 治 treatment.

From this translation we infer that the practice of traditional Chinese medicine involves two aspects or stages. One is the investigative and cognitive activity of differentiating patterns of
clinical phenomena which in the Chinese language are referred to as *bian zheng*, the diagnostic phase. The second phase is the practical activity of tailoring and administering the appropriate treatment and method for the patient: *lun zhi*. The treatment administered *lun zhi* is contingent upon the presenting pattern of clinical phenomena *zheng*. I suggest that it is useful to understand these phases as linked through a set of standardized *clinical patterns*. On the basis of this process of clinical ‘pattern identification’ which is the ‘irreducible basis of treatment,’ TCM therapeutic techniques like acupuncture 針灸, herbal medicine 中藥, *tuina* 推拿 (traditional Chinese massage), traumatology 骨傷科, food therapy 食療, cupping 拔火罐, moxibustion 灸療學, ‘nurturing life’ 養生 and so on are administered to the contingent patient.

*The central paradigm in the practice of traditional Chinese medicine is NOT that of cause and effect. Rather it is the sense of expression as it is often used in speaking of the practice of art in Western discourses. Symptoms of an uneasy body that emerge in consultation with a practitioner of TCM are much like a symphony that emerges in a concert, an expression of a shared culture. Or perhaps the analogy of a jazz performance with its inherent element of disciplined improvisation is better. To say that TCM practice is not mobilising the paradigm of cause and effect does not however imply a lack of rigour and precision.*

*Qi* 氣 *In Action and Transformation*

In my Master’s thesis I pointed out that Yin and Yang 陰—陽, Five Elements 五行 and the concept of *Qi* 氣 carry complex, plural and openly metaphoric allusions. They resist
translation into Western scientific concepts, although in the past many have attempted to present them as scientific theories. Past scientific understandings of knowledge deny them a place in reasoning precisely because of their metaphoric content.

I consider Yin and Yang, the Five elements and Qi as ontological entities which are things in themselves. I prefer to term them as ‘imaginaries’ or ‘originaries’. They are imaginaries implicit in traditional Chinese medicine. They constitute the framework of TCM practice. Yin and Yang, five Elements and Qi as complex metaphors evoke notions of balance and various interrelated ways of conceiving balance. Hence they open up manifold possibilities for intervention: different ways in which imbalance might be redressed and altered. Through these entities, we come to understand the ‘universal nature of being and the meaning of reality’ of that which transcends all things’. 41

气 'Qi in its earlier uses referred to ‘floating clouds,’ the breath and the atmosphere between heaven and earth. The Chinese character is written with one set of strokes signifying flowing current, and another representing a ‘seed’ or ‘grain,’ signifying minuteness. 42 Origin stories have it that the universe emerged from cosmological confusion as the light, bright Yang Qi ascended to become Heaven, and the thick heavy Yin Qi descended to become Earth. During the period called the Warring States in China (475-221 BC) it became accepted that all visible things in the universe originated from an invisible Qi. Later, in the Eastern Han Dynasty, Qi came to be understood as the most basic substance which constitute the cosmos, and that things are the products of its multitudes of transformations or ‘evolutionary operations’ (hua).
In the beginning nothing existed. In Chinese this is called Wu Ji (meaning absolute nothingness). Wu Ji is synonymous with the Buddhist word sunyata, meaning emptiness, the void, pure openness, no boundary. Wu Ji is also sometimes referred to as the mystery, the nameless, the great mother, the source. The first principle to manifest out of Wu Ji is primordial energy. The Chinese call this energy Qi.

The idea of Qi, which is sometimes translated as Chi or Chhi, primary ether, material force or Ki as the origin of the universe, was expressed in the chapter ‘Disquisition on Astrology’ tian wen xun in the ancient classic Huai Nan Zi, which was written in 120 BC. It states:

In the beginning, nothing had physical shape, and the first spontaneous formations were the continua of space and time (yu zhou 宇宙). Out of these were produced the original chi. This Chi was heavy and stable, but its lighter part rose and became the sky. The heavy and turbid part gathered and became earth. The gathering of the heavy substance took time, and hence the sky was formed earlier. Then the chi of sky and earth met and became yin and yang. The active chi of the yin and yang became the four seasons, and as this chi of the seasons scattered it formed the various phenomenal things of the earth. The hot chi of yang gathered and became Fire. Next, the essence of the chi of Fire became the sun. The cold chi of yin gathered and became Water. The essence of the chi of Water became the moon. The encounter of the chi of the sun and the moon gave rise to the stars.

Tao is like ‘movement’ (hsing 行). The evolutionary operations (hwa) of the Ether (Qi) produce and reproduce without pause. That is why this process is called the Tao.
A.C. Graham, a world authority on classical Chinese thought, language, grammar and textual criticism, refuses to translate the Chinese character 氣 into the alphabetic language and rather refers to it as the 'activating fluids in the atmosphere and the body' which he calls in English as the 'universal fluid'. In his interpretation of the chapter on 'Inward Training' of the ancient Chinese cosmological literature, the Guanzi 管子, A.C. Graham refers to the cosmology of the 'universal fluid' as

active as Yang and passive as Yin, out of which all things condense and
into which they dissolve. But in its older sense, which remains the primary one,
it is like such words in other cultures as Greek pneuma, 'wind, air, breathe'.
It is the energetic fluid which vitalizes the body, in particular the breath,
and which circulates outside us as air. At its purest and most vital
it is the ching 精, the 'quintessential.'

Qi acts. Qi translates. Qi defines. Qi flows. Qi gets stuck. Qi gets unstuck. When Qi 'clots'
ju there is life. When Qi disperses san, there is death and a new form of life. Qi assumes a
Yin and Yang life, a motion dichotomizing into 'clotting' and dispersion, descending and
ascending, floating and sinking, expansion and contraction, moving in and moving out, heating
and cooling, appearing and disappearing, strengthening and weakening, softening and
hardening, advancing and retreating, stretching and relaxing, stilling and moving, being heavy
and light, being coarse, turbid and impure and being clear, refined, light and pure. It is
harmonizing and disharmonizing, coming into balance and getting out of balance, and finally a
new form of life. These are the Yin and Yang expressions of the Qi.
From the 'Natureworlds' ('Tian di Heaven-Earth) Five Locales (north, south, east, west and center) ensue the movements of the Five Elements (wood, fire, earth, metal, water) and their Five Transformations and Changes i.e. birth sheng (or breeding and growth), growth zhong, transformation hua, harvest shou and storing zang), which in turn generate the Five Seasons (spring, summer, long summer, autumn and winter) and the Five Qi's (cold, heat, dryness, damp and wind). The humanworld and natureworld are of one Qi. The humanworld 'arouses' gan 感 and 'responds' ying 应 to the Five Qi (from Heaven), which in turn generate the Five Hollow Organ systems of the Gall Bladder, Stomach, Large Intestines, Small Intestines, Urinary Bladder, and Triple Energizer. They are all of the Yang categories. Simultaneously, the humanworld 'arouses' and 'responds' to the movements of the Five Elements (on Earth) to generate the Five Visceral Organ Systems of the heart, liver, spleen lungs, kidneys and Pericardium. The Six Hollow Organ System and the Six Visceral organ systems in turn generate the twelve acu-tracts.

Heaven generates the Five Qi while Earth generates the Five Elements.

Humankind takes its root ben and 'breed and grow' sheng from the midst of Heaven and Earth. Hence, s/he has the Five Visceral organs Wu Zang. Zang (visceral organs) mean zang (hidden). They store zang the Essence-Qi jing Qi of Heaven and Earth, which generates the form we call humans. Hence, to understand the Yin and Yang of humanity, one must first understand the Qi transformation of the Five Visceral organs Wu zang.

In the chapter entitled 'On the Birth of Humankind as Endowment from the Qi Transformation Qi hua of Heaven and Earth,' the Neijing says:
'Heaven feeds humanity with the Five Qi.
Earth feeds humanity with the Five Flavours.'

This refers to the beginning of life for humankind. Nothing can be what it is today without the Qi transformation of Heaven and Earth. The East generates the Wind and manages the Wind transformations. Its Qi is sāo. Earth responds yìng to this and within the Five Elements Wood is generated. Wood in turn generates the Sour flavour. The Sour flavour enters the Liver which in the process generates the Liver.

The South generates Heat. It manages the process of Heat transformations. Its Qi is jiāo. Earth responds to this with the the Five Elements generating Fire huo. Fire generates the bitter ku flavour. This flavour enters the Heart and generates the Heart.

The center generates humidity shì. It manages the process of humidity transformation. Its Qi is fragrance xiāng. Earth dì responds to it by generating the soil tu. The soil generates Sweet flavour which enters the Spleen and in turn generates the latter.

The West generates Dryness zào and manages the transformations of Dryness. Its Qi is xìng. Earth responds to it with the Five Elements generating Metal. Metal generates the pungent flavour xīn, which enters the Lungs and in turn generates the Lungs.
The North generates Coldness *han* and manages the
cold transformations. Its Qi is a decomposition *fu*.
The Earth responds to it with the five Elements gen-
erating Water. Water generates the salty flavour *xian*.
The salty flavour enters the kidneys and in the process
generates the kidneys.

Heaven is made from the formless Five Qi which trans-
forms and generates *hua sheng*, the Five Elements
which have form. The Five Elements with form trans-
form and generate the Five Flavors which have ‘corporeal body’
*you zhi*. This is why it is said that Heaven and Earth
‘breeds’ and ‘grows’ *sheng* humankind.

The Qi transformations (evolutionary operations of the Qi)
of heaven/Earth and Humankind are in very close
harmony *xi xi xiang tong*. Within the mother’s womb,
the mother feeds on the Qi. This nurtures the form *xing*.
The mother feeds on the flavors *wei*. This nurtures the
jing essence. Nourishing with Qi and Flavour is the root
*ben*. What the mother eats, the foetus also eats.

With this, the image *xiang* becomes the form *xing*.  

The acu-tracts *jing mai* are the pathways *lu jing* of

of the Qi transformation originating *from* the Visceral and hollow organs.  

经脉者，脏腑气化之路径也

Qi from the acu-tracts originates in (roots) and grows out of the Visceral and Hollow Organs
and then liaises with all of the body’s extremities, joints and nodes zhi jie from without. The spleen, kidney, liver, gall bladder, stomach and urinary bladder acu-tracts ‘walk’ along both legs. They are the Six acu-tracts of the legs. The lung, heart, pericardium, triple energizer, large intestines and small intestines acu-tracts ‘walk’ along both arms. They are the arms’ Six acu-tracts.

Both arms and legs have three yin and three yang acu-tracts. The spleen and the lung acu-tracts are the Great Yin acu-tracts. The heart and the kidney acu-tracts are the Small Yin acu-tracts. The Liver and the pericardium are the terminal Yin acu-tracts. The gall bladder and the Triple energizer are the Smaller Yang acu-tracts. The stomach and the Large intestines are the Bright yang acu-tracts. While the Urinary bladder and the small intestines are the Great Yang acu-tracts. These are twelve acu-tracts and the Six Qi interconnect them all tong zhi. There is one Qi for two acu-tracts, hence the name Six acu-tracts.

The Great Yang acu-tracts and the Small Yin acu-tracts are connected externally and internally biao li. The Great Yang occupies the exterior, which is where the skin and body hair pi mao are. Following the Great Yang are the Bright Yang acu-tracts, which are then followed by the Small Yang, the Great Yin, the Small Yin and finally the terminal Yin, which is close to the bone jin yu gu. All the Yang acu-tracts connect shu with the hollow organs and link luo with the Visceral organs. On the other hand, the Yin acu-tracts connect shu with the visceral organs and link luo with the hollow organs. The Yang acu-tracts of the legs ‘walk’ along the outer side, while the Yin acu-tract ‘walk’ along the inner side. The Yang acu-tracts of the arm ‘walk’ along the outer side, while the Yin acu-tracts ‘walk’ along the inner side. As for the ordering of the Yang acu-tracts along the extremities, the Bright Yang acu-tracts are at the
frontal aspect, the Lesser Yang acu-tract occupy the middle, while the Greater Yang acu-tract are at the posterior aspect. With regard to the Yin acu-tracts, the Great Yin acu-tract is at the frontal aspect, the Terminal Yin acu-tract in the middle, and the Lesser Yin acu-tract at the posterior aspect. The Yin acu-tracts of the arm ‘walk’ zuo from the chest towards the arm and hand, while the Yang acu-tracts ‘walk’ from the hand and arms towards the head. The Yang acu-tracts of the leg ‘walk’ from the head towards the legs, and the Yin acu-tracts ‘walk’ from the leg to the chest. All the three Yang acu-tracts of the arm walks towards the head. All the three Yang acu-tracts of the leg walk towards the legs. All these acu-tracts walk along the neck jing xiang and converge upon the acupoint Big Vertebrae (GV 14 Da Zhui ④) of the Governor Acu-tract. ⑤ All the acu-tracts along the arm and the leg walk in separate routes, thereby forming a circulatory network huan zhou.

The ears, eyes, mouth, nose, arms, legs, Five visceral organs (wu zang), Six hollow organs (liu fú), tendons and bones, blood, flesh and body, are all there and all provided for. This is the human corporeal body. ...[B]reathing fills the entire (body) making it luxuriant and moistened, moving it to the Five sense organs and hundred bones, making them pure and efficacious. This is the human Qi. ⑥

‘Arousing’ gan and ‘responding’ ying to the world around it, the Qi’s presence is ‘felt’. The TCM practitioner who has been trained to ‘feel’ its presence can detect its movement in his own body as well as in other bodies. S/he embodies the Qi. In the body and hands of the TCM practitioner the Qi therefore assumes life as a balancing tool. ‘Sensing’ its presence in his body and its ‘projection’ into his/her medical tools i.e. acupuncture needle and Yao, the practitioner helps other bodies to feel and be aware of their Qi’s presence and thus assists them in putting their disharmonious Qi into balance. Hence an active network of Qi in motion
is created between the body of the patient, the TCM practitioner and the yao.

In his book *A Copy of a Poem on the Plum Blossom Golden Needle*, the late Qing Dynasty TCM practitioner Zhou Mei Sheng (1862-1915) has this to say about the Qi.

Qi is the the root of the twelve acu-tracts. It is the fountainhead of life. After inserting the acupuncture needle, one must meticulously observe whether the Qi has come under the tip of the needle. When the Qi has come after inserting the needle one can tonify or reduce to eliminate the illness. 71

Gottfried Wilhelm Leibniz (1646-1716), the German philosopher and mathematician, on the basis of information he obtained through correspondence with European missionaries living and working in China, commented on the subtlety of the Qi, which he referred to as ‘Ki’. He made a translation in symmetry between the Qi as ‘ether’ and ‘matter in its original form’. He thus afforded a place in reasoning almost three centuries ago for the ancient Chinese imaginary of the Qi. Leibniz said:

It seems that this Ki, or this primitive air, truly corresponds to matter,
just as it corresponds to the instrument of the first principle, which moves matter; just as the artisan moves his instrument, producing things. This Ki is called air, and for us could be called AETHER because matter in its original form is completely fluid, without bonds or solidarity, without any interstices and without limits which could distinguish parts of it one from the other. In sum, this matter (Ki) is the most subtle one can imagine. 72

Qi is the energy that underlies everything in the universe. When it is condensed, it is matter, when it is refined it becomes spirit. It is created within our bodies from
a combination of the food we take in and the air we breathe. It has been referred to as
"the life force". The goal of the practitioner is to balance Qi within the body. If Qi
becomes deficient or blocked, this will result in a decrease in energy, lack of
resistance to disease, and illness.”

I have spent some time elaborating on Qi here because it is important to understand this
ontological element of TCM. To have a profound understanding of it, we need to recognise
that Qi is an ontological entity that is ‘done’ or ‘performed’ in TCM practice. In TCM
clinical encounters Qi is performed as differentiating clinical patterns and associating yao.

Differentiating Clinical Patterns

What are patterns of clinical phenomena or ‘clinical patterns’ in traditional Chinese medicine?
How do they fit with diagnosis? In beginning to answer these questions I point out that they
should not be confused with Western laboratory-based medicine’s practice of recognizing
disease syndromes. There are profound differences in the disparate metaphoric commitments
of the two traditions of practice.

A practitioner of traditional Chinese medicine understands that a person who is healthy
manifests signs or phenomena of health, balance and harmony. Such a person has a healthy
pulse which is five beats per breath, with all the corresponding regions of the pulse being of an
appropriate rate, rhythm strength, shape, size, quality: a specific pulse pattern. The tongue is
pinkish in color with a thin white coat and slightly rough texture. A healthy person most
importantly is free from discomfort and pain, has a vigorous spirit, robust physical build and
leads a balanced life. This includes a good appetite, regular sleeping and sex patterns, and a
reasonable amount of exercise. However, when one gets sick, signs and symptoms come about
which are at variance with the above pattern or phenomena of health and balance. The pattern of disease, that is clinical patterns or zheng hou, emerges.

To establish the clinical pattern of an illness, the practitioner goes through a knowing, investigative, interrogative or diagnostic stage. This first phase involves the use of the Four Examination Techniques Si Zhen of looking, listening and smelling, inquiring and palpating of particular external body spaces, in order to collect data from the presenting signs and symptoms of a particular patient. These techniques of inquiry are standardized practices which can be used with great precision by trained practitioners. Learning these techniques takes years of careful accumulation of knowledge through practical instruction. The Four Examination Techniques is a particular set of diagnostic protocols which cannot be learned from theory. Students can only achieve this learning through prolonged practical clinical exposure to the work of seeing and recognizing.

**Conceptual Templates**

The subsequent phase draws upon what I refer to as Conceptual Templates, used to assemble and construct the presenting clinical pattern. These templates - standardized and standardizing tools - can be conceived of as lying between the practical (messy) work of diagnosis and the practical (messy) work of therapy. I have taken this notion of templates from David Turnbull who developed the idea of templates as models or patterns used to shape stones which were assembled to construct Gothic cathedrals in medieval times in Europe. Through the medium of templates it was possible to organize large numbers of people to build these cathedrals. David Turnbull refers to templates as ‘exemplars’ which are ‘accepted, concrete, local, indexical solutions’. From this context I have extended David Turnbull’s notion of templates to that of
Conceptual Templates, which are exemplars used to assemble complicated signs and symptoms of diseases into clinical patterns.

The most commonly used conceptual templates in TCM are the Eight Principal Patterns ba gang bian zheng, The Patterns of the Six Divisions liu jing bian zheng, Patterns of the Five Visceral and Six Hollow Organ Systems wu zang liu fu bian zheng, Patterns of Four Stages wei Qi ying xue bian zheng, Patterns of Acupuncture Channel Disharmony jing luo bian zheng and Patterns of Aetiology bing yin bian zheng. The use of one or a combination of these conceptual templates in ordering and structuring data gathered from the Four Examination Techniques will establish the site of the illness bing wei, the stage of its development bing shi, etiology bing yin, and pathomechanism bing ji.

The Eight Principal Patterns Ba Gang 八纲

With the conceptual template of the Eight Principal Patterns, clinical signs and symptoms (clinical data) assembled through the Four Examination Techniques are sorted, categorized and classified into the related but dual contradictory patterns of either/or a combination of external biao, internal li, cold han, hot re, deficient xu, excess shi, yin yin, yang yang. Internal or external patterns indicate the general site of the illness as well as the progression of the illness. Hot or cold patterns indicate the nature of the illness, and may also form the basis of the choice of herb, acupuncture point and needling technique or massage technique. Deficient or excess patterns indicate the balance of power between the Pathogenic Qi Xie Qi (disease causing factors) and the Anti-Pathogenic Qi Zheng Qi (the body’s capacity to resist these disease causing factors). The yin and yang patterns categorize signs and symptoms into
broader and wider encompassing entities of the Yin and Yang. Generally speaking, exterior, excess, and hot patterns are classified as Yang patterns, while interior, cold and deficient patterns are seen as Yin patterns.

a. External Patterns  *Biao Zheng* 表證

External patterns are signs and symptoms pointing to an illness which is on the exterior of the body, with the development of the illness still slight and superficially situated. Its assembled signs and symptoms are the following:

*Aversion to cold with fever, headache and pain in other parts of the body, blocked nostrils and/or running nose, a thin white tongue coating and a superficial pulse.*

b. Internal Pattern  *Li Zheng* 裏證

Interior patterns are signs and symptoms which appear when exterior patterns have not been dealt with properly and the illness progresses from the exterior of the body into the interior (interior organ systems). The illness has progressed deeply and internally, hence the name. The clinical configuration of this clinical pattern varies depending upon which internal organ system is affected.

c. Cold Patterns  *Han Zheng* 寒證

This clinical pattern may be the result of a pathogenic cold factor invasion or attenuation or weakening of the body's capacity to resist disease factors. The signs and symptoms are:
Pale facial colour; aversion to cold alleviated by warmth or heat; 
a tendency to always lie on the bed and not want to move around; 
cold extremities; absence of taste in the mouth; not thirsty; loose bowel 
motion; tongue with white moist coating; a deep and slow pulse.

d. Hot Patterns  Re Zheng 热证

This clinical pattern arises from either an invasion from hot-type of pathogenic 
factor or hyperactivity of body functions. The signs and symptoms are:

Flushed face and redness of the eyes; fever or feeling of heat 
alleviated by cold drinks or exposure to cold temperature; 
hot sensations along the extremities; thirst alleviated by cold 
drinks; dark yellow urine colour released in short spurts; 
red dry tongue with yellow coat; a strong rapid and wide pulse.

e. Deficient Pattern  Xu Zheng 虚证

Deficient pattern arises from the weakening of the overall body resistance 
(Anti-Pathogenic Qi) vis-à-vis disease-causing factors (Pathogenic Qi). The signs and 
symptoms are:

Shortness of breathe; lack of spirit and vigour; physical debility and 
tiredness; spontaneous sweating or night sweats; uncontrolled 
urination; loose bowel motion; pale tongue; weak and thin pulse.
f. Excess Pattern  

*Shi Zheng* 實證

This clinical pattern arises from a condition of dominance of the Pathogenic Qi (disease causing factor) over the Anti-pathogenic Qi (overall body resistance). The signs and symptoms are:

*Coarse and rough breathing; irritability; feeling of distention in the chest; pain with aversion to palpation or touch; feeling of blocked urination; dry stool or constipation; red tongue with thick dry coat; strong pulse.*

g. Yang Pattern  

*Yang Zheng* 陽證

Yang Pattern is a broad and wide encompassing categorization which can include under its heading exterior, hot, and excess patterns. The clinical configuration shows hyperactivity of body functions, strong body resistance to pathogenic Qi, etc. Disease manifestations are of the hot type and are characterized by active and sensitive body responses.

h. Yin Pattern  

*Yin Zheng* 陰證

Yin patterns are the opposite of Yang Patterns. The clinical configuration shows weakening of body functions, deficient body resistance to disease-causing agents, a feeling of coldness, inhibited and descending and weakened body response, and an interior disease-causing factor.
Restoring Balance

Embedded within the practice of differentiating clinical patterns is a principle *Li* 理 which defines and explains the origins of the illness, pathomechanism *bing ji*, etiology *bing yin*, site of imbalance *bing wei*, and stage of progression *bing shi*, and provides the rationale upon which clinical intervention is undertaken. *Li*, as defined by Han Fei Zi, a Han Dynasty Legalist philosopher, is the ‘culture which explains how things come about’. 73

Once the specific pattern embodying the *Li* of a particular clinical pattern of a patient has been established, the stage is set for deciding on a particular *Fa* or method of dealing with this clinical pattern. Generally, there are eight therapeutic methods to choose from: diaphoretic, emetic, downward, dispersing, mediating, warming, clearing and tonifying. Upon the selection of a particular therapeutic method, a therapeutic strategy called a formula or *Fang* is chosen. This ‘strategy’ may be a herbal decoction, a collection of acupuncture points, or a repertoire of massage hand techniques. It may also include specific advice to the patient. *Yao* refers to the individual harmonizing balancing remedies which together make up a formula. They may be herbs, acupuncture points, an individual massage technique or individualized advice.

While the practice of TCM may be summed up by the four Chinese words *bian zheng lun zhi*, which mean proposing treatment principles in accordance with the clinical pattern. It can also be referred to in another way: *li fa fang yao*, translated as ‘choosing individual remedies (yao) for a formula (fang) on the basis of the established therapeutic method (Fa) and principle (Li)’.
An Exemplary Case

The following is an account of a particular patient suffering from diarrhoea treated by this author in 1990 in Australia. This case illustrates how the practice of ‘proposing treatment principle in accordance with the clinical pattern’ was successfully used in dealing with this patient’s ailment.

Name: Paul  Gender: Male  Age: 47 years old  Status: Married
Place of Origin: Australia  Occupation: Computer programmer
Season: Summer

Main Complaint: Diarrhoea (loose and watery, 12-30 times a day) for the past couple of weeks after eating some sausages bought from a butcher’s shop. Patient also complains of coldness on the back.

Observation: Patient looks very tired. Facial complexion is pale with enhanced blackness around the eyes. Tongue is red and moist.

Inquiry: Sleep is not good, because of anxiety about going to the toilet. Had acupuncture before to quit smoking. Patient has lost eight kilos as a result of the present illness. No previous history of diarrhoea. Patient taking Limotil, a Western pharmaceutical medication.

Listening: Low pitched voice.
Palpation: Radial pulse is deep and taut.

Diagnosis: Cold deficiency of the Large intestine Organ system with Dampness

Therapeutic Method: Warm the Middle Energizer, tonify the Qi and stop the intestinal run.

Formula, Remedy, Operational Technique:
16/2/90 Acupuncture therapy administered to the patient. Acupuncture Points used were: GV 20; St.25 (apply moxa); PC5; LI4 and St.36

19/2/90: The patient came for the next consultation and therapy. Upon inquiry, the patient said that he felt very good after the first treatment and the diarrhoea stopped on the same day after the treatment. Patient said he slept the whole afternoon up to the following day. He is now having two bowel motions each day and they are not loose. Similar acupuncture treatment was administered to the patient.

Discussion

Through the Four Examination Techniques (observing, inquiring, hearing/smelling and palpation) data on clinical signs and symptoms were collected and collated. Then using the TCM Conceptual Templates i.e. Eight Principal Patterns, Patterns of the Five Visceral and Six Hollow Organ Systems and Patterns of Acupuncture Channel Disharmony, these clinical data were structured and assembled into the clinical pattern of Cold and Dampness Affecting a
Deficient Large Intestine Organ system. Watery loose bowel motion (water flows downwards and seeks its own level), loss of weight, low pitched voice, pale facial complexion and enhanced blackness around the eyes are all manifestations of a preponderant Yin and a deficient Yang. Diarrhoea is also a manifestation of an imbalance affecting the Spleen Organ System (one of the organ systems among the Five Visceral Organ Systems) and Large Intestine Organ System (one among the Six Hollow organ Systems). The main complaint of the patient was diarrhoea. It was triggered by eating sausage bought from a butcher shop. The sausage might have gone off (meat products go off easily during summer). The intake of sausage could have affected the transporting function of the large Intestine organ System as well as the transforming function of the Spleen organ System. This brought about the spread of dampness and subsequent diarrhoea. Uncontrolled diarrhoea can lead to a deficiency of body fluids. Hence the patient loses weight, develop enhanced blackness around the eyes and a pale complexion. With the further deterioration of this condition, the Anti-pathogenic Qi Zheng Qi can be further weakened and thus manifest as deep pulse, tiredness and a low-pitched voice. This is the Li or principle embedded in the clinical pattern of this patient.

In order to deal with the clinical pattern of Cold and Dampness Affecting the Deficient Large Intestine, the therapeutic method of Warming the Middle Energizer, Tonifying the Qi and Staunching intestinal runs was adopted. The choice of remedy, acupuncture points and operational techniques must achieve this therapeutic aim. The acupuncture points GV20, PC5 and LI4 were chosen to dispel dampness. To tonify the Qi the acupuncture point St.36 was chosen and moxa applied. To enhance the therapeutic action of dispelling dampness and staunch the intestinal runs moxa was also applied over acupuncture point St.25. After the
first consultation and therapy, the patient quickly recovered from his severe condition. This confirmed the therapeutic method used (‘the treatment proposed’ lun zhi) proved to be appropriate to the differentiated clinical pattern bian zheng.

Language Use As Exemplary Translating Practice

All through my thesis I am translating between languages: the ancient and contemporary Chinese spoken and written forms, and contemporary academic English. The practice of translation between languages is pivotal in my thesis; hence I briefly consider it here as a special instance of translation. It deserves special attention in a translating knowledge space. Language is an assemblage. It is an assembly of heterogeneous components - letters, characters, phonemes, ideograms, tongue, mouth, throat, teeth, pinyin, books, discrete signals, computers, the Internet and so on. Elements in this assemblage come together in space and time to generate communication, culture and knowledge. Language can come in a variety of forms and versions, e.g. vocal, pictures, symbols, digital, alphabet-based, hieroglyphic and so on.

In general, languages have three main components i.e. sound patterns, words and grammatical structure. Sound patterns are a collection of sounds generated by human speech. Almost all languages have twenty to sixty sound patterns. ‘Words’ are sound patterns with specific ‘meaning’; grammar refers to how elements of a particular language (i.e. words) relate to one another in the formation of larger units like sentences.

A conventional understanding of the alphabet sees it as a set of 26 letters or symbols which
are strung together to represent speech sounds. In this sense, the alphabet is a set of linguistic representational tools assembled in the right order to generate words orally or in text to convey meaning. As an assemblage of 26 letters or symbols whose origins still puzzle many historians and linguists, it evolved over three millennia from early Sumerian cuneiform, Egyptian hieroglyphic, and Greek and Latin writing systems. Its Roman and Greek forms colonized the Indo-European languages - English, French, German, etc.. Now this assemblage of twenty-six symbols is starting to colonize the Chinese language, in the form of an alphabetized analogue called the Pinyin system. The English language, in its own unique way, is one of the many languages which employ a standard version of this alphabet.

How do various elements of the assemblage come together in English to effect meaningful communication? In order to answer this question I will use a quotation and then employ examples of how the assemblage works.

[T]o render a spoken word alphabetically it is first necessary to analyze the sound or phonic structure of the word and hence breakdown the word into its basic sounds or phonemic elements. Once this is done, the matching of the letters of the alphabet with the phonemic elements can take place to render the spelling of the words."

Take the case of the English word ‘medicine’. How do we use the assemblage of the alphabet to generate this word in a meaningful way? We have to spell it correctly, and have to write the letters of the alphabet in the right sequence and order: ‘m’ followed by ‘e’, then ‘d’, followed by ‘i’, then ‘e’, ‘i’ again, then ‘n’ and, finally, the letter ‘e’ again. If we write it in this order we can communicate the meaning of ‘curing a disease’ to another English speaker. If we spell this word wrongly, e.g. by placing letters in the wrong sequence, we cannot make ourselves
understood. But sometimes, looking at the the word 'medicine,' the reader might understand our intended meaning despite the error in spelling.

To express the word 'medicine' orally or verbally, in a way that convey the conventional meaning, we have to 'match' our utterances with the appropriate letters of the alphabet, combining a number of syllables in a word. To say 'medicine,' we combine consonants and vowels from the alphabet to create the phonetic rendering 'med.i+cine.' Different dialects of the English language may be 'spelt,' if necessary, by a different sequence producing different syllables.

The Chinese language, on the other hand, does not have an alphabet. In its place, monosyllabic words are assembled by a number of standardized graphs or 'tools' like a dot, a vertical line stroke, a horizontal line stroke, a left side sloping stroke, a right side sloping stroke, hooking stroke, a rising stroke, and a cornering stroke. These are referred in the art of Chinese calligraphy as the 'strokes of the Chinese characters' or bi hua. ❗ There are also standardized sequences in the assembling of these inscriptions referred to as 'order of strokes' or bishun. Over millennia of history, an assemblage of 60,000 Chinese scripts has been formed. Of this number 6,000 are commonly used. ❗ The Chinese language also has generated a phonetic system shengmu using thirty six 'mother-scripts,' representing thirty six sound patterns shengzu generated from five points of articulation: lips, tongue, tooth chi, teeth ya, and throat. ❗ In its interaction with the alphabetic assemblage, however, the Chinese language has been introduced to an alphabet-based phonetic system referred to as the Pinyin system, which I am now using in italics.
Let us now see how a word from an ‘alphabetic’ language like English is translated (rendered by an equivalent version) into Chinese. Let us again use the example of the word ‘medicine’. In Chinese, this word is rendered 薬. This character is made up of three independent character units which may be assembled or disassembled into a number of inscription strokes. The first character unit is 薬, which has two components: an outside component like a standing rectangular box open to the right side, with two horizontal strokes connected by a vertical stroke. Then we have the inner component, made up of a side sloping stroke connecting to two horizontal strokes, with left and right hand downward sloping strokes. This whole assemblage conveys the meaning of an arrowhead (the inner inscription) in a quiver (the outer inscription). The other component character unit is 全. Its upper segment consists of one left sloping stroke connecting up to a horizontal stroke, then sliding down to a right sloping stroke. The lower component consists of an upper horizontal stroke with a crossing sloping strokes beneath. The combined units of strokes convey the meaning of the right hand about to engage. Together, these character units convey the meaning of directing the arrow against evil influences that cause imbalance and deviation. The final component is 蒸, consisting of four horizontal strokes, two vertical strokes creating a box, and two slightly sloping strokes in opposite directions. This inscriptive assemblage represents an ancient vase used for storing fermented liquor, medicinal decoctions or elixir.

The assembling of these three independent units conveys the meaning of accurately interrogating patterns of signs and using herbal decoctions to target a pattern of illness understood as a phenomenon of disharmony or imbalance. In recent years, the Chinese word 薬 has been simplified into the word 薬, which is one of the three individual script
components of the original. Shown below is the script-by-script assembly of this inscription. 86

Step-by-step Construction of the Chinese script assemblage for the word 'medicine'

<table>
<thead>
<tr>
<th>Stroke order:</th>
</tr>
</thead>
<tbody>
<tr>
<td>一 木 木 木 木 木</td>
</tr>
</tbody>
</table>
In the Chinese language, then, writing the word 水 is practically 'doing' it, bringing the actants in the assemblage to life stroke by stroke. From the 'dot', the inscription moves horizontally, vertically, crosses, slants downwards and upwards, and the agential figure comes to life. In the words of Wang Jing Hui, a Chinese Taoist calligrapher who appeared in the American television documentary 'The Mystery of Chi' shown here in Australia in 1993:

When I write the Chinese script for 'water' 水, I become 水 water. As I wrote 水 'water,' it was like swimming in 水 'water.'

Comparing the two linguistic assemblages - alphabet-based English and the Chinese language - I propose that the form of assemblage that occurs in generating alphabetic words is similar to the assemblage which occurs in a biomedical clinical encounter. Similarly, the generation of a Chinese character is analogous to the sort of assemblage which occurs in a TCM clinical encounter.

**TCM Clinical Practice**

Language use as embedded in TCM practice, therefore, exemplifies its central paradigm or imaginary. Here clinical practice is an embodied, embedded expression of a knowledge tradition in place. Every TCM clinical encounter in the TCM clinics of contemporary suburban Australia, including my own, is a collective performance. We might understand this as being in some ways like the jazz clubs which flourish in Australia, bringing to life and sustaining a disciplined tradition of performance and improvisation. They are collective enactments with a venue, performers/clinicians, instruments and audience/patients.
In the clinical practice of TCM I propose that there are three agential figures: things that work in relation to each other in an episode of clinical practice. These agential figures are the (a) \( yao \) as an exemplary of all those interventionary tools that TCM practitioners have at their disposal, (b) the figure of the `uneasy' body of the patient and (c) the disciplined practitioner and the corporate body of TCM practitioners. The very practice of \textit{bian zheng lun zhi} grows out of the patient's body. Signs and symptoms express the condition of the patient's body, and the practitioners do not represent it. Instead, they re-present it. A picture of Yin and Yang imbalance or disharmony might emerge. From this picture, TCM practitioners work out the `doing' of the `tools' or \( yao \) to be deployed. In TCM, therefore, the natural body is `done' in practices that are naturally part of it. The \( yao \) as a TCM tool is a heterogeneous assemblage of acupuncture (needles, acu-tract and acu-point charts), herbal medicine, Tuina, food therapy, yang sheng and Qi exercise. Like the Chinese ideograph which moves horizontally, vertically, slopes up, down and crosses in accordance with a standardized ordering to convey the right meaning; it is the nature of the \( yao \) to embed a Qi which assumes a Yin and Yang life, a motion ascending, descending, sinking, floating, moving in, moving out, hot and cold, in dispersion or condensation. These varied Qi motions of the \( yao \), or a group of \( yao \), represent a standardized formula (\textit{fang}) which fits the clinical pattern of imbalance or disequilibrium to the uneasy body of the patient.

The biomedical clinical encounter is also constituted by three agential figures: the corporate body of biomedical health practitioners, their medical tools (pharmaceuticals, injections, immunizations, diagnostic testing devices and so on), and the uneasy body of the patient. Practitioners of this tradition of health care map the presence or absence of certain entities in the patient's body. The tradition seeks to mimic the presence of viruses or bacteria or the
absence of certain enzymes in the patient’s body in its representation. The mimicked or mapped body is here and the practice of medicine is over there. Like ‘matching’ speech sounds with the correct ordering of the letters of the alphabet, this mapping matches what is on the ground with what is ‘on the map’ - the virus, bacteria or enzymes. As with the letters of the alphabet, pharmaceuticals, diagnostic tests and so on must be prescribed in the right order and sequence in accordance with stringent laboratory standards so as to put the ‘machine’ of the body into good working order.

To summarise the difference between the two clinical encounters, I refer to the difference in agential status of the three constitutive elements. In TCM the three elements are equally agential. The clinical encounter is a three-way negotiation. In Western biomedicine there is a hierarchy of agency. The clinician has most agency, the patient somewhat less, and the materialities are merely tools to be wielded by the clinician.

With this juxtaposition we see the central framing device of my thesis. It is an odd and controversial framing device, for it carries a contradictory claim. I present the TCM clinical encounter as simultaneously identical to and different to that of Western medicine. The sameness is an everyday sameness: the patient, the doctor, and his/her tools. Being experiential the sameness is a certain sort of truth - superficial, although no less important for being so. The difference between the encounters is also a truth. It is one that takes longer to grasp, and entails care of thought and explication. The difference between the clinical encounters is metaphysical and ontological.

I go on now to set my thesis in the Australian context. In my next chapter (Chapter 3) I give
some glimpses of an Australian TCM past. The place and the history of TCM in that place both matter. Next I turn to the question of how bodies are constituted in TCM practice (Chapter 4), considering the seemingly odd question of whether bodies as such feature in TCM. In Chapter 5 I give a reading of yao in TCM practice in a translating knowledge space, through consideration of the contemporary practice of herbal medicine. Finally, in Chapter 6, I give a re-reading of acupuncture.
Endnotes

Chapter 2


2 The phrase ‘create convergencies and homologies’ comes from the work of Steven D. Brown and Rose Capdevilla, ‘Perpetuum mobile: Substance, force and Sociology of Translation,’ which includes an elucidation of the concept of ‘translation’ where a quote from Michel Callon was used. Brown and Capdevilla state:

As Callon (1980) acknowledges, the term ‘translation’ is taken from the work of Michel Serres. In that early paper, Callon gives the following gloss:

Considered from a very general point of view, this notion [translation] postulates the existence of a single field of signification, concerns, and interests, the expression of a shared desire to arrive at the same result...Translation involves creating converges, and homologies by relating things that were previously different.

Here Callon explicitly makes translation a semiotic operation, part of what he describes as a 'socio-logic'. Translation is the manoeuvre whereby the logical relations between seemingly opposed sets of 'significations, concerns and interests' are displaced within a programmatic organization of both knowledge and social actors (ibid:211). It's a matter of shifting interests by displacing the nature of a pivotal problem from one set of signification to another.


4 David Turnbull, *On With the Motley: The Contingent Assemble of Knowledge Spaces*, PhD, Department of History and Philosophy of Science, University of Melbourne, 1996, p. 84


7 Ian Hacking, 'The Self-Vindication of the Laboratory Sciences,' in *Science As Practice and Culture*, Chicago, University of Chicago Press, p. 37


9 ibid., p. 77
Chapter 2 Contemporary Assemblage of Translating

10 ibid. p. 82
11 Susan Leigh Star, op. cit., p. 21
14 Jonathan J. Chan, Juliennne E. Chan, op.cit., p. 3
15 Philip Hancock et al., The Body, Culture and Society, Buckingham, Open University Press, 2000, p. 6
16 DNIC refers to ‘diffused noxious inhibitory controls,’ which is one of theoretical frames used by Australian NH&MRC biomedical researchers to explain the anaesthetic effect from acupuncture. This concept was generated from an animal experiment involving anaesthetised rats, which demonstrated that certain neurons in the spine can be inhibited by strong ‘noxious stimuli’ applied to any part of the body distant from the excitiatory receptive fields. (D. Le Bars, A.H. Dickinson & J.M. Beeson, ‘Opiate analgesia and descending Control system’ in Advances in Pain Research and Therapy, Vol. 5, New York, Raven Press, 1983, p. 351.)
18 David Turnbull, op.cit., p. 38
20 David Turnbull, op cit., pp. 20-21
22 ibid., p. 55
John Law states that heterogeneous engineers

seek to associate entities that range from people, through skills, to artefacts

and natural phenomena. This is successful if the consequent heterogeneous networks

are able to maintain some degree of stability in the face of attempts of other entities or systems
to dissociate them in their component parts.

26 Helen Watson-Verran & David Turnbull (1995), op. cit., p. 117
27 Michel Callon, (1991), op. cit., p. 145
28 Yang Wei Y1, ‘Zhongti xiyou yu zheng de dongw wu moxing’ [With Chinese learning as the ‘Substance’

Western learning as ‘Function’: and the animal model of TCM clinical patterns], Beijing zhongyiyou daxue sishi zhournian xiaoqin lunwen ji [Thesis collection on the occasion of the 40th anniversary of the foundation of the Beijing TCM University], Xueyuan chubanshe, Beijing, 1996, pp. 172-176
29 Chen Wei Yang, ‘Zhongyi yanjiu gongzuozhong de keganhua yanjiu’ [Research On Objectification into the Work of TCM Research], Li Zhong Pu (ed.) Zhongxu jiehe yanjiu shilu yu fangfa [Thinking and Methodology in Integrated TCM and WLM Research], Shanghai kexue jishu chubanshe, Shanghai, 1985, pp. 39-49
30 Paul Unschuld, Medicine in China, Berkeley, University of California Press, 1985, p. 5
32 D. Le Bars, A.H. Dickinson & J.M. Beeson, op.cit., p. 351
33 Working Party on Acupuncture, op.cit., p. 14
34 Helen Watson-Verran & David Turnbull, (1994), op.cit., p. 2
35 Joseph Rouse, op.cit., p. xi
36 The historian Jia De Dao contends that Chinese society went through 1,500 years of pre-feudal social development up to the period of the Spring and Autumn era. Subsequent to this period, Chinese society went through 2,500 years of feudal societal development. (Jia De Dao, Zhongguo yixue shi le [An Outline History of Medicine in China], Shanxi People’s Publishing House, Shanxi, 1979, p. 2-3.)
38 ibid. p. 815
40 Alan Bensoussan et al., Towards A Safer Choice: The Practice of Traditional Chinese Medicine in Australia, Sydney, University of Western Sydney, 1996, p. 21
42 Rey Tiquia, (21 October 1986), Qi - The Energy of Life, Australian Well-being, pp. 102-106
44 This script has now been simplified into 弦 (Zhang You Juan et al., Chinese-English Chinese Traditional Medical Word-Ocean Dictionary, Shanxi People’s Publishing House, Shanxi, 1995, p. 370-371.)
45 Joseph Needham uses this Wade Giles transliteration of Qi. He also translates Qi as ‘pneuma, subtle matter, matter-energy, or energy present in organized form’. (Joseph Needham, Science and Civilization in China, Vol. 4. Physics and Physical Technology, Part 1 Physics, Cambridge University Press, 1962, p. 403.)
46 A.C. Graham translates ‘Qi’ as ‘Primary Ether’
47 On-Chong Ng, in his discussion of the monistic philosophy of Qi (Qing vitalism) which dominated 17th century China, ‘stressed the vivid, immediate and ultimate completion of a concrete and dynamic life expressed in terms of chi (material force 氣) and chi (concrete things and implements 器)’. On-Chong Ng, ‘Toward an Interpretation of Ch’ing Ontology,’ R.J. Smith & W.Y. Kwok, Cosmology, Ontology and Human Efficacy Essays in Chinese Thought, Honolulu, University of Hawaii Press, 1993, p. 37

51 In 1958, A.C. Graham refers to the Qi as ‘ether’ and refers to the primordial Qi 元氣 as ‘primary ether’. (Angus Charles Graham, The Two Chinese Philosophers Ch’eng Ming-tao and Ch’eng Yi-ch’uan, London, Lund Humphries, 1958, p. 32.)
52 Angus Charles Graham, Disputers of the Tao, Chicago, Open Court, 1989, pp. 101 & 497
53 The original Chinese rendition is ‘Qi ju ce sheng, Qi san ce si’ (Wu Yi Luo, circa 1761, Qing Dynasty), Cheng Fang Qie Yong [Creating a Formula which Fits its Use], Shanghai kexue jishu chubanshe, Shanghai, p. 1.)
55 A.C. Graham refers to the Chinese notion of Wu Xing as ‘Five Walkings’. (Angus Charles Graham (1958), op.cit., p. 35.)
This is an English translation of the Chinese phrase *Tian ren tong Qi ye* 天人同气也. Chen Ding San, Jiang Er Sun (ed.), *Yixue Tanyuan* [Exploring the Origins of Medicine], Sichuan kexue jishu chubanshe, Sichuan, 1985, p. 16

I am using A.C. Graham's English translation of the Chinese words *Gan Ying*, which he renders as *Kan Ying* (Angus Charles Graham (1989), op.cit., p. 486).

Tang Zong Hai, *'Yi Jing Jing Yi'* [Essential Meanings from the Medical Classic], Chai Lu Xian (compiler), *Zhongguo Yi Yao Hui Hai* [A Sea of Convergence on Chinese Medicine, Vol. 8, 1941], Beijing shi zhongguo shudian, Beijing, 1985, p. 3

I am translating the Chinese word *hua* 化 into the English word 'transformation,' which A.C. Graham translates as 'transformation of an object into something else.' He also distinguishes the Chinese word *bian* 变, which he translates as 'change from movement to rest, from spring to summer, from good government to bad.' (Angus Charles Graham (1938), op.cit., p. 41.)

*Sao* 湧 is a urine smell

*Jiao* 焦 means 'burnt'

*Zao* 是 'dryness'

*Xing* is a raw meat and fish smell

*X* 息 means a breath. When the word *X* breath is repeated, the breaths (each inhalation and exhalation) are done close to each other.

Chai Lu Xian, *'Lun Shuo Bu'* [Volume On Explications], *Zhong Guo Yi Yao Hui Hai* [A Sea of Convergence on Chinese Medicine Vol. 16, 1941], Beijing shi zhongguo shudian, Beijing, 1985, pp. 28-29

Tang Zong Hai, *'Yi Jing Jing Yi'* [Essential Meanings from the Medical Classic], Chai Lu Xian (compiler), *Zhong Guo Yi Yao Hui Hai* [A Sea of Convergence on Chinese Medicine Vol. 8, 1941], Beijing shi zhongguo shudian, Beijing, 1985, p. 66


This segment is a 'practical translation' of a segment 'Explicating the Six Acu-tracts' *Liu Jing Jie* from the book by Chen Ding San [Chen Ding San, Jiang Er Sun (ed.), *Yixue Tanyuan* [Exploring the Origins of Medicine], Sichuan kexue jishu chubanshe, Sichuan, 1985, p. 15. Rendering this translation involves not only providing an English version of the Chinese original but also includes practically 'walking' through the Qi tracts thereby rendering a practical 're-presentation' of the acu-tracts.

This is a quote originally in Chinese from the work of the Qing dynasty Chinese philosopher Yan Yuan (1635-1704), which I translated into English. This quote was featured in the history of Chinese philosophy by the contemporary Chinese philosopher Ren Ji Yu, *Zhongguo zhexue shi* [History of Chinese Philosophy, Vol.4], Renmin chubanshe, Beijing, 1979, p. 84

Zhou Mei Sheng & Zhou Shu Dong (ed.), *Jin Zhen Mei Hua Shi Chao* [A Copy of a Verse on the Plum Blossom Golden Needle], Anhui kexue jishu chubanshe, An Hui, 1982, p. 106


This is a quote from a flyer published by the *Xin Yi Tang* Chinese medicine clinic located in downtown Chicago USA, where Dr. Xia Yi Feng has been practising TCM for the past ten years. This flyer was in turn downloaded from the website of the University of Chicago. *What is Chinese Medicine?* 2002, <http://www.home.uchicago.edu/~jil/medicine.html>


81 This is how the head word entry in an American English dictionary for the word ‘medicine’ is rendered into three syllabification breaks. The word is broken down in three syllables for purposes of hyphenation. The plus sign indicates preferred end-of-line hyphenation while the centered dot sign indicates syllabic breaks where hyphenation is to be avoided. P. Hanks (ed.), *Collins Dictionary of the English Language*, Sydney, Collins, 1981, p. x
82 Zhou DaPu (ed.), *Gu Dai Hanyu Jiaoxue Cidian* [Ancient Chinese Language Teaching Dictionary], Qiu Lu shush, Changsha, 1991, p. 36
84 Zhou DaPu (ed.), op.cit., pp. 16-17
85 ibid, pp. 45-47
87 This piece was lifted from page 425 of the book *A Speedy Elementary Course: 500 Basic Chinese Characters* by Patrick Lin (1996), published by Sinolingua Press, Beijing.
88 D. Grubin (director) & A. Markowitz, D. Grubin (producers), *The Mystery of the Chi* (video recording); David Grubin Productions Inc. & Public Affairs Television Inc., USA, 1993
Chapter 3: Glimpses of an Australian Traditional Chinese Medicine Past

A translating knowledge space where mutually respecting traditions of practice might interact, enriching and enlarging other spheres of practice, where reflective, open, clinical practice in all traditions is the norm, is a pivotal element in my thesis concerning TCM as an Australian tradition of health care. I see this translating knowledge space as working through the careful assembling of heterogeneous elements, that contingently emerge as the spheres of influence of TCM and other ‘other’ medical traditions expand. TCM is fast becoming globalized, yet each TCM practitioner comes from a specific tradition, and has certain national and local idiosyncrasies. In this chapter I exhibit three glimpses of an Australian TCM past as a way of providing some background to the emergent contemporary translating knowledge space. Juxtaposing these ‘exhibits’ provides me with an opportunity to discuss ways of simultaneously connecting and keeping separate the health care traditions of TCM and Western biomedicine.

Australia is a vast continent originally peopled by the indigenous Australian Aborigines, who had an ancient and complex culture, and whose traditions of health care are also currently experiencing a resurgence. Over the past two centuries Australia has been settled by migrants from all over the world, including many Chinese. Among the latter were traditional Chinese medical practitioners. The colonisation of Australia over the past two centuries is of course a type of globalization. Up until quite recently this colonialism was associated with scientism and racism. Among ‘the others’ TCM subjects and objects were reduced to marginality. Armed with an ideology of asepsis, biomedicine became the dominant medical tradition in Australia during the twentieth century, while well established alternative ways of healing
like homeopathy, naturopathy and TCM became the subject to domination. Different systems of medicine and healing were labelled as backward quackery, and this took the form of racial attacks in the case of Chinese medicine practitioners. What began as a confusing multiplicity of medical traditions in colonial Victoria and New South Wales, had by the beginning of 20th century become a context where biomedicine was dominant and TCM eclipsed and hidden.

During the middle years of the 19th century, the British Colony of Victoria was one of the epicentres of gold fever, with a society in a state of flux. Peoples and cultures from other parts of Australia and from other continents were flocking to the colony in their thousands in search of gold. From 1851 to 1859 the population in the colony jumped from 97,489 to more than half a million (521,072 people). Most of the new colonists were from Britain, America and Canada, the Netherlands, China and the Asia-Pacific, and brought with them their own unique medical traditions.

Medicine and health care in the Victorian colony was diverse, plural, complicated and idiosyncratic. The indigenous Aboriginal healer treating his or her community coexisted with the allopaths, emerging scientific medicine men, homeopaths, chemists, dentists, herbalists, naturopaths and traditional Chinese medical practitioners, who were then referred to as Chinese herbalists. In the Census of 1861, there were sixty-one Chinese herbalists and Aboriginal healers, and 592 physicians, surgeons, apothecaries, oculists and dentists. From 1863 to 1870 several homeopathic dispensaries opened in Melbourne and the suburb of Geelong (Cunningham, 1995). Herbalism and naturopathy were very popular in the colony. As Larson has pointed out, we cannot speak of a single market for medicine ‘but several markets, with different medical commodities being produced by different schools of healing’
Between 1860 and 1880, however, controversies flared between and within various medical traditions in the colony. These controversies centred around the qualifications of those practising medicine as well as the appropriateness of their medical treatments. Amongst the traditional European medical practitioners, there were those who preferred to keep to the tradition of empirically proven remedies of bloodletting, leeching, purgation and emetics to rid the body of poisons. These were considered to be the empirics. On the other hand, there was an emerging group of practitioners who thought the practice of medicine should be made rational by utilising European scientific theories of physiology, chemistry and micro-anatomy. These rationalists were the emerging practitioners of biomedicine. Within this group, there was a schism emerging between the miasmists, who saw the disease as resulting spontaneously from decaying matter or miasma, and the contagionists who saw the source of disease as coming from ‘germs’ or ‘fungus’. Homeopathic practice followed the dictum of ‘like cures like’. They used infinitesimally diluted quantities of drugs to artificially induce symptoms of the disease thus driving out the latter. They were attacked by the allopaths as ‘globulistic quacks’. Homeopaths in turn attacked the allopaths for their love of purgation and heroic bloodletting.

My first exhibit concerns material traces of a TCM past that I found in Melbourne’s Museum of Chinese-Australian History. While there is not a permanent exhibition devoted to TCM in this museum, its collection does contain some traces of a once lively collective practice. I move on to exhibit texts associated with two controversies around TCM practice in Victoria. Exhibit 2 concerns the diphtheria epidemic that occurred in Victoria during the 1870s.
Practitioners of TCM successfully treated many patients during this epidemic, but the result of that success was an increase in their marginalisation. Exhibit 3 concerns the controversy that emerged in Victoria in 1925 over the introduction of a Bill in the Victorian Parliament called the Pharmaceutical Chemist Bill which attempted to limit the prescription of medicinal herbs and to exclude and criminalise the practice of TCM.

Why provide these glimpses into the past, in a thesis that is not focused around history? I am seeking to demonstrate how my framework of analysis works, with its proposition of a translating knowledge space. I am drawing attention, therefore, to the heterogeneous assemblages which, in my first exhibit, enable and effect translation, and in the case of Exhibits 2 and 3, accomplish the making of incommensurability and untranslatable difference. In the first exhibit I seek to show how the TCM practitioners who set up practice in nineteenth and twentieth century Victoria translated the context in which they found themselves. The materials they left behind show them actively adapting their practices and forms of presentation. The heterogeneous assemblages through which they effect their health care work accomplish connection. This is also evident in the stories told in the texts I use in Exhibits 2 and 3; but in the same exhibits we see how the assemblage of Parliamentary Laws, courts and police effect a separation, opposing and outlawing the translations the TCM practitioners are assiduously cultivating. Showing this reveals an oddness about my analytic framing. It takes as analogous, in some sense as ‘the same,’ things that most people assume are very different: a tiny glass bottle with TCM herbal powder and an English language label, and a law passed by the State of Victoria. This making analogous changes the sorts of properties that are of interest when we deal with these entities. It gives a form of social agency to the bottle, similar to the sort of social agency we normally associate with laws, and it alerts us to the
materiality of the Parliamentary laws that is usually taken for granted and so remains invisible.

Exhibit 1

We know about the Goon brothers who practised in Melbourne in the early years of the last century from some artefacts of their practice which have been preserved. These artefacts included a herb bottle and its contents, an 'ironboat' herb grinder, and a herbal prescription. All of them are kept in the repository of the Museum of Chinese-Australian History in Melbourne.

The curator of the museum showed me a tiny glass bottle, about 50 mm long and about 5 mm in diameter. It has a cork stopper about 15 mm long. It is a clear round cylindrical bottle with a 'laid-on lip,' a slender neck and a comparatively wide body. It looks like one of those antique bottles eagerly sought by collectors. Pasted on the bottle is a paper label, originally white in color but now turning rusty brown. That label covers most of the body of the bottle. In tiny black print, the label reads:

Goon's celebrated throat powder
for all affections of the throat
Direction: Place a little of the
powder on the blower supplied,
and blow on affected parts three
times daily.
Manufactured by F.S. Goon Herbalist
Only address: 3 Peel St.
South Balarat East
Box 6 Melbourne Box 1380
An Australian TCM Herb Bottle Circa 1901

Inside the plastic bag with the bottle is another transparent plastic package which contains a few grams of brown colored ground herb powder. According to the museum curator, the donor of the artefact, who is the granddaughter of the Chinese herbalist F.S. Goon, accidentally uncapped the bottle inside her handbag. The powder then spilled inside the handbag, so that
she had to scoop it back and placed it inside the small plastic bag. The curator has no knowledge of the components of this brown herb powder.

This tiny medicine bottle tells an interesting story about the practice of traditional Chinese medicine (TCM) in Melbourne and Ballarat at the time of Australian Federation. As an 'inscription' it relates the story of how Chinese Australian herbalists like F.S. Goon situated the practice of TCM within the Australian social and cultural context. The medicine bottle marks the development of Chinese medicine practice in Australia into a heterogeneous assemblage which generates robust and standardized diagnostic and therapeutic 'tools' that perform the job of 'tailoring treatment principles to the differentiated clinical pattern' or bian zheng lun zhi.

The Medicine Bottle

The bottle design is consistent with the common universal design of patent medicine bottles in Australia during that time (please refer to Appendix 1 to Chapter 3). It conforms to common Victorian-era bottle design, and might have been purchased from chemist shops in Ballarat, according to Mr Goon's granddaughter. The 'laid-on lip' is a distinctive feature of the bottle. This is a technical innovation differing from the irregular and sharp features of the 'sheared lip' typical of previous bottle design in England. The 'laid-on lip' was actually a ring of glass attached to the mouth of the bottle after it had been formed in the mould, and makes possible the insertion of a tight-fitting cork. Pragmatic considerations must have played a decisive role in the choice of this bottle for the packaging of Chinese herbal preparations. Such bottles were very cheap and readily available compared to the Chinese-style porcelain vessels. In addition, the use of this Victorian style bottle made the Chinese herbal product more acceptable to the
local community. Besides, most patent medicines of those times used this type of bottle to indicate their medicinal value.

The Bottle Label

One striking feature of the label was the use of English instead of Chinese. Obviously, the 'medicine bottle' was communicating with the English-speaking residents of Ballarat and Melbourne. The patients are not primarily Chinese. The use of the word 'celebrated' we could assume is an indication of some therapeutic success in the use of the herbal preparation which is administered (three times daily) locally to the throat with the use of a 'blower'. I was told that the 'blower' supplied is similar to the present day soft-drink straw, but made from wax paper instead of plastic. It is one of the local technical innovations made by Mr Goon. One end of the straw is used to scoop some of the herb and is then placed inside the mouth quite close to the back of the throat; the practitioner or another person then blows the powder onto the affected area of the throat.

The label most importantly also indicates the therapeutic parameters of the herbal preparation encased within the bottle. The label inscription in English reads: 'For all affections of the throat'. The throat here refers to the Chinese entity called hou 喉. The hou is defined by the Chinese Medical Dictionary 中國醫學大辭典 as

the pathway within the neck through which sound, breath, water and grain pass.
It is located below the root of the tongue and above the oesophagus and the trachea. It is formed by cartilage and bounded by tendon and flesh. When the hou is big then the voice volume is big, when the hou is small the voice volume is small. " 3
The Chinese medical classic *Jade Key To the Layered Tower* 重樓玉韞, a specialized book on the study of throat diseases published in 1839, sees the throat or *hou* as a space through which the Qi is exhaled and inhaled. It is connected to the lungs...

When the visceral and hollow organs are full, the lungs and stomach in harmony and in balance, then the body is at peace and calm. However, when there is Wind pathogenic factor, then heat and poison can accumulate and gather within. This gets transmitted to the acupuncture channels and collateral and stagnates within the Triple Energizer. The Qi congeals and blood flow stagnates and would not flow freely and smoothly. Various disease symptoms and clinical patterns emerge. 4

‘Throat affections’ can include various conditions such as ‘white throat’ *bai hou,* ‘white bandaged throat’ *bai chan hou* (which in the West is referred to as diphtheria), and *gan mao,* which can include common colds, throat inflammations, coughs and colds, upper respiratory tract infections and tonsillitis.

**Bottle Contents : Yao 藥 Powder**

From the brown color and texture of the ground medicinal powder available in the Chinese museum, it appears that it has been prepared in accordance with the traditional method. Powdered materia medica is referred to in Chinese as *san ji* or ‘a preparation which scatters’.

Having this ground, loose and ‘powdery’ physical characteristic enhances its capacity to ‘scatter’ accumulating entities, as with the condition of the throat where ‘heat and poison can accumulate and gather within’. Powder preparations or *san ji* have been used in China for the
past two millennia. Before the *yao* or *materia medica* are ground into powder, they individually undergo a process of preparation referred to as *pao zhi*, which involves soaking the *materia medica* in water, wine or vinegar, coating them with honey, or baking, toasting or stir-frying them.

To produce fine grain medicinal powder special grinding equipment like the ‘iron boat’ is used. An assistant is usually employed to help in the grinding, bottling and labelling. Once ground into powder, each type of medicinal powder is stored in a sealed vessel. Individual powdered *materia medica* may be prescribed individually or collectively in a formula or *fang*. This formula is tailored to a clinical pattern or *zheng*. A clinical pattern incorporates bodily signs and symptoms which are monitored by observing, hearing and smelling, palpating and inquiry about the patient’s condition. These data gathered from the Four Examination methods are then structured through the use of conceptual templates: Yin and Yang, Acupuncture Channels, the Five Visceral and Six Hollow Organs, and so on. Fitting the *fang* to a clinical pattern encapsulates the practice of TCM already referred to: *bian zheng lun zhi* or ‘proposing treatment principles in accordance with the differentiated clinical pattern’. The *yao, fang, zheng*, Four Examination Methods or *si zhen* and the conceptual templates are the ‘clots’ in the set of TCM practices. They are generated from *bian zheng lun zhi*, which in turn generates robust standards and standardizing tools deployed in the practice of TCM.

**An ‘Iron Boat’ Yao Grinder 铁碾**

An iron boat *yao* grinder is kept in the Museum of Chinese Australian History. Made from cast iron, it was used by a Chinese herbalist during the 1930’s in Victoria. It is generally used
to grind hard mineral materia medica like gypsum, as well as in making powdered herbal preparations. It is usually operated by foot, as seen depicted below in a line drawing from Vietnam, where similar technology also found its way.

Electric power generated ‘iron boat grinder’ developed in contemporary China
[TCM Research Academy (Materia medica Research Office)1975, 19.]
The ‘Bottler’ - F.S. Goon 岑福元

The bottle label names F.S. Goon as the ‘bottler’, manufacturer and ‘inscriber’ of the medicine bottle. He was a Chinese herbalist and a practitioner of Chinese medicine. In Pinyin his Cantonese name is Shum Fook Yuen and his Mandarin name Cen Fu Yuan. F.S. Goon was born in 1865 and died in 1963 at the age of 98. He arrived in Australia in 1911 and married a local ethnic Chinese girl. He established a herbal practice in Ballarat and a second practice in Exhibition Street, Melbourne. (The site is now a duty free shop.) He went back to China during the 40’s and 50’s and passed away in Sun hui county, south of the city of Guangzhou in south China.

F.S. Goon had a brother by the name of S.T. Goon (Cen Xiang Yuan in Mandarin Pinyin), who started a herbal practice at No. 6 Nicholson Street in Fitzroy. He launched his successful practice with the treatment of a European woman suffering from opium addiction, a malady common among the wives of influential persons in Melbourne at that time. Goon prescribed a
herbal decoction which made the woman vomit and produced a loose bowel motion. News of
the successful treatment spread quickly in the city, and countless people started consulting
Goon, lining up like a ‘long dragon procession’ outside his clinic. S.T. Goon returned to
Hongkong later in life a very rich man and built a mansion there which still stands.

**The *Fang* or Formulae of Prescribed Materia Medica**

This is a *fang* or formula of materia medica (*yao*) prescribed and inscribed by one of the
descendants of the Goon Brothers for a patient, and is kept in the Museum of Chinese
Australian History. The Chinese calligraphy used to inscribe this prescription was beautifully
executed. The Chinese names of the materia medica and the corresponding dosage in standard
units of *shi qian* 市鎊 (*a shi qian* is equivalent to 5 grams) are written in two rows and are read
from right to left and from top to bottom. There are 12 materia medica used in this
prescription, and their combined weight comes to 180 grams.

Some of the materia medica used in the prescription are the outer red layer of the tangerine
peel, mulberry root, white peony, aged tangerine peel, heavenly flower (*radis trichosanthis*),
Campsis Grandiflora flower and loquat leaf.
A standard balancing tool *tian ping* or *cheng*

A ‘heavenly balance’ (*tian ping* or *cheng* in Chinese) is a device used by Chinese herbalists in Victoria to measure the unit of weight of individual materia medica or *yao* prescribed for a particular patient. It is made up of five components: the dish, weight, arm, lifting cord and hook. On the wooden arm of the heavenly balance gradation marks are inscribed. There is a set
of standard weights, usually made of copper. To use the heavenly balance, the practitioner first lifts and holds the hook, keeping the balance in suspension; then the materia medica is placed on the dish. The weight is slid away from the dish towards the opposite tip of the arm until it reaches a gradation mark at the point where the materia medica and the weight are exactly balanced. That gradation mark represents the weight of the materia medica. The basic unit of weight is the qian, which is equivalent to 5 grams. Ten qian makes one liang (50 grams) and 10 liang make one jin (half a kilo).

A standard balancing tool

Diagram of a balancing tool
English Instructions For Boiling a Decoction

After the yao prescription is written and the herbs wrapped in a paper packet, the medicine is handed to the patient. But the patient must know how to boil and administer them, hence the need for written English instructions.

This instruction sheet (also in the Museum of Chinese Australian History) was distributed with yao in the early twentieth century.

H. H. PANG
HERBALIST

Directions for Boiling and Taking Herbs

Place one Packet of Herbs in a clean aluminium or enamelled saucepan, with..............
cups of water, and boil quickly until reduced to.............. cups. Strain off liquid and
take............... tablespoonsfulls.............. times a day before/after meals.

N.B.—Always take medicine warm, by pouring the required dose into cup, and place
it into a saucepan containing a little water and heat by steaming it.
Diphtheria is a term deriving from the Greek word *diphtheria* and the French word *diptherite*, meaning leather, hide or skin. The term was first used in a medical context by Pierre Bretonneau (1771-1862) when describing the disease, and who in 1825 was the first to introduce the surgical technique of tracheotomy in dealing with laryngeal diphtheria. The term neatly describes the distinguishing symptom of this infectious disease i.e. the creamy white putrid expanding layer of false membrane which covers the throat and can sometimes lead to suffocation. During the 19th century diphtheria became a scourge in Great Britain, the European continent, the New World, China and Australia. In Britain diphtheria took many names: ‘throat distemper,’ ‘putrid sore throat,’ ‘malignant sore throat,’ ‘throat fever,’ ‘inflammation of the throat’ and others. Between 1855 and 1869, 61,000 people are said to have perished in England and Wales from diphtheria and cynache maligna (dog’s disease) [Smith, 1979, 149.] The disease of ‘malignant throat distemper’ was supposedly brought to the New World by the Europeans, and the mortality rates in the colony of New England were between 20 and 40 %.

The scourge of diphtheria in the Western world during the middle and the latter half of the 19th century coincided with dramatic shifts in the contagion and anti-contagion debate which started during the 16th century and reached its peak in the 18th century Europe. This involved works by Pasteur on the role of the micro-organism in wine fermentation, the method of ‘pasteurization’ and his development of the vaccine against rabies, and the works of Lister on the role of asepsis in surgery, all combining to validate the world view of contagionism.
From this point on, in Europe and the European colonies, doctors no longer saw diseases as resulting from spontaneous chemical occurrences in the environment or from petrifaction. Rather, such diseases were seen as caused by specific pathogenic micro-organisms. This enhanced the role of the laboratory in clinical medicine. Micro-anatomy, physiology and chemistry gradually moved the frontiers of medicine from traditional allopathy to scientific medicine.

Pathogenic micro-organisms were now discovered one after the other. Amoebic dysentery was discovered by Loesch in 1875, tuberculosis by Koch in 1882 and diphtheria by Kelbs and Loeffler in 1884. Five years later, in 1889, Yersin and Roux demonstrated that toxins produced by the diphtheria bacteria cause clinical damage. In 1890, Emil Behring developed the antitoxin against diphtheria.

Diphtheria antitoxin was first used on a human patient by von Behring in 1891, and its use in the British colony of South Australia began in the following year. The magical effect of the diphtheria antitoxin (extracted from horse serum) can be seen in this account by a physician in London around the 1890’s:

I found the boy very ill the whole back of his throat being like white velvet.

I had never used the new remedy before, but determined to try it to save the boy’s life. I injected a small quantity under the skin of the stomach and watched the throat. I can only compare the marvellous result to the disappearance of snow beneath the hot sun. After the second dose every trace of the membrane disappeared
and the body soon recovered. 14

In the year 1872 it was reported that 600 people perished annually from diphtheria.
Between 1858 and 1869, from the time that the first case of diphtheria was reported in the colony, 4,574 people died from the disease. The following account is from *The Age* newspaper:

The usual festive season of Christmas and new year has in some portions of Victoria been turned into a season of bitter grief and mourning. That fell disease, diphtheria, is once more abroad, and its ravages have made many a fair and smiling home a scene of dire desolation. Of the fatal results to be feared in the case of diphtheria the Worland family at Dean, in the Creswick district, is a painful example, the remains of five sons and two daughters having been consigned to the grave, the victims of the disease, in the space of twenty days. (*The Age* Jan.13, 1872)

Different medical traditions responded to the challenge of the diphtheria epidemic in their own unique way. The miasmists took diphtheria to be the result of decaying matter and argued for better environmental hygiene and sanitation. The contagionists saw diphtheria as resulting from the intrusion from germs and fungus and opted for strong localized application of substances like carbolic acid, vapour of iodine and silver nitrate. The allopaths saw diphtheria as a product of poisons affecting the body’s constitution and thus advocated the use of such remedies as emetics, purgation, leeching and bloodletting. Homeopaths were using ‘pytollacca with Merc. Pronto. Iod.’ with success (Minutes of Annual Meeting of the Melbourne Homeopathic Dispensary, 7 November 1870).
The standard form of treatment was the local application of chlorate of potash with hydrochloric acid to the throat, in an attempt to break up the membrane so that it could be removed. Attempts were also made to scrape it away with a special spoon, and more potent substances were occasionally applied to loosen it. Dr. Bunce claimed a considerable success at Balarat by the local application of carbolic acid to the throat.  

The emerging biomedical health practitioners following the scientific trends in Europe looked at the pathological, physiological and chemical approach to the disease. A Diphtheria Commission dominated by biomedical practitioners looked into the problem of containing the disease and advocated the use of the chemical sulphur. Tracheotomy was also sometimes used as a last resort.

The Diphtheria Commission was established in February, 1872. It had four members: W.M. Crean M.B., Chief Medical officer, Jean Werner Gunst, M.D., Fredrick Lloyd L.R.C.S. and David Boswell Reid, M.R.C.S..  

The duties of the commission were described by Australian Medical Journal as the investigation of the following:

1) causes or causes of diphtheria in throughout the colony.

2) The general and local aspect and sanitary conditions of the places in which the disease has been known to have occurred.

3) The progress of the disease throughout its various stages in certain ascertained and carefully observed cases.

4) The treatment adopted therein.

5) The result.

6) The relation of diphtheria to other diseases inferred or presumed.

7) The question of contagion or infection.

8) The best remedial measures.
After six months of investigation, the Diphtheria Commission seem to have failed to respond to the demands of their ‘duties’ or terms of reference. An editorial published in August 1872 of the *Australian Medical Journal*, commenting on the publication of the 184 page report of the commission at the cost of three hundred and sixty eight pounds and six shillings to the colonists, questioned whether anything had been added to what was already known of the disease of diphtheria, saying that on the eighth question, ‘namely, “The best remedial measures”, the commission seems absolutely to have jumped to the conclusion that sulphurous acid in a gaseous form is a specific’. 18

Aside from specialized treatment by various medical traditions, self-treatment was also common among the colonists at that time. This was especially so in the bush where access to doctors was very difficult. The following is an account of how a young mother in the Victorian bush dealt with the disease affecting her young daughter:

The woman whipped the horse with the sense of urgency that frightened the little girl beside her.

They approached the farmhouse gate the child listening intently above the sound of the horse’s hooves and the rumble of the wheels, trying to catch her mother’s instructions. When the buggy came to an abrupt halt, the girl jumped down from her seat and without hesitation ran around the back of the building to where the fowls were scratching and pecking in the dirt. She chased them here and there, until in desperation she eventually managed to grab a long white feather. In the gloom of the kitchen she thrust it into her mother’s hands, and watched as it was first dipped in boiling water and then in kerosene.

‘Wait here, I don’t want you getting it,’ her mother said and disappeared down the hall that led to the bedrooms. The little girl obeyed knowing that death had already taken its toll that day. She sat on a chair fearful of moving because of the rats that scuttled in the dirt around her.
And while she waited, her mother hurried from room to room, anxiously pushing the
feather up and down the throats of the diphtheria victims who lay so ill on their beds. This crude measure was aimed at breaking the membrane that sometimes formed across the patient's throat in laryngeal diphtheria, preventing her from breathing.¹⁹

TCM Practitioners and Diphtheria in the Colony of Victoria

Chinese herbalists introduced into the colony quite a different logic and hence treatment of diphtheria. In that treatment a formula of yao (materia medica) in the form of powder was applied directly and locally on the affected throat using a bamboo tube as a dispenser (similar in size to the present-day soft plastic drinking straw). The diphtheria powder was applied a number of times a day.

In the winter of 1873, Ah Sue, a Chinese herbalist practising in the town of Ararat, successfully treated 30 children suffering from diphtheria, and at the same time we find the Chinese herbalist Lo Kuai Sang, who was practising in the gold fields of Ballarat, running daily advertisements in the Ballarat Evening Post for more than half a year²⁰ (July 1874 to 30 January 1875). His advertisements were complete with personal testimonials claiming that he had successfully treated more than 65 cases of diphtheria within the span of three months. He also claimed then that there were eighteen varieties of diphtheria. Below is an example of the advertisements that Lo Kuai Sang placed on the Ballarat Evening Post on 9 December 1874.
DIPHTHERIA!
DIPHTHERIA!
DIPHTHERIA!
AND ALL
INTERNAL DISEASES
EFFICIENTLY CURED BY
K W O I S A N G
(Certificate of Doctor from Canton),
10 PEEL STREET SOUTH, BALLARAT.
R.B.—Medicines with instructions sent to any part
of the Colony.
NO UNREASONABLE CHARGES.

TESTIMONIALS.
Mr. Kwai Sang—Sir,—I hereby testify that you
cured my child from a severe attack of diphtheria and
publicly return thanks for the same, and I earnestly
advise anyone suffering from the disease to lose no time
in applying to you.

MRS DARK.
Dana Street, East Ballarat, 21st July 1874.

To Dr Kwai Sang—Sir,—After the invaluable ser-
tice you have rendered me by curing my little son,
eight years of age, from an attack of diphtheria, I
cannot but in the most public manner thank you for
your skill and attention. I would mention that he
was in a hopeless state, having been given up by
several medical men, when he last resorted to you, and the result I am happy to say, is my poor
poor boy is perfectly cured. You are at liberty to
make use of your pleasure of this letter of thanks.—
I remain, yours respectfully,

SARAH JANE MUIRTH.
Dana Street, East Ballarat, 21st July 1874.
Lo Kwai Sang 罗快生

Background materials on the life and practice of Luo Kuai Sang come from the local newspaper the Ballarat Evening Post, the Australian Medical Journal and from promotional advertisements placed by Lo in several Ballarat English-language newspapers. According to the written certification of his medical qualifications, issued by the Acting Emigration Officer in Hongkong in 1871, Lo, who was then 35 years of age and a native of Chun Sing in southern China, was ‘duly qualified for the post of surgeon of a Chinese emigrant ship’.

Lo Kuai Sang arrived in Australia between the years 1871 and 1875. He set up his Chinese medical practice in South Ballarat at Number 10 Peel Street, as well in the city of Melbourne at 88 Great Napier Street, Fitzroy. Doctor Lo specialized in TCM internal medicine neike and used herbal therapy. He treated a wide range of conditions including ‘skin disorders, and all internal disorders of the Brain, lungs, Liver, Heart, Kidneys, Bowels, Intestines, Gravel in Bladder and Urinal Passages, Tumors in Stomach, Piles, Female Complaints and Irregularities...’. He was also able to treat consumption, asthma and gout.
At the height of the diphtheria epidemic in the Australian colony of Victoria Lo successfully treated many cases, which he classified into eighteen different varieties. He claimed to have treated successfully twenty eight cases (of diphtheria) ‘within two months’. He advised his prospective diphtheria patients to see him ‘immediately on the appearance of diphtheria thereby diminishing the danger of infection, and also saving pain, trouble and expenses’. In the above newspaper advertisement one can read testimonials of patients who benefited from the therapeutic skills of Doctor Lo.

Aside from running his two clinics, Lo also ran a herbal mail service. A reminder included in one of his advertisements states: ‘N.B.-Medicines with instructions sent to any part of the Colony’. In May 1875 Lo Kuai Sang was charged in the Ballarat County Court for ‘unlawfully using the title of Doctor of medicine’ in violation of the Medical Practitioner Statute of 1865. However, due to insufficient evidence, the case was dismissed.
THURSDAY, MAY 13, 1875.

Whatever may be the ultimate result of Mr Baird's scheme to Stock Lake Burrumbeet with fish, the public, at all events, will not suffer, whilst the probability is that they will be benefitted beyond what even the most sanguine believer in fish culture anticipates. Briefly described Mr Baird's scheme consists in securing a lease of the lake for 10 years at the nominal rental of £1 a year. He is then to expend £500 within three years, in stocking it with every description of the best and most suitable fish, and the shire councils interested are to satisfy themselves that the amount agreed upon has actually been laid out. At the present time there are only a few cod in the lake, and these the public may catch as fast as they like, and in any way they like, for Mr Baird proposes to supply their place with a far more valuable description of fish. The public will also be permitted to angle from the banks for the very fish which Mr Baird puts into the lake, and pleasure boats may be placed there for use without let or

worth if it were stocked in this way? It cannot be estimated, for no conception can be formed of the pleasure it would give sportsmen or the benefits which an unlimited supply of the best fish would confer not only upon Ballarat but Ararat, Stawell, and all the other large towns connected with the lake by rail. The leasing of a lake no doubt opens up a new question, but we fail to see what need there is for hesitation if the public are to be accorded, during the term of the lease, the whole of the privileges which they now enjoy and one or two others in addition. If this opportunity to stock Lake Burrumbeet be not taken advantage of, it will be an everlasting disgrace to the Minister of Lands and his colleagues, and a miserable reflection upon the intelligence of the community.

Kwai Sang, the Chinese doctor, was proceeded against at the Town Police Court today for practising medicine without being legally qualified. It was shown that he had attended a Mrs Giles at Gong Gong, but found her so low that he refused to take the case in hand until she had been seen by a European doctor. He afterwards sent out certain herbs, but Mrs Giles died whilst they were being prepared. It was proved that he received a fee of 7s. 6d., but the magistrate held that it was not satisfactorily shown that he was practising medicine, and the case was therefore struck out.
The History of Diphtheria in Traditional Chinese Medicine

In order to put the practice of TCM in the colony of Victoria into context I now turn to China, where, in the 19th century, orthodox and classical medical texts described the symptoms of the disease of diphtheria and their treatment. Diphtheria is referred to in Chinese medical texts by such names as the ‘white throat’ 白喉, ‘white putrid throat’ 白腐证, ‘white fungus’ 白菌, ‘white bandage throat’ 白缠喉, ‘throat obstruction’ 喉痹 and ‘contagious throat’ 痈喉. From 1785 till 1909 A Chronological table of the History of Chinese Medicine (Guo Ai Chun (1984), pp. 194-238) recorded twelve waves of ‘white throat’ epidemics in China. These records were based upon a description of the clinical symptoms of the disease in the medical classic Jade Key To the Layered Tower by Zheng Mei Jian, published in 1839.

During the late Ming and early Qing Dynasties a reconceptualization of what biomedicine generally refers to as infectious diseases occurred in China. The old concept referred to external factors of ‘wind,’ ‘cold,’ ‘heat,’ ‘dryness’ and ‘dampness’ as disease agents. For example, the Treatise on Injury From Cold by Zhang Zhong Jing (the ‘father of traditional Chinese medicine’) saw clinical patterns of fevers as brought about by extremes of cold factors and thus ‘warm and hot formulae’ (herbs, acupuncture etc.) were developed to counter this imbalance from cold.

During the period of the late Ming and early Qing dynasties medical practitioners and scholars like Wu You Xing increasingly found Zhang’s hot formulae ineffective against fever related conditions. Large number of people perished from different infectious diseases. Consequently, medical scholars questioned the wisdom of continuing the use of the old methods and concepts. As a result, a new school in TCM was born: the Wen Bing school, or the school of
warm febrile diseases.

The Wen Bing school sees fever-related infectious diseases as caused by a contagious, virulent Qi or yili Qi which can ‘stimulate/infect’ gan 感 one through the nose and the mouth. This virulent Qi then combines with heat or fire generated from within the body’s organ systems and acupuncture channel network. As a result, varied clinical patterns or zheng hou occur requiring different treatment methods and formulae. In the chapter on ‘Correcting Names’ in his book On Contagious Warm Diseases (1642), Wu You Xing, a member of the Wen bing school, used innovative metaphor to explain the nature of ‘infections or affections’ which occur in cases of contagion involving the yili Qi.

The Chinese word yi 疫 is translated here as ‘epidemic’ or ‘contagious’. It evolved from another Chinese word yi 役, meaning ‘servitude through labour’ lao yi 劳役, referring to a feudal practice by which every able-bodied member of a household took turns in the performance of labour servitude. Hence the word yi 疫 (‘being infected’ or ‘contagious’) assumed the meaning of members of a household taking turns in being ‘stimulated/infected’ gan 感 by the disease.

In dealing with the varied clinical patterns of Wen bing advocates of this school developed the use of ‘cooling’ or ‘cold formulae’ instead of the hot or warm remedies prescribed by the shang han pai (the ‘School of Injury from Cold’). Hence the treatment of diphtheria or ‘white throat,’ a Wen bing disease recognized by Chinese medical scholars in 19th century China, underwent radical change over the years.
Zheng Han 郑翰, a hereditary practitioner of TCM, referred to diphtheria as ‘white putrid throat’ in his book *Sequel to the Key To the Layered Tower*, written in 1804. He observed that diphtheria is contagious and affects mostly children. He attributes the cause of the disease to a deficiency of the lung and kidney organ systems, so that the patient ‘gets stimulated /infected’ gan shou 背受 by the ‘seasonal dryness Qi’ tian shi zao Qi zhi ling, or the virulent and contagious yili Qi which ‘decomposes the throat’. Using the Four Examination *si zhen* method of observing, listening and smelling, inquiring and palpating the pulse, Zheng describes the disease:

He who knows upon observing is a higher worker. When an infant is injured by the factor of Dryness, and then becomes affected by the white putrid throat, the facial complexion turns pale; there is a bluish tinge on the nose which eventually becomes blocked and produces a coarse thick sound; the tips of the fingers turn cold; the right pulse is rapid with no strength.

The Clinical Pattern is considered slight when it (white putrid matter) ensues from the sides of the throat. It is more severe when the ‘whiteness’ spreads through the throat and passages of the throat. The clinical pattern becomes severe when the ‘white bandage’ spreads all over and inside the lungs.

The Clinical Pattern not only manifests in the throat but also in the choking, hoarse voice, blocked nose and hurriedly catching one’s Qi is due to the white putrid material stickily blocking from within.

Then using TCM Conceptual Templates, diphtheria or white putrid throat is categorized into variations of different clinical patterns. Zheng wrote:
White putrid throat can be categorized into cold, hot, deficient and excess clinical patterns. Not all of its clinical manifestation may be attributed to Dryness. There is white putrid throat which arises from the build-up of wind and cold; there are kinds resulting from invasion from wind-heat; there are those brought about by ‘suffocation and heat,’ from overindulgence in roasted meats, rich, hot and pungent flavors of food; there are those excess type clinical patterns with signs of deficiency, and deficient clinical patterns combined with excess; there are clinical patterns which are deficient but which are very similar to excess types.

Faced with the presenting clinical pattern of white throat, Zheng Han devised a formula of throat insufflation of herbal powder. The powder is applied externally on the white putrid matter. Another formula of materia medica may also be prescribed for oral administration. In his book, Zheng lists materia medica which are effective against the white putrid throat, and those which are ineffective. He singled out such effective minerals as chalcanthite, alum and mirabilite. This relatively innovative practice is the one which seems to have been so successful in the gold towns of Victoria of the 1870s.

**A Controversy**

During the early 1870s, as the diphtheria epidemic raged through the colony of Victoria, a controversy erupted around the success of a group of Chinese herbalists in treating the disease. News of the Chinese herbalists’ success in dealing with a disease very new to many of the British colonists spread quickly through the colony. This fired the curiosity of the colonists and practitioners of other medical traditions. A letter published in July 1870 in the *Australian Medical Journal* went as follows:
My Dear Sir,

You have on former occasions been very kind to me, and this emboldens me to ask from you another favor. Diphtheria has been very prevalent here, and most fatal in its effects. The disease was equally virulent at Vaughan, where I formerly resided, and where my oldest son died of it. There was a Chinese doctor resident at Vaughan, who went about amongst the poorest at first, and latterly amongst the better class, blowing a powder on the diphtheric pellicles of those afflicted, and I am compelled to admit, through a world of prejudice, with great advantage to his clients. I have spoken to several sensible, intelligent though unprofessional people, who all profoundly believe that there is "something in it."

I have procured some of "John's" magic powder, and if it so be, that there is anything in it. I hope that you will have the powder examined by some expert - I mean the parcel therefrom and not permit "John" to have a monopoly of the glad tidings. Trusting that you will pardon my intruding on your valuable time.

I am, my dear Sir, yours most truly.

J. Burn Malcolm, Hargreaves Street,

Castlemaine, June 25th, 1870. 26

Considering the severity of the diphtheria epidemic and the mounting interest in the Chinese diphtheria powder, on August 13, 1874, the Victorian Parliament debated 27 a proposal to run a trial on the efficacy of the Chinese diphtheria powder. The Honorable Mr Campbell, representing the district of Ararat,

called the attention of the Government to the prevalence of diphtheria and the high mortality of which he said, was very serious, averaging 400-500 per annum. The disease had baffled medical science to a great extent, and begged to suggest the expediency of the Government making trial of a remedy which had been found effectual in his own district.
The Honorable Mr Campbell said that he ‘could see no reason why in the vast empire of China there should not be known some remedies which might be of extreme value to this colony’.

He told Parliament that ‘communication was opened with the late Chief Secretary on the subject of the remedy, and a supply of the medicine was placed in the hands of the Chief Medical Officer’.

Campbell proposed that a trial of the Chinese diphtheria powder be conducted by the Chinese herbalist Ah Sue, who should be employed by the government to run the project. He specifically proposed that Ah Sue should be allowed to treat cases of diphtheria using his own treatment and be ‘allowed to administer the remedy himself’. At the same time, the Campbell suggested that the trial be under the inspection of medical men ‘but without (their) interference’.

Campbell wanted the Government to purchase Ah Sue’s remedy if the trial proved to be successful. The urgency of the proposed trial was enhanced by the fact that Ah Sue was preparing to leave the country for China. Even before the proposed trial on the Chinese diphtheria powder had been conducted, Campbell stated before the Victorian Parliament that he could produce ‘proof’ of the efficacy of the remedy. In this regard, he offered himself as a ‘courageous witness’ who would willingly testify to the efficacy of the diphtheria remedy. He said that he knew of a child ‘who died from diphtheria last year after being under the treatment of a European doctor, and of another child in the same family being attacked with the disease, and being effectually cured within a few days after the application of the Chinese remedy’.
Another 'courageous witness' was the father of a child successfully treated by the Chinese herbalist Ah Sue. His testimony was contained in a letter read by Campbell to Parliament:

I am requested by Ah Lue (Ah Sue), the Chinese surgeon, to write to you to let you know, that he attended one of my children who was attacked with diphtheria, and that after attending her for two days, she has recovered and is now well, with the exception of being weak. I had one child, who was taken ill about the same time, die just the same day before the Chinaman came to me. Therefore I firmly believe that he was the means of saving this child's life. Both Dr. Law and Dr. Galbraith saw this child, and pronounced it to be a clear case of diphtheria.

The Honorable Mr Kerford, the Government representative in Parliament, responded to Mr. Campbell's proposal by claiming difficulties in obtaining subjects for the trial. He revealed that a quantity of Ah Sue's diphtheria insufflation powder was handed over to the Chief Medical Officer, Mr McCrea (then a member of the Diphtheria Commission), who was to investigate the efficacy of the powder. McCrea in turn handed the diphtheria powder over to 'medical gentlemen' practising in Castlemaine and Williamstown who trialled them; but they had 'not proved efficacious'. The chief medical officer gave no details, however, as to the kind of trial conducted on the diphtheria powder. In his closing speech Kerford said, in reference to the diphtheria powder, that the chief medical officer Doctor McCrea would 'take further opportunities of ascertaining its value'.

'The Trial'

Dr. John Blair, the surgeon to the Alfred Hospital in Melbourne, eventually took on the task of 'ascertaining the value' of the diphtheria insufflation powder. Using the resources of the
Medical Society of Victoria, Dr. Blair secured four packets of the diphtheria powder prescribed by Ah Sue and Fee Mun. Then, securing the laboratory facilities of the Technology Museum in Melbourne, he had the contents of the powder ‘qualitatively examined’.

On October 7, 1874, on the occasion of the monthly meeting of the Medical Society of Victoria (MSV), Doctor Blair presented the results of the laboratory analysis performed within the Technology Museum.

No. 1 (herbal packet ed.) consists of a mixture of camphor and musk, carbonate of lime, nitrate of potash, with traces of chloride and sulphate of sodium.

No.2 powder ‘used by Ah Sue’ is a mixture of musk, camphor, nitrate of potash, chlorate of potash, sulphate of copper and carbonate of lime.

No.3 ‘Ah Sue’ consists of camphor and sulphate of copper, with a small quantity of chloride and sulphate of zinc, and carbonate of lime.

No.4 ‘Fee Mun’, consists of musk, camphor, alum and sulphate of sodium.

Not surprisingly, Dr. Blair concluded that ‘the Chinaman powder contains nothing new’. He said: ‘We know the nature of their composition, and can easily comprehend the mode of their action’. The powder was ‘composed of alum, carbonate of lime, nitrate of potash, sulphate of copper, carbonate of lime, nitrate and chlorate of potash, with camphor and musk added to give them an odour,’ and ‘blown unto the fauces would necessarily act as astringents, caustics or eschariotics’. He went on to say that ‘in the hands of an ignorant man, these local applications would be productive of a grievous amount of harm’.
After putting the Chinese diphtheria powder on trial, Blair then placed the Chinese herbalists on trial. After his ‘technical interpretation’ of the ‘facts’ emanating from the Technology Museum, Blair then followed with personal and racist attacks against the three Chinese herbalists Ah Sue, Fee Mun and Lo Kuai Sang. He called Ah Sue an ‘ignorant pretender’ who has ‘received no medical Chinese education whatsoever,’ and that the powder he used consisted of substances for everyday use for diseases of the throat which he picked up from the local chemist and then ‘foisted’ his cure and his ‘bamboo cane down the throats of a gullible public’. He referred to Lo Kuai Sang as a ‘Chinese supplicant’ who ‘begs to state that he possess the cure as well, and is prepared at any moment to explain the causation, and practically proved it to be correct’. Having ‘unravelled’ the supposed ‘native cunning’ of the Chinese herbalists, Blair then warned the ‘gullible public,’ members of Parliament and the press against looking up to the herbalists as public benefactor: ‘If every blatant empiric is to be protégé of a member of Parliament, the subject of a panegyric by a certain section of the press, to be held up as a public benefactor, and a fit and proper person to be rewarded by the state, then shall his name be legion’.

Eighteen people, mainly orthodox medical practitioners, heard Doctor Blair’s presentation on ‘The Chinese Specifics for Diphtheria’. After Blair’s presentation some made the comment that they should not reject remedies just because of criticism from empirics. Others made the observation that the white powder among the Chinese remedies was the most efficacious, and one speaker noted that the sulfate of copper was also used by the Egyptians in the treatment of what he suspected to be diphtheria. However, none among those present in the monthly meeting of the Medical Society of Victoria questioned Dr. Blair’s capacity to ‘evaluate’ the efficacy of the diphtheria insufflation powder.
In May 1875, Lo Kuai Sang and another Chinese herbalist, Cheong Kee Chun, both from Ballarat, were tried for unlawfully using the title doctor in violation of the Medical Practitioner Statute of 1865. Lo was acquitted of the charge while Cheong received a conviction and was fined, including court costs or, in default thereof, imprisonment for a month. This seems to be the direct outcome of Dr. Blairs' 'trial'. This, however, was not the end of the matter. The episode seems to have been behind a subsequent attempt to amend the Medical Practitioners Act in 1878. I will come to that episode later, but at this point in my narrative I want to examine Doctor Blairs' evaluation of the efficacy of a TCM treatment in 1874, for the issue of evaluation remains controversial to this day.

In 1874, Doctor Blair and his supporters no doubt saw themselves as developing and expressing a set of standards for medical practice and health care in the developing colony of Victoria. Given the complex situation of health care at that time, his application of standards was recognizable to many as interested and biased. It was recognizable to many as a form of standardization that amounted to domination by the emergent empiric school of medical practice. This school was represented by a particular elite in the colony at that time who benefited from legislation forbidding the practice of medicine to anyone who was not 'a bachelor of medicine in some university in the United Kingdom or Ireland, a member of the Apothecaries Society of London, a member of the College of Physicians or Surgeons in the United Kingdom or Ireland, or had served in the sea or land service (of the British Empire)'.

Standards seem to be derived from criteria which present themselves as truths, the implication being that the sole thing necessary is the impartial application of these standards. In this thesis I present an alternative notion of standards and criteria. I see standards as heterogeneous
assemblages: ‘tools’ that are co-produced with the ‘jobs’ they do. Instead of deriving standards from criteria, this view presents criteria as deriving from standards which have ‘clotted’ in an arena of negotiation and practice:

“tools”, “jobs”, and the “rightness,” of the tools for the jobs are each and all situationally constructed. That is, they are all co-constructed, mutually articulated. 31

This gives a quite different account of what standards are. It identifies their roles and functions in a knowledge tradition. In this view, the jobs that standards and criteria do in a knowledge system have to do with managing the local/systemic tension implicit in any knowledge system. It is not that the system of traditional Chinese medical practice did not have standards, nor that it was not sensitive to standardization. It is that at this point in Australia’s history these standards could not be applied together with those that officially regulated practices of medicine and health care. There needs to be a lot of translation work on both sides if standards from alternative traditions are to be articulated. That was the work that satisfied patients were doing with their testimony, work that was taken up by their parliamentary representatives. But equally work must be done if the standards are to be dis-articulated. That was the work of Dr. Blair’s ‘trial’. It opposed the work of those who were seeking to articulate the standards of TCM practice in the colony of Victoria and it used the resources of the emerging scientific institutions of the colony. This articulation, or refusal to articulate standards, necessarily depends on political struggles over who sets the agenda, who can speak and be heard, and so who has the influence in the arena of the struggle. But as we have seen it is not just a matter of politics. It involves materials and practices.
DIPHTHERIA.

Mr. CAMPBELL called the attention of the Government to the prevalence of diphtheria, the mortality from which, he said, was very serious, averaging 400 or 500 per annum. The disease had baffled medical science to a great extent, and he begged to suggest the expediency of the Government making trial of a remedy which had been found effectual in his own district. He would not have ventured to make this suggestion unless he had something like proof of the efficacy of the remedy. It was made use of by Ah Luk, a Chinese surgeon, in the Ararat district last winter. Upwards of 30 children were subjected to the treatment, which, in every case, was found effectual. He had received a letter on the subject from a well-known resident of Ararat, who was formerly mayor of that borough, and who said—

"I am requested by Ah Luk, the Chinese surgeon, to write to you to let you know, that he attended one of my children who was attacked with diphtheria, and that, after attending her for two days, she has recovered and is now well, with the exception of being weak."

"I had one child, who was taken ill about the same time, die just the day before the Chinaman came to me. Therefore I firmly believe that he was the means of saving this child's life."

"Both Dr. Lew and Dr. Gallbraith saw this child, and pronounced it to be a clear case of diphtheria."

He (Mr. Campbell) knew of a child who died from diphtheria last year after being under the treatment of a European doctor, and of another child in the same family being attacked with the disease, and being effectually cared within a few days after the application of the Chinese remedy."
The *Australian Medical Journal* 1874

A segment of page 292 of the Australian Medical Journal of 7 October 1874, which features the introduction to the result of the trial performed by Doctor John Blair from the Alfred Hospital in Melbourne on the efficacy of Ah Sue’s and Fee Mun’s anti-diphtheria herbal insufflation powder.

**THE CHINESE SPECIFICS FOR DIPHTHERIA**
By John Blair, M.S. 8th, F.A.C.B. R.E.
Surgeon in the Alfred Hospital, Melbourne.

The idea mentioned to me, of the use of insufflation, has been suggested for this disease by the recent action of the Government to the introduction of this remedy to the treatment of the disease. As a member of the Legislature, when the case was brought before the attention of the Government, I was most willing to take some personal action for the purpose. I am glad to say that the course which has been followed by the Legislature has been successful.

A month or two ago, another member of the house, with the assistance of others, called the attention of the Government, to the prevalence of diphtheria in the district, and suggested the necessity of trying a remedy which had been found effective. By personal knowledge. The preparation had been very successful in the hands of a Chinese doctor in a great many cases, and the member of the Legislature acted with good results.

I referred the following communication with three samples of the so-called "specific," from Dr. Maconn, to the director. After the samples, which I presented, from another source, to part of the Assembly, a very cordial resolution was passed, for the use of the district.

Ararat, August 1874.

Dr. Blair.

"My dear Sir:—I see by the local paper to-day that an inquiry was asked last night, in the Assembly, into the merits of a remedy for diphtheria, used by a Chinese named Ah Sue, in the district."
Exhibit 3

More than seventy years ago, in 1925, a controversy emerged in Victoria over the introduction of the Pharmaceutical Chemist Bill in the Victorian Parliament, which attempted to limit the prescription of medicinal herbs to chemists. The person who introduced the Bill was a biomedical health practitioner and member of Parliament called Doctor Argyle, a Government supporter. 32 The Pharmaceutical Chemist Bill of 1925 provided as follows:

2.(1) Save as is otherwise provided in the Medical Acts, any person (not being a registered pharmaceutical chemist)-

(a) who (whether in an open shop or elsewhere) practises as or carries on or attempts to carry on business as a chemist; or

(b) who in any place whatsoever acts or pretends to act on any occasion as a chemist; or

(c) who in any place whatsoever for fee or reward-

(i) dispenses; or

(ii) compounds and supplies; or

(iii) prescribes whether orally or in writing; or

(iv) prescribes as aforesaid and supplies—any drug or medicine—shall be guilty of an offence and shall for every such offence be liable for a penalty of not more than Fifty pounds or to imprisonment for a term of not more than six months. 33

The Bill defines ‘practising as a chemist’ as the compounding, supplying and making up for a fee or any prescription by a legally qualified medical practitioner, poisonous substances, preparations, drugs or combination of drugs. Drugs are defined as ‘any substance used as medicine or in the composition or preparation of medicines whether for internal or external
use'.

The Bill went through the First Reading without any significant discussion. On the Second Reading, however, there was heated debate on many issues, including the qualifications of Chinese medicine practitioners and Victorian herbalists in general, as well as the use of their medical tools - the *yao* in the case of the Chinese herbalists and 'herbs' in the case of herbalists in general.

During the Second Reading of the Bill, Doctor Argyle denied the legitimacy both of the qualifications of practitioners of herbalism and the nature of their practice. He concentrated on the most marginalized section of the Australian Herbalist Association, the Chinese herbalists (three of whom, according to Argyle, were members of the Association). In directing his attack upon Chinese herbal medicine, he concentrated his assault upon the least understood and supposedly most 'seamy' aspect of their practice i.e. their use of animal *yao*. Here is a section from the Victorian Hansard which documents Argyle's portrayal of TCM practice as 'abominable,' with its use of bats, magpies, pigeons, leopards, 'dragon spittle' and 'animal excrement'.

Dr. Argyle: I now come to the Chinese. They use the most extraordinary things in medicine. The following extracts from Frederick Porter Smith's book, to which I have already referred: -

**BAT**

This animal is very common in China, being

a frequent visitor of foreign houses in quest
of mosquitoes, which it devours most satisfactorily. As it is supposed to feed upon the stalactites which are frequently met with in the caves which it is wont to hibernate in, its medicinal properties are rated at considerable value by the Chinese. From its asserted extreme longevity and its excellent sight, this curious creature is credited by the Chinese with the power of conveying these desirable qualities to those who consume the disgusting preparations made from all parts of its body.

Mr. Cain-That will not keep the people away from the Chinese herbalists.
Dr. Argyle- The people who keep away from the Chinese herbalists are the Chinese themselves. They always go to the European doctors.

**DUNG**

*Common Sparrow*

The excrement of the common house sparrow is mixed with peppercorns, powdered, and then mixed up by means of spirits of wine. This mess is used to diminish the pain of opening abscesses, the thick compound being first applied for some time to the skin. It is also applied to the wounds caused by arrowheads or shot to diminish the pain of extracting the foreign bodies.

*Magpies*

The nest of the magpie is burnt and the ashes given in nervous diseases, fluxes and other disease. The dung of a species of
coturnix is perhaps mixed with the dung, which comes in the shape of small, oblong, round or conical pellets, of a black colour, very light, easily broken, and having a bust or sweetish flavor.

Mr. Prendergast- What is the difference between taking a piece of an animal to cure one disease and using thyroid gland from an animal for another disease?

Dr. Argyle- I have not noticed yet that any excrement is used in our work. It is said to be cordial, sedative, anti-periodic, astringent, antihelmintic, and vulnerary, with almost any other quality that could be enumerated. It is one of the remedies for leprosy, being applied to the benumbed parts in the form of ointment. The brain of the magpie is eaten to increase the thinking power.

White Pigeon

The dung of the wild pigeon is used as a veterinary medicine, and is credited with discutient, deobstruent, alternative, antihelmintic, antiscorbutic, and vulnerary properties. The name “left coiling dragon” is given to this disgusting article, from the assumed fact that the excrement which, in dropping from the bird, coils itself from left to right, wonder-fully efficient as a drug.
Dragon's Spittle

A costly, odorous, light-yellow, gummy substance found floating on the sea, or procured from the belly of some large fish in the Indian Ocean, is described in such a particular way as to leave no doubt that ambergris is meant. A similar substance is said to be the egg of the dragon, or a kind of sea-serpent. This drug is of greyish or yellowish colour according to Chinese writers, and is asserted to have marvellous discutient, vulnerary, and healing properties.

Leopard

The claws and bones of these animals are used in medicine as a tonic or prophylactic remedy. They are sometimes burnt and the ashes taken as a remedy in urinary disorders. The bones sold are seldom genuine.

Mr. Blackburn- Is this the treatment the British Government allows natives to receive in Tong Wah Hospital?

Dr. Argyle- I cannot say. I can only say that this is from the textbook from which the Herbalist's Association in Victoria say their Chinese members get their education. The knowledge of herbs and their functions has not progressed to any remarkable degree during the past century...


This was how the blackening of TCM practice occurred during the 1920's in Melbourne, Australia. Doctor Argyle, representing the biomedical health practitioners in the Victorian Parliament, had 'not noticed yet that any excrement is used' in their medical work, yet
proceeded to ‘translate’ the *yao*, the medical tool of the Chinese herbalist, as ‘animal excrement’. In order to portray Chinese medicine practice as ‘stinking,’ filthy and backward, most of the *yao* he cited were of this sort. Argyle, a practitioner of biomedicine, a prominent member of the government of the day and as such a wielder of considerable political power, but with a very narrow understanding of TCM, failed to ‘translate’ interactively with the health traditions of traditional Chinese medicine.

The selectivity of this presentation of TCM practice, and its self-serving motivation, are clearly evident to us today. Argyle highlighted only animal materia medica from Porter Smith’s book, despite the fact that, even during this time, the most numerous materia medica that the Chinese herbalists used were of plant origin. Take note as well of the technical terminology such as ‘discutient,’ ‘vulnerary’ and ‘deobstruent’ used to describe the medical value of these substances. Like the word ‘aphrodisiac,’ they are foreign to the technical terminology used in TCM.

The aim was to obviously to devalue the practice of herbalism and herbalists in general, thereby paving the way for ‘respectable’ European chemists to take over the prescribing of herbal medicine. Marginalized, devalued and blackened, the *yao* as a medical tool and its practitioners were ‘silenced’ in the political representative space of the Victorian Parliament. According to Doctor Argyle, he received communications from the the three Chinese herbalists who were members of the Australian Herbalists Association, offering their services in preparing the legislation. He said, however, that ‘I did not accept their offer’ (p. 1910), again demonstrating his refusal to translate symmetrically with TCM. Interestingly, these questions still arise. Are the herbal preparations offered by TCM really just ‘animal
excrement,' as Argyle seventy-five years ago wanted us to believe? As tools of medicine, how effective are they? And related to the problem of yao efficacy is the important issue of the values that should be used in assessing its efficacy. Are we going to use the values of science and chemistry, as used by Doctor John Blair from the Royal Alfred Hospital more than a century ago, to measure the efficacy of yao? And, finally, how do we resolve the question of endangered species among the yao? I consider the issues surrounding herbal yao in Chapter 5.

Within the Victorian Parliament, enlightened parliamentarians and members of the Opposition like Mr. Cain put up a principled and tenacious stand against the passage of the Bill. Outside Parliament, too, there was a wave of opposition to the Bill. Six thousand patients of members of the Australian Herbalist Association drafted, signed and sent a petition to the Victorian Parliament urging members of Parliament to reject the Bill. As signed by Lulu A. Eggleston from Orrong Road, Caulfield, the petition reads:

The humble petition of the undersigned electors of the State of Victoria respectfully showeth:

(1) That your petitioners view with alarm the published reports that genuine herbal practitioners are to be refused the right to continue the practice of prescribing or recommending herbal treatments in cases of sickness.

(2) That your petitioners at divers times and places had experience of herbal treatment to their advantage and benefit in bodily health.

(3) That your petitioners believe it will be to the advantage of the sick and suffering in this State if members of the Australian Herbalists Association be given every facility to carry on their profession.
Your petitioners therefore respectfully pray that no action be taken by Parliament to the detriment of the above association.\footnote{14}

On December 8, 1925, in the face of strong opposition to the Bill and with the chemists themselves abandoning support for the proposed legislation, both the Government and the Opposition agreed to withdraw the Bill from further debate in Parliament. As a result, TCM practice and the yao escaped marginalization and domination, and in the subsequent course of events achieve clinical legitimation that eventually gave it ‘poli
tico-legal legitimation’.\footnote{15}

Three quarters of a century later, in the same representative space of the Victorian Parliament, the ‘silenced’ voices of the yao and TCM can now be heard. The current Government has introduced and passed the Chinese Medicine Registration Act 2000, which establishes the Chinese Medicine Registration Board, the first authority to base itself firmly within the practice of TCM itself, outside China. At the same time, with the increasing openness of biomedical health practitioners in Australia, evidenced by the holding of a TCM Seminar organized within a biomedical institutional space, The Royal Children’s Hospital in Melbourne, a shared symmetrical translation space between TCM and biomedicine is emerging.
Chapter 3: Glimpses of an Australian

5. Nanjing Pharmacology College, *Yao Ji Xue* [Study on Yao Preparations], Renmin weisheng chubanshe Beijing, 1978, p. 4
6. Information on the Goon brothers was given to me orally by Mr Martin Louey, the director of the Chinese Cultural Centre in Melbourne (February 1999).
8. ibid. p. 89


17. ibid., p. 63
20. Ballarat Evening Post, 28/10/1874
21. Extremes or disharmony in climactic factors of wind, heat, dampness, cold, dryness during the four seasons can bring about disharmony and imbalance in human health. These climatic factors metaphorically capture the clinical patterns of diseases brought about by these disease agents.
22. I consider Qi (pronounced as chee) an ontological entity i.e. a set of structural categories which are things in themselves. It is an imaginary implicit in TCM practice. In its early uses, Qi refers to the "floating clouds," the 'breath' and the 'space' between heaven and earth. Origin stories have it that the universe emerged from cosmological confusion as the light, bright, Yang Qi ascended to become heaven, while the dark, heavy Yin descended to become earth. Thus Qi is a translating and mediating element in the configuration of the Yin and Yang.
Chapter 3: Glimpses of an Australian

23 Zhejiang Provincial TCM Research Centre, *Wen yi lun ping zhu* [Treatise on pestilence: evaluation and annotations], Renmin weisheng chubanshe, Beijing, 1985, pp.255-257 (The original book, *Wen yi lun*, was written by Wu You Xing in 1642.)

24 Zheng Han, ‘Chong Lou Yuyao Xu Pian’ [Sequel to the Key To the Layered Tower], in Qiu Qing Yuan (ed.) *Mi Ben Yi xue Congshu*, [Collection of Secret Medical Texts, Volume 10], Shanghai Book Store, Shanghai, 1804, pp. 78, 82.

25 Conceptual templates are exemplars or conceptual tools used to assemble complicated signs and symptoms of diseases into clinical patterns or *zheng hou*. Examples are the Eight Principal Patterns *ba gang bian zheng*, the Patterns of Six Divisions *Liu Jing Bian Zheng*, Patterns of Five Visceral and Six Hollow Organs *Wu Zang Liu Fu Bian Zheng*, etc. I have taken this notion of templates from David Turnbull, who developed the idea of templates as models or patterns used to shape the stones assembled to construct the Gothic cathedrals in medieval Europe. Through the medium of templates it was possible to organize large numbers of men to build these cathedrals. David Turnbull refers to templates as ‘exemplars’ which are ‘accepted, concrete, local, indexical solutions’.

26 *Australian Medical Journal*, July 1870, pp. 221-223.


29 Bills passed in the Victorian Parliament included the Medical Practitioner Acts of 1861 and 1908, entrenching the medical dominance in Victoria of biomedical health practitioners. Biomedical practitioners were afforded exclusive use of titles, the right to sue for non-payment of fees and hold government official positions (Willis p.52). Anyone who was not a “bachelor of medicine in some university in the United Kingdom or Ireland, a member of the Apothecaries Society of London, member of the College of Physicians or surgeons in the United Kingdom or Ireland, had served in the sea or land service’ and called himself a ‘doctor’ was in contravention of the law.

30 Evan Willis, *Medical Dominance: The Division of Labour In Australian Health Care*, George Allen & Unwin, Sydney, 1983, p. 47. These were ‘qualifications’ which the NSW Medical Board established for someone to be legally qualified to practice medicine in 1838 in the colony in Victoria and NSW following the English Act.


32 Victoria, *Parliamentary Debate*, Legislative Council, 28th October 1925, 1905 (Dr. Argyle, Chief Secretary)

33 Pharmaceutical Chemist Bill 1925 (Victoria)

34 Victoria, *Parliamentary Debates*, Legislative Council, 8th July 1925, 29 (Petition)

35 Willis sees the legitimation of health practices in two ways: clinical and politico-legal legitimation. In the case of clinical legitimation, a particular health practice is legitimated ‘on the job, in the day-to-day routine performance of its work in the practical solving or alleviation of the health problems its patients present,’ while politico-legal legitimation ‘is achieved by an occupation through the education of it’s practitioners ...into a paradigm of occupational knowledge...culminating in the attainment of a recognized degree as the basis for occupation registration, certifying the acquisition of knowledge necessary to practise that occupation.’ (Evan Willis, ‘Complementary Healers,’ in *Sociology of Health and Illness*, Macmillan, Australia, 1989, pp. 259-279)
Appendix 1 to Chapter 3

Chapter 4: The TCM Body in A Translating Knowledge Space

Bodies... are not born; they are made. Bodies have been as thoroughly denaturalised as sign, context and time...One is not born an organism. Organisms are made. They are constructs of a world-changing kind... Bodies as objects of knowledge are material-semiotic generative nodes. Their boundaries materialise in social interactions; ‘Objects’ like bodies do not pre-exist as such. Scientific objectivity (the siting/sighting of objects) is not about disengaged discovery, but about mutual and usually unequal structuring...[Donna J. Haraway, *Simians, Cyborgs, and Women: The Reinvention of Nature* (1991)]

Ballarat, Bodies, Maps & Icons

In the gold-mining town of Ballarat in the colony of Victoria over a century ago, Yee Quock Ping, a naturalised British subject who came to Australia from southern China and the ‘first Chinese doctor to seek registration in Victoria’² (possibly Australia), figured in three court inquests' conducted on the death of three colonists. The first case involved a two year old child who supposedly died of dysentery. During the inquest, Yee, speaking through an interpreter, stated: ‘I place my finger on the vein on the back of the forefinger of the patient, and I can tell whether there is wind or water in the belly’.

The second inquest involved a storekeeper who supposedly died of pneumonia. Yee testified during the inquest that the person died of disease of the liver, but a post-mortem
conducted subsequently disclosed no disease of the liver at all. A European doctor by the name of Mr. Nicholson supposedly contradicted Yee’s ‘diagnosis’ and confirmed the results of the autopsy.

The third case involved a woman suffering from severe uterine bleeding for two to three days following a miscarriage. Since Yee was not available, another Chinese medicine practitioner, Lo Kwai Seng, attended the patient. Lo prescribed herbs for the patient and then advised the latter to send for an ‘English doctor’. However, when the English doctor arrived, the woman had already succumbed from severe loss of blood and had passed away. A post-mortem examination revealed a ‘flaccid uterus filled with grumous blood’.

These cases are instances of ‘maps’ or ‘icons’ used in structuring bodily boundaries. Obviously, when Yee Quock Ping placed his finger on the side of the forefinger of the infant he was using a different map or icon in ‘structuring’ and constructing the ‘wind or water in the belly’. He was also performing a similar ‘map’ or ‘icon’ when he structured and constructed ‘disease of the liver’ as the cause of death.

However, at the historical stage that colonial Victoria was in, Yee’s map and icon are no match for the anatomical map and icon which generated the dissection and ‘sighting’ of lifeless bodies. With these a decision was made on how these bodies suffered from illness and how they died. The baby died from ‘dysentery,’ the storekeeper passed away from ‘pneumonia’ and the woman suffering from miscarriage died from a ‘flaccid uterus filled with grumous blood’. Yee’s map or icon was seen as illegitimate.
Does TCM Have a Body?

A century and a half later the Victorian State Parliament passed the Chinese Medicine Registration Bill 2000. Australian descendants of Yee Quock Ping are now being registered as traditional Chinese medicine (TCM) practitioners with legal status. It is thus very important to ask some vital questions. As a body of medical knowledge constructed over a period of four millennia in China and over a century and a half here in Australia, does traditional Chinese medicine (TCM) have a body? Does it have its own map or icon that structures the body? Putting it in more concrete terms, does TCM have a body that can be seen, touched, heard, interrogated i.e. a physical body? If it has a body, what does it look like? Is it similar to Western biomedicine bodies? Does it have a heart, liver, stomach, a brain? Or is the TCM body just an amorphous collection of unseen energy or functions?

Hidemi Ishida, an assistant professor at Yahata University in Kitakyushu, Japan, looking at two different configurations of the body depicted in ancient Chinese chart illustrations of the inner organs, sees the body as ‘flowing bodies’ which ‘together with the flowing mind circulates according to the ways of the mind, whose main agents are the will and the intention and whose channels are the conduits of the flowing body’. Judith Farquhar sees a ‘multiplicity of Chinese medical bodies’. She sees the body as ‘multiple in the sense that no one rendering can diagram the whole body in cardinal and reticular tracts’. She contends that ‘no biomedical illustrator ever attempted to capture “the body” in one picture’.

However, Professor Nathan Sivin, who has a chair in Chinese Culture and of the History of Science at the University of Pennsylvania, and who is a world authority on Chinese medicine
thinks the Chinese ‘didn’t have bodies’. In a lecture he delivered at the University of New South Wales in November 12, 1998 entitled ‘Why didn’t Chinese have bodies?’ Sivin said that ‘the shen (body 身) has remained until modern times a web of relationships and ideals, more than just physical’. The ‘body’ conceived over four millennia of clinical practice is an ‘integration’ or ‘Han synthesis’ of the triad of the ancient Chinese conception of the cosmos (yin and yang and five phases) and the bureaucracy, and from these two arise a hierarchical bureaucratic ‘bodily pattern’. Quoting from the Neijing, which he rendered into English, Sivin summed up the supposed ‘Chinese amorphous body’ as an ‘internal bureaucracy’ consisting of ‘functional systems’. In his translation and interpretation of the Neijing he stated that the cardiac system is the office of the monarch, the pulmonary system is the office of the minister-mentors, the hepatic system is the office of the general, the gall bladder system is the office of the rectifiers.

Within this web of bureaucratic functions and systems, the Chinese indeed lost their bodies. In short, the ‘Chinese body’ was pigeonholed.

‘Orbs,’ ‘Structure/Functions’ and Modernity

While professing to disown any metaphorical content to his attribution of a notion of an amorphous body to Chinese medicine, Sivin’s projection is in fact a continuation of the whole project of ‘colonising’ the Chinese body and giving it a ‘thoroughly modern body’. The anatomical map and icon is again holding sway. In the preface he wrote for Manfred Porkert’s book Theoretical Foundations of Chinese Medicine in 1971, Sivin referred to
Dr. Porkert's insistence that the classical understanding of the interior of the body, which he calls "orbisiconography," is not the counterpart of Western anatomy, but its antithesis. Anatomy is concerned with the organism as a structure of parts, and orbisiconography (tsang-hsiang) with the dynamic interplay of what is best described as a number of functional systems. Any normal Chinese-English dictionary, for instance, will define 肝 simply as "liver". In medicine (as opposed to, say, cooking) this word seldom refers to the physical organ, but rather energetic sphere ("orb") which the organ serves as material substratum. Each orb is defined not by physical properties, but by its specific roles in the processing, storage and distribution of vital energy and thus the maintenance of life. 9

Undoubtedly, the rationale behind 'disembodying' traditional Chinese medicine is to provide in its stead a new modern body consisting of 'energic spheres' called 'orbs'. Having this disembodied 'new body,' however, TCM is forbidden to claim a physical body of its own. It cannot have a real liver, lungs, kidneys or brain. Physicality, materiality and the authority to designate anatomical parts are vested in science-based biomedicine. And to do this, TCM must relinquish its own metaphorical commitments and see the body instead according to the Western scientific anatomical map and icon.

This confusion about the notion of a physical body in TCM is in turn reflected in textbooks currently used for TCM education in universities in the West and in China. In one of these textbooks it is stated:

The tendency of Chinese thought is to seek out dynamic functional activity rather than to look for the fixed somatic structures that perform the activities. Because of this, the Chinese have no system of anatomy comparable to that of the West. Thus for example, the Organ known as the Liver
is for the Chinese very different from the Western Liver. The Chinese liver
is defined first by the functions associated with it, the Western liver by
its physical structure. 10

A similar point of view is found in the introductory chapter to a translation of a contemporary
Chinese acupuncture book published in Mainland China and used as a textbook for most
acupuncture schools in the West, Acupuncture: A Comprehensive Text:

Perhaps the salient characteristic of the Chinese conception of the
Organs (to a modern Westerner) is the lack of emphasis to the physical
structure. Although many of the terms for the organs are similar to Western
appellation, they do not refer to the specific tissue, but rather to semi-
abstract concepts which are complexes of closely interrelated functions. 11

The Body Chart

It is interesting to note that, in looking into the concept of the body during ancient times in
China, Sivin, a Sinologist of long standing, did not show (as Mr. Hidemi did) any illustrations
of the workings of the body featured in many Chinese classical medical texts, especially those
published during the Song and Ming Dynasties, when there was a proliferation of these
anatomical charts. Observing the practice in recent times of superimposing acupuncture
channels and acupuncture points on modern anatomical diagrams in modern books of
acupuncture both in China and the West, Joseph Needham asked what exactly was the relation
of the tract-channel to anatomy as we understand it today. 12

I believe that these ancient Chinese ‘internal organ charts’ and pictures provide convincing
evidence of how the ancient Chinese viewed their bodies. They also provide clues to Yee
Quock Ping’s map and icon, which he was attempting to deploy a century ago in Australia.
These illustrations also show that, when referring to internal organs like the heart, liver and
lungs, they are not just referring to them as esoteric ‘energetic orbs’ but as physical anatomical
entities of the sort with which we are very familiar with in the West, though with a dissimilar
translation of them. And this translation proceeds from TCM’s own map and icon in
structuring and constructing the body.

Doctor Lockhart (a British medical missionary who worked in China in the 1930's) and Ilza
Veith in the 1950’s said that these pictures were ‘just as if some person had seen some
imperfect dissection of the interior of the body, and then sketched from memory a
representation of the organs, filling up parts that were obscure out of his own imaginings, and
portraying what, according to his own opinion ought to be, rather than what they really are’.

Inner Body Landscapes and Acu-tracts

Let me present here an artist’s copied illustration of the chart of the inner organs published
during the Ming Dynasty and featured in Ilza Veith’s book. I asked the artist to copy the
picture from Veith’s book (illustration no. 1). Then I scanned the artist’s copied illustration
and subsequently added the Chinese character labels as they appear in the original illustration,
using Chinese language software (illustration no. 2). Finally, I translated the labels into their
English language equivalents (illustration no. 3). This chart was originally featured in the book
entitled Essential Reading For the Medical Fraternity, which was
Illustration No. 1
The New Revised Chart of the Inner Body Landscape

The old chart contains the quintessence pass flowing through the spine at the back passing through the anus. But it does not have the image of the uterus and gate of life. This error is thus corrected.

Near the heart link on the 7th vertebrae there is a small heart.

From the kidney link under the 14th vertebrae from the bottom to the top there are 7 vertebrae.
Chapter 4. The TCM Body

published in 1637. The author of the book, which is a ‘key access book’  *men jing shu* in TCM, was Li Zhong Zi, who also wrote other books, including one entitled *Essential Knowledge of the Neijing (Nei Jing Zhi Yao)*, which annotated several chapters of the *Neijing*.  

*Neijing.*  

Similar body chart illustrations, including illustrations of acupuncture charts called *Ming Tang Tu*, also appeared in numerous medical classics.  

Please refer to Appendices to Chapter 4.)

The Generation of the Inner Organ Body Chart

The question is then posed: How were these charts generated? Were they the ‘beginning of the science of anatomy in China,’ as Dr. E.T. Hsueh contended in 1921?  

Are they based upon systematic anatomical dissections? Or are they a product of what Nathan Sivin refers to as little-developed comparative anatomy?  

From a variety of differing accounts by Chinese medical historians from Mainland China and Taiwan and China scholars in the West, including Joseph Needham, K. Chimin Wong and Wu Lien-teh, we can establish that there were two illustration charts of the inner organs constructed during the Song Dynasty.  

The common source cited by some of these historians is a little known volume called the *Zhong Guo Yi Ji Kao* or *An Examination of Chinese Medical Texts* compiled by a Japanese scholar in 1826. From differing accounts made by Chinese medicine historians I found the narrative made by the Chinese medical history scholar Jia De Dao (*An Outline History of Medicine in China* 1979) to be the most comprehensive and least interpretative (except for his use of some Marxists jargons like ‘ruling classes’ and his obvious bias towards seeing TCM as having a modern ‘scientific’ body, which most people have done since the advent of modernity).
More importantly, he provided the source of his citations. Hence I have translated his historical narrative and presented it here.

Anatomy, Forensic Medicine, and Medical Education As Well as Medical Facilities

During the Sung Dynasty there were two historical records of human cadaver anatomical dissections. One of these historical incidents was between the years 1041-1048 when the leader of the uprising in Kwangxi province Ou Xi Fan and his followers were executed by the ruling classes. Their abdomen were opened up, kidneys and intestines were scooped out. Then a medical practitioner and an artisan illustrator explored and went through (the internal organs) one by one and then drew an illustration.

Basing his account on the records compiled by the then official government archivist in Yi Zhou prefecture, Wu Jian wrote: ‘On the second day, out of fifty-six insurrectionists executed, six had their abdomens opened. (The artist and the medical practitioner) made a detailed visual observation. There were three openings on the throat: one opening for food; another for water; and another for Qi... Under the lungs there were the heart, liver, spleen. Under the stomach were the small intestines. Under the small intestines were the large intestines. The small intestine was shiny and clean and there was nothing inside it. The large intestine contained some dirt and residue. Beside the large intestines there was the urinary bladder.’
As for the heart, there are those which were huge, and those which were small, square, elongated, slanting, straight; those with holes, those with no holes: they do not look the same. Xi Fan's heart was red and smashed into pieces. They were illustrated as they appear. Among the livers, there were those with one lobe; there were those with three lobes. There were two kidneys. One was located at the right side of the liver, slightly underneath. One was located at the left side of the spleen, slightly above.

The spleen was at the left side of the heart. Except Ruo Meng Gan most had coughing disease. Hence, their lungs were scorched and their gall bladder 胆 was black in colour. There were fewer notations on Ou, who suffers from an eye disease. His liver had white coloured spots. This was another distinct resonance between the exterior and interior 内外之应. 19

The other (anatomical cadaver dissection) occurred under the reign of Zong Ning Zhong (1002–1106). It was also a case of a brutal killing of insurrectionists, and the medical practitioner and artisan artists, being so ordered, drew them after gazing at them analytically. The resulting illustration chart was the product of sorting out 整理 work as well as verification by an authoritative text 校对 by the famous doctor Yang Jie. Yang Jie wrote the volume Illustration Chart Preserving the Truth 存真图. In the preface, Yang Jie said:

During the era of Zong Ning Zhong, the offender was executed in public. The official Li Yi Xing sent for the doctor and together with the artisan artist was asked to observe the execution. As the flesh was sliced from the bones and the fatty tissues raised up 扳膜絞膏, this tortuous process was charted into a picture. All details were taken in 尽得纤悉. Jie took it (the illustration) and verified it 校 [supposedly with the Illustration of the Five Inner Organs - ed.] as follows from the pharynx and larynx down
to the heart, lungs, liver, spleen, gall bladder, stomach and their respective passes and openings 关属; the location and 'pile-ups' 营叠 of the small intestines, large intestines, kidney inside the lumbar area 腰背, and urinary bladder. Among them are the joining-attachment 联附 with the acu-tracks 经络; separation of the water and grain; transporting of the quintessence and blood; origins and end-points of their flow; these all corresponded to the ancient texts. There were no discrepancies. These materials are from the book An Examination of Chinese Medical Texts 中国医籍考.

The historians Si Yuan and Zhao Pu Shan contended that this 'anatomical dissection' gave birth to the Cun Zhen Tu 存真圖 (Illustration Chart of Preserving the Truth). The medical historian Yu Shen Chu and other Chinese medical scholars like Needham claim that the ancient book Illustration Chart Preserving the Truth 有真圖 has been lost. Yu, however, said that some of the illustrations from the book Inner Illumination Chart 内照图, written by another Chinese medical scholar, Sun Huan (1273), were copied from the Illustration Chart Preserving the Truth, and that the illustrations on the internal organs subsequently found in the books Collection of Gems in Acupuncture and Moxibustion 针灸聚英, written by Gao Wu in 1529, and the book The Great Compendium of Acupuncture and Moxibustion 针灸大成, written by Yang Ji Zhou in 1601, were also copied from Illustration Chart Preserving the Truth. (Please refer to 'Chart of the Internal Organs' in Appendices to Chapter 4.) The historian Zhao Pu Shan confirmed this contention and added that, during the Ming Dynasty, a large number of books on acupuncture and Chinese medicine adopted many of the illustrations.

According to Yu the copied version of The Chart preserved in the Inner Illumination Chart contained the following:
Illustrations of anterior and dorsal views of the thoracic and abdominal cavity; the right hand side view of the thoracic cavity; an illustration of the heart Qi; these are drawings of the right side view of the thoracic cavity as well as the major blood vessels of the abdominal cavity; an illustration of the Sea of Qi and diaphragm; a drawing of the diaphragm as well as the oesophagus and blood vessels penetrating through and going upwards; an illustration of the various linkages of the spleen and stomach; a drawing of the digestive system; an illustration of the ileocolic gate and the separation of water; a drawing of the urinary system; an illustration of the Gate of Life, large and small intestines, urinary bladder; a partial drawing of the digestive system and reproductive system. 20

Yang Jie - ‘The Anatomist’

I cannot trace the identity of the art workers who did the illustrations for Illustration Chart Preserving the Truth. The illustrator of the Illustration of the Five Inner Organs, however, was Sung Jing 宋景. 21 On the other hand, I found plenty of materials on the life of Yang Jie, the Chinese medical scholar who wrote the Illustration Chart Preserving the Truth. According to An Outline History of Chinese Medicine (1983), Yang was born in 1068 in the province of Anhui in central China, and passed away in 1140. After failing to pass the Imperial examinations he turned to studying medicine. He was also a poet. Aside from writing the book Illustration Chart Preserving the Truth, he also wrote two books on diseases and the pulse as they relate to shang han or febrile diseases. Yang also was known for his ‘magical cures’. He reportedly successfully treated a provincial official of a condition known as hou yong zheng 喉瘍症 (a condition similar to abscess on the throat) by prescribing the official 500 grams of ginger and some herbal decoction. After taking the ginger the official tasted a pungent
Yang Jie, who styles himself as 'Ji Lao', hailed from Bei Jie Suzhou Prefecture (which is now known as Xu Yi county in Jiangsu Province). He authored the Illustration Chart of Preserving the Truth  Cun Zhen tu  which features detailed drawings of the inner organs. It is China's earliest collection of anatomical illustration plates. Yang also authored other books such as Injury from the Cold during the Four Seasons- A General Treatise on diseases and The Treatise on Injury From Cold Cognition through the Pulse.

flavour, and the pus and swelling in the throat subsided.22

In Joseph Needham's account of the evolution of *The Chart* in Volume 5 of *Science and Civilisation in China* he referred to *The Chart* as *Illustration of the True Forms of the Body*; this is his translation of another Chinese title of *The Chart* which is *Cun Zhen Huan Zhong Tu* 存真環中圖 (referred to by Needham as *Tshun Chen Huan Chung Thu*). We can translate *Cun Zhen Huan Zhong Tu* as *A Chart which Preserves the Truth with a Circle Around It*. According to the medical historian Yang Yi Ya, the Chinese word *zhen* 真 (truth) refers to the *Zang-Fu* or inner organs, while the Chinese word *huan zhong* 環中 (a circle around it) refers to the acu-tracts or *jing luo*.23 Yang, however, did not explain how he arrived at this interpretation. Needham, however, quoting from the *Yi Ji Kao*, gave a textual explanation for this 'link' between the inner organs and the acu-tracts:

> According to the preface which Chia Wei-Chieh wrote for Yang Chieh's treatise (*The Chart*) all earlier anatomical texts and illustrations were carefully studied by him, including those of Yen Lo Tzu; and to the pictures of the viscera he added diagrams of the twelve tracts of circulation of the *chhi* (Qi). Hence the words *huan chung* (*huan zhong*) in the title.24

After a search involving classical Chinese books from the East Asian Collection of the University of Melbourne and my private collections I was able to trace charts of the internal organs as well as the acu-tracts which were featured in the Ming Dynasty acupuncture classic *The Great Compendium of Acupuncture and Moxibustion*. I am featuring them here with my rendering of the English names of the various 'anatomical parts'. (Please refer to Appendices to Chapter 4.)
‘The Dissections’

Tracing the roots of the inner organ chart was indeed a long and tortuous process. Scholars have looked into the above-mentioned materials in the past but obviously assumed that there was only one ‘universal’ method of anatomical dissection. With this mental framework, Chinese words or characters like *pou* 剖 can easily be taken to be *jie pou* 解剖, which is the modern Chinese equivalent for the English word ‘anatomy’ or ‘dissection’. Contemporary Chinese literature on TCM and acupuncture in Mainland China points to modern dissection of dead bodies or *jie pou* as furnishing the origin of the study of acupuncture channels. In TCM educational institutions in Mainland China, general anatomy (decontextualized and untranslated vis-à-vis the TCM notion of ‘live dissection’) is still being taught to demonstrate the modern and ‘scientific’ basis of ancient TCM concepts of the body. But the ancient Chinese word *pou* has multiple meanings when used in varying contexts. It can mean ‘to open up,’ like opening up the belly of a fish - *pou kai*. It can also mean ‘to analyse’ as in *pou shi*. In the context of crime and punishment in ancient China *pou* can also mean *pou fu* 剖腹, referring to another barbaric method of capital punishment which can only be translated as ‘disembowelling’. In fact, the Chinese words *jie pou* were used in the *Neijing* a couple of millennia ago. In the chapter on *Jing Shui* (Rivers and Channels) the *Neijing* states:

Human strength cannot be measured. As for the body of a person who stands eight (Chinese) feet tall, when he is alive one can observe the skin and flesh, and externally palpate along the appearance of the channel. After the body has died, we can open it up (*jie pou*) and examine the (internal) *zang* and *fu* organs.
Now we have an unfolding picture of how TCM generated its own body. First of all, in the light of these historical facts, we can say that there were indeed dissections done in the creation of these charts. But the dissections were not done on a lifeless body. They were performed by a ‘butcher’ or an ‘executioner’ (gui zi shou 剖了手), on bodies that were pregnant with life. While the executioner was doing his ‘dissection,’ the TCM practitioner and the artist gazed at layers of life which were cold-bloodedly sliced until the ‘roots’ of life within the shell of the body lay bare, following a final slash from the butcher’s knife.

Before these lives were sliced into the ultimate bits, the artist with his bamboo calligraphy brush put the whole living interior/exterior of the body together in The Body Chart. The Chinese medicine scholar translates into text the ‘embodiments’ of his findings on the ‘body’. This was how TCM came to have a body. And this was how anatomical ‘body parts’ with which we are very familiar with in the West assumed a dissimilar translation. The illustration chart expressed the idea that the artists and the medical practitioner had in their minds, while the text that the practitioner wrote explained the illustration chart, so that one could understand it at a glance (以圖表意文解圖, 使學者一目了然 yi tu biao yi, yi wen jie tu, shi xue zhe yi mu liao ran).

The Body-As-Machine

Dissection of a lifeless body generates a different body. Consequently, it also generates a different body of knowledge. It dichotomises the physical body from the ‘body’ of the mind and sees the body as an aggregation of its anatomical parts, starting from its minutest genetic make-up, proceeding then to the cell-tissue-organ, and finally the body systems. A very
powerful map and icon generates this type of dissection. From this map or icon, the body is seen as a machine. ‘The body was composed of material parts which worked together according to physical, mechanical laws.’ It is the generating metaphor of biomedicine which finds its roots from the works of the French philosopher René Descartes (1596-1650), who depicted ‘man as a dynamic, physiologically functioning machine’. Together with the British physician William Harvey (1578-1657), Descartes is credited with adapting the scientific method to medicine.

In the course of more than half a millennia of interaction between TCM and biomedicine, the map and icon of the body as machine has resulted in the hegemonic translation of the TCM body. Looking at the excellent illustrations of ‘body parts’ like the pelvic bones, uterus, birth canal (full view and side views), the placenta, the foetus coming out of the birth canal in varying positions, which form the first pages of a Chinese translation of Doctor Benjamin Hobson’s book *Treatise on Midwifery and Diseases of Children* 婦婴新說, published in the 1840’s, and comparing them with the simple stylised line drawings of the 16th century ‘body’ parts from Chinese classical medical books, one can see the disparity in structural details and inscription techniques. In Donna Haraway’s words, it was an ‘unequal structuring’ of two bodily inscriptions. With the help of superior technical, social and literary devices, the TCM body, like Yee Quock Ping’s map and icon a century ago, underwent a thorough unilateral translation. The Ming dynasty internal organ body charts gave way to modern books on acupuncture, both Chinese and Western, which ‘generally show the chart system of the acu-tracts superimposed upon modern anatomical diagrams, whether superficial, myographic or osteographic’. And in extreme cases the mechanical body totally eclipsed the TCM body.
Fig. 6 Side view of the male human body with acu-points and acu-tracts shown against an astrological background. Anon. (1973).

In 1990, the Shanghai Book Company Ltd in Hongkong published a book in Chinese: *Zangxiang Yu Jiepou* 腸象与解剖 (*State of the Viscera and Anatomy*). The content of the book is about the inner organs as translated from the map and icon of TCM. The illustrations, however, are very vivid and detailed drawings of the internal organs and systems, like the brain and the spinal column, the circulatory system, the heart (with labels of the blood vessels like the aorta) and the lungs. All the illustration charts were inscribed through the anatomical map and icon. Every internal organ which was textually rendered in TCM was mechanically apportioned a slice of biomedicine’s anatomical ‘bits’. Organs from the traditional inner organ chart were conspicuously absent. Undoubtedly, these anatomical internal organs were mechanically traced and copied from conventional Western medical anatomy books and then placed side by side with traditional concepts of the inner organs. TCM had indeed achieved the acme of modernity!

**A Translating Image: The Body As A Living Bamboo Tree**

‘Sensing’ and illustrating the ‘living body’ by witnessing the brutal physical ‘dissection’ by a *gui zi shou* also generates a different body. It generated a body of knowledge which gives the ‘body parts’ a different rendering or a different translation. Unlike a mechanical rendering of the body which dichotomises the ‘physical body’ from the ‘body of the mind’, various ‘body parts’ kept their respective ‘minds’. The heart continued to store the *shen*, the spleen continued to store ‘intention’ and ‘wisdom,’ while the liver continued to store the *hun*. In addition ‘body parts’ like the Qi and the acu-tracts, which are invisible to the ‘mechanical eye,’ become visible to the ‘sensitive eyes’. As we saw with the medical practitioner Yang Jie, who was instrumental in the construction of the first internal organ chart in China, he was
able to ‘see’ and illustrate ‘the joining-attachment 联附 with the acu-tracts 经络; separation of the water and grain; transporting of the quintessence and blood’. In contemporary socialist China, more than half a century of looking for a ‘mechanical body’ complete with Qi and acu-tracts yielded negative results. 39

Hence, the time has come to bring to life Yee Quock Ping’s map and icon. TCM must shed its pretence of mechanical body and return to its roots i.e. its own body. From the time of the Yellow Emperor’s Classic on Internal Medicine two thousand years ago to the present, TCM has seen the body as an interplay of the ‘inner roots’ 本 and the ‘outer branches and leaves’ 茎. The body is a ‘living tree’ which is written as 木 and reads as μu, which also means ‘wood’. ‘Wood’ is one of the ‘Five Elements,’ consisting of ‘wood, water, metal, earth and fire’. In the Chinese character μu, the vertical line is the ‘tree trunk,’ the horizontal line is the ‘tree branch,’ and the slanting lines projecting downwards are the ‘tree roots’. When another horizontal line is placed at the lower part of the ‘tree trunk’ it becomes the Chinese character indicating plant ‘root’ 本 ben, that is the ‘inner root’. When another horizontal line is added above the ‘tree branch’ of the Chinese character μu or ‘tree’ then it becomes the character 茎, meaning the ‘tips of the branches of a tree’ or ‘outer branches and leaves’.

Discussing the relationship between the root and branches in his book The Two Chinese Philosophers Ch’eng Ming-tao and Ch’eng Yi-ch’uan (1958), A.C. Graham says:

The Sung philosophers do not conceive the origin of things as

“creation” by Someone standing outside the universe, but as

“breeding” “growths” (Sheng”) from Something at the root
of the universe. The analogy behind their thinking is not a
man making a pot, but rather a tree growing from its hidden root. 43

Now what links the trunk, branches, leaves and roots of the tree? It is the ‘vascular bundles’
or mai 脈. This character is written with two components. The left portion represents a
‘vessel’ full of blood or water. This may also be written with a character representing ‘flesh’
or rou, which is written with ‘strips of meat inside a bundle’ (肉). The right hand side
component of the script is ‘water separating into smaller streams (分流)’. It is a ‘constantly
flowing spring, reversed, the flow is still constant, but as it leaves the spring it divides into
several streams’. 43

Now what brings and sustains life to a tree? It is the warm energy of the ‘sun’ or Yang Qi and
the refreshing and nourishing cold ‘water’ Jing (‘reserves’ at the root of the plant) from the
deep earth or the Yin Qi. The interaction between the Yin and Yang Qi brings about life. Water
derived by the roots and leaves of the tree as well as minerals (metal) extracted by the roots
run through the body of the tree through the ‘vascular bundles’ . They and the fire energy
from the sun (Qi) all sustain the life of tree. Water, metal, fire and earth all sustain the life
of the wood i.e tree.

The human body is a ‘living bamboo tree’. We are aware that, botanically, there are difficulties
classifying the bamboo plant as a ‘tree’ or as a ‘grass,’ but, like Yves Crouzet, let us imagine
the bamboo plant as a tree with ‘the rhizomes corresponding to the trunk and the branches
and culms (cane) to the leaves’. 44 The bamboo tree has luxuriant green pointed leaves which
come out of nodes jie 节 along its long slender culms or stems, which in turn connect
directly with the underground rhizomes and extensive root systems and runners.
Scattered along the green leaves, rhizomes and culms (cane) of the bamboo tree are thousands of ‘stomata’ and ‘nodes’. They are the kou or the qiao or ‘opening’ of the body. The kou or qiao are openings or, more specifically, are like the exterior sense organs of the body, which include the ‘nine orifices’ or jiù qiao of two eyes, two nostrils, two ears, one mouth, one anal opening, one quintessential and urinary opening, skin, and the 365 acupoints or xue穴, which is another name for qiao. There are 84,000 hair openings mào qiao or 毛窍 pores of the skin as well. In his book *Creativity and Taoism*, Chang Chung-yuan refers to the ‘stomata,’ ‘nodes,’ kou, qiao, or acupoints as ‘breathing centres’ or ‘inner centres,’ which are used as foci of concentration in Taoist meditation. 41

The underground extensive root system of the bamboo tree, including the long runners which generate the bamboo shoots. These are like the submerged extensive ‘hidden network’ of internal organs, which includes the five zang internal organs of the kidneys, liver, spleen, lungs and the heart, the six fu internal organs of the stomach, large and small intestines, urinary bladder, Triple Burner and gall bladder and the peculiar internal organs of the brain, marrow, bones, blood vessels, and uterus. They absorb the metal minerals, water and processed food ‘grain water’ or the ‘quintessence of water and grain’ (shuǐ guǐ zhī jīng) transported by the leaves of the tree. All internal organs except the Triple Burner are written with a radical script with ‘strips of meat inside a bundle’ 月.

The various qiaos or ‘stomata’ kou, ‘nodes’ jie, ‘nine orifices,’ skin pores, hair openings and 365 acupoints or xue ‘breathing centres’ and ‘inner centres’ on the interior/exterior of the body with the interior root-network of inner organs are linked by what Needham refers to as the ‘hydraulic engineering’ network of acu-tracts, which convey Qi and blood to all parts.
of the body. The Yang acu-tracts, like the ‘xylem vascular bundles’ along the trunk and culm of the bamboo tree which transport water and minerals to the stomata or openings on the leaves and culm, carry Qi and blood from the root inner organs outwards acu-points, the nine sensory organs, nodes and breathing centres. The Yin acu-tracts, such as the ‘phloem vascular bundles’ which transport water and processed food nutrients, carry Qi and blood from the stomata openings or breathing centres or acupoints from the exterior of the body into the extensive inner organ network of Five Zang, six fu and the ‘unusual internal organs’ qi hang zhi fu.

As the Qing Dynasty medical scholar Xue Sheng Bai said:

The Visceral and the hollow organs are the roots of the acupuncture acu-tracts.
The acupuncture channels are the branches and leaves of the visceral and hollow organs.  

Using the living bamboo tree as a map and icon, I have reconstructed the TCM body by translating and rendering the ‘body parts’ in accordance with these pictures. To do this reconstruction I used a Ming Dynasty Chart of the Inner Body Landscape featured in Zhai Liang’s book The Corpus on the Acu-tract, as well as a literary piece written by Zhai Liang entitled An Ode to the Inner Body Landscape. To complete the TCM body, I have ‘translated’ and feature here the ‘Acu-tract Map’ (front and back views) which originated from the Great Compendium of Acupuncture and Moxibustion written by Yang Ji Zhou, in 1601.
AN ODE TO THE INNER BODY LANDSCAPE

Zhai Liang  circa 1628

内景賦

Calculating the origins and root of human life, it can only originate from the Primary Qi. From the exteriority, interiority, Yin, Yang; ascending, descending, sinking and floating, it moves from the exterior towards the interior. It moves in cycles. With the incipient movement of the Shen, the Qi arises. There are endless life transformations.

The acu-tracts move along the muscles and skin on the surface of the body. The Inner organs link with the pharynx and larynx. The larynx is located at the front. Its structure is hard and strong. The pharynx is at the back and its constitution is gentle and soft.

The larynx connects with the Qi which is inhaled and exhaled. The Qi then moves along the Five Zang organs. The pharynx is a passageway for drinks and food. It is the fountainhead of the Six Fu internal organs. Do the movements of food and Qi ever come into chaos? This is governed by the epiglottis which separates their flow. From here, they move down along the pharynx and enter the diaphragm. The Zang and the Fu internal organs. Ah...! The Yin and Yang do not match each other.
Chapter 4 The TCM Body

As for the Five Zang Internal Organs, the lungs are the canopy 蓋 which links with the laryngeal tube 管. Underneath the lungs is a sphere under the protection of the Pericardium 心包, 而 while the ‘Sovereign Monarch’ 君主 may be open for requests. This is the Shan Zhong 腹中. The Qi Assemblage 流 flows from here. The diaphragm encloses the surrounds from all sides. The pure 清 and empty space 虚 ascends to the palace.

The Spleen 脾 is located underneath the diaphragm. The ‘Middle Island’ 中州 comes with the Stomach 胃. A ‘thin skin or peel’ 皮 links it (spleen) with the left side of the Stomach.

‘Turning around’ and transforming 燃化 is its function. A leaf of the Liver 肝 is blocked by the Spleen, while the Fu Organ Gall Bladder 腎 is located at the eastern leaf (of the liver). Two Kidneys 肾 are located on the lower part of the spine 肾. In the lumbar region 腰 there is an acu-tract 脉 which passes through. The Kidneys takes charge of storing and keeping. It is the ancestral origins of the Two Yin and One Heaven. This falls within the sphere of the frontal orifice of the larynx. The Quintessential (jing) and the Shen must be served 充 by the Qi.

As for the Six Fu Internal Organs, the Bright Yang Stomach 陽明胃 comes first. The Stomach processes 熟 and decomposes 福 water 水 and grain (food). The inner cavity 腹 of the stomach connects with the pharynx. Its upper opening is
referred to as Ben Men. From here the Grain Qi is then dispersed, transported to the Spleen Acu-tract, and reaching the Lungs. It is actually the great resource of the Lung Fu internal organ.

Through the lower opening of the pylorus, it (the stomach) links up with the Small Intestines and snakes around. At the lower reaches of the Small Intestines, there is a ileocolic gate. This is a pass for separating the pure from the turbid substance. Subsequently, the turbid substances are sent to the front (urinary outlet) and back (anus). The Large Intestines receive them from the right side and conduct the ‘residue’ as faeces.

The Urinary Bladder does not have an upper orifice, and connects with a ‘spring’. Admire the pleasant and gentle functions of the ‘Two Yins’ (front and back yin): this is just the natural way that Qi transformations occur. This is a brief but detailed presentation of the body’s internal organs.

I have not discussed the the Triple Burner. This is a an ‘orphaned’ residential space. The (human) body has ‘three resources’ upon which locatedness is fixed. There are ‘six combinations’ methods to make heaven manifest itself. The upper burner is like the mist. It is the enshrouding mist of the Heavenly Qi. The middle burner is analogous to the water bubbles. It transforms the freshness of the Qi and Blood. The lower burner is like a ditch. It opens up and decongests blockages.
Hence we say that the Upper Burner governs the interior and does not move into the exterior; while the lower burner governs the exterior as a river would.

As for the status of the Zang internal organs, highs and lows are dissimilar. Requesting the comings and goings of the acu-tract Qi, how can they be of an equal level? The Heart governs like a ‘sovereign monarch’. It takes charge of nurturing the acu-tracts. Hence, when anger moves in the Heart, the Liver gets burnt. When lust starts sprouting, the quintessential 精 of the Kidney acu-tract 腎經 boils up. This creates difficulties in dispelling hard pondering 思. The withered Spleen generates ‘intention’ 意. The Lung acu-tract 肺經 becomes ‘hard-going’ and the Qi sinks down. Grief and worry move into the Heart. For the acu-tracts 脉絡 to reconnect with each other, the Qi must return 歸 to the Heart. While all the Zang internal organs return to the Heart, in actuality they all connect to the Lungs above. How is the Lung Qi generated? Its root 根 is in the Spleen and Stomach. Relying upon the water and grain in the granary, the minute quintessential 精微 is transformed into Qi. When the Qi is thriving, the quintessential is filled to the brim. When the quintessential is filled to the brim the Qi is thriving. This is transformation from the source root. Within the Kan 坎 the ‘real life’ 真命 is stored.

The cause for the emergence of the ‘Inner Landscape’ must be sought from the ‘root and the shoot’ 根苗. Some say it is before the coming of the two kidneys; some say it is after the coming of the Urinary Bladder. Coming out of the upper left side of the Large Intestines is the location of the lower left side of the Small Intestines.
But where is the fruit stored? The accumulation of the intercourse between the Kan and Li is the sea from which the Qi is generated and the hole from which the Origin yang 元阳 is generated. Open up the quintessential and the blood 血 to the womb 子宫. This determines longevity or its opposite. This is referred to as the Gate of Life 命门. There is nothing wrong with calling upon the Heavenly Root 天根. This can only make us know that there is a sound of thunder coming out of the bowels of the Earth and give us insight into the spring light gradually spreading through and covering the universe.

Notes:
1. The human heart xin ‘stores’ the shen. This is the magical or unfathomable Yin and Yang changes bian and transformations hua which transpire both in the interiority and exteriority of the body i.e. in the internal and external body environments. In the bamboo tree these changes and transformations mainly occur in its rhizome and roots. The bamboo shoots or the turions emerging from the rhizome can grow rapidly - about one metre in twenty-four hours. This is phenomenal shen and magical for a plant!

While the bamboo rhizome root responds ying to the stimuli gan generated by magical transformations, the human heart-root ‘generates the knowledge (tao) which responds to these bian and hua’. Hence the heart-root is also sometimes referred to as the sovereign monarch of the body. The heart, like the yang fire, is the
root of life. It generates blood and governs its dispersal to all parts of the body, and so myriads of things connect with it for their survival. Hence the heart also governs all blood acu-tracts. When there is enough blood flowing into the blood acu-tracts, then the acu-tracts and sub-acu-tracts become full and the face becomes luxuriant. Hence it is said that the heart-root fills the blood acu-tracts (*Lei Jing*).

The following are translations of Chinese characters which appeared with the chart.

In the old chart ...旧图 there was a ’quintessence pass’ 精道 which runs along the dorsal side of the spine after passing by the anus 肛门.

This categorisation is not in accord with the principle 理. In addition there was no ‘image’ of the ‘womb’ and ‘Gate of Life’ 子宫命门之象. This is a major omission. Hence, today, we have corrected this.

The Heart is connected with the seventh spine. Beside the seventh vertebra, at the middle, there is a ‘small centre’. This is the point where the Kidney is linked under the fourteenth vertebra. Moving upwards, this is the seventh spine 七节.

* The ‘Chart of the Inner Body Landscape’ or *Nei Jing Tu* and the ‘Ode To the Inner Body Landscape’ or *Nei Jing Fu* are translations from a segment of the work of Zhai Liang, *The Corpus on the Acu-tract 经络汇编* (1628). Both the chart and the ode were on the last pages of the book, which was republished in October 1989 by the TCM Classics Publishing House (Beijing). This material was republished under the title *The Complete Book On the Acu-tract 经络全书*, which also included the works of two other Ming Dynasty TCM scholars: Yu
Shi Zeng and Shen Zi Lu who wrote the book *The Complete Book on the Acu-tract* (1566) and Zhang San Yi, who wrote the book *Examining the Acu-tract* 经络考 (1609). The Chart and the Ode also appeared in the *Illustrated Supplement to the Classified Canon* 类经图翼 (1624), a work of Zhang Jie Bin, another Ming Dynasty TCM scholar. A similar chart also appeared in Needham’s book *The Celestial Lancets*.

**The TCM Body, the Corporate Body of TCM Practitioners and the ‘Body of Yao’ - A ‘Three-Way Mirroring’**

Having reconstructed the TCM body through a rendering of its anatomy we now will see how it interacts in a living way with other ‘bodies,’ especially with the corporate body of practitioners and the body of yao or TCM ‘body of remedies’. Within the TCM assemblage, how does the figure of the TCM body interact with the practitioner? Unlike the ‘mechanical’ biomedical body which passively submits to the interrogative gaze of the biomedical clinician, the TCM body like a living bamboo tree dances and sways with the rhythm of the blowing wind. It is an active negotiator with the practitioner. Like the magical bamboo shoots which ‘respond’ ying to the ‘stimuli’ gan generated by magical transformations, the TCM body with its human heart-root generates the knowledge (the Tao) which ‘stimulates/responds’ gan ying to the practitioner and the body of Yao. In a TCM consultation a two-way ‘mirroring’ operates between the TCM body and the corporate body of the physician. The TCM body mirrors the physician by taking a coordinating and negotiating role with the latter in the diagnosis, treatment and management of the disease, while the physician ‘mirrors’ the TCM body by diagnosing the clinical pattern emanating from it, while tailoring an appropriate treatment to put it back into harmony and balance.
ACU-TRACT MAP

front view

Great Compendium of Acupuncture and Moxibustion p 189, year 1601
Within the TCM working space, we see the figure of the practitioner ‘formatting’ the yao or the ‘body of remedies’ to put the TCM body into balance and harmony. The TCM clinic is a space where the patterns of clinical phenomena or zheng hou are created from signs and symptoms which have been observed, palpated, heard/smelled and interrogated through the medium of the TCM body. The data generated are then assembled and crafted bit by bit through the medium of conceptual templates. On the basis of the illness configuration generated by the TCM body, a formula (fang) of remedies (yao) is created to fit and redress the disharmony. This formula of remedies or ‘body of yao’ may be an assemblage of herbs, acupuncture needles, fruits and vegetables, or animal by-products, gentle massage strokes, a breathe of Qi. Once the formula of remedies is fitted to the patient’s clinical pattern like a key fitting a keyhole, the turning of the key opens the door to a new space of balance and harmony.

The TCM clinic, which can also be referred to as the ‘patterning clinic’ lin zheng, is a ‘spatial network’ of specialised chambers i.e. reception, consultation, and treatment rooms. It is a space where the TCM body, corporate body of practitioners and body of yao meet, connect and enact the process of bian zheng lun zhi. From the reception room patients are led to the consultation chamber, where the practitioner and the patient meet. As the Four Examination Techniques si zhen are performed in the consultation chamber, natural sunlight is allowed inside to aid in observation of the color of the tongue as well as the patient’s spirit shen and facial complexion. This consultation space should be quiet and tranquil, thereby allowing a free flow of Qi, which in turn aids the practitioner’s palpation of the pulse, apprehending of pathological sounds and smells and inquiring about the ‘Ten Questions’. A small hand pillow is used to rest the patient’s wrist, whereupon the radial pulse in both hands
is palpated by the practitioner.

As a proactive participant in the clinical encounter, the TCM body can make the most of this clinical consultation by first of all seeing it as a whole person, who, like the robust bamboo in perfect rhythm with its internal and external environment, is aware of its body rhythms, i.e. in sleeping, eating, defecation and lifestyle, especially as these relate to the cycle of the seasons and weather changes. It should see how its physical body rhythms correlates with the onset and development of signs and symptoms of its disease. This holistic approach complements that of the TCM practitioner, who views illness as a product of disharmony among the inner body organ systems as the body interacts with the outside world.

The TCM body must as far as practicable have a clear idea of its main complaint before seeing the practitioner. The main complaint is the sign or symptom which makes one suffer most i.e. headache, low back pains, dizziness, period pains, sleeplessness. It will even be helpful if one writes these down before seeing the practitioner.

Face to face with the TCM practitioner, the TCM body must describe his/her complaint in as much detail as possible. She/he should clearly relate signs and symptoms which can be seen (colour, location on the body), heard (cough, wheezing, breathing etc.) or touched (lumps, swollen glands) and smelt (body, urine, faeces). This may include describing every sign and symptom, subjective feelings, onset and development of the condition, therapies undergone and medicine taken, and responses to them. Show the practitioner any physical manifestation of the diseases such as skin rash, bruising, tender spots or swollen tissue. He/she should show the TCM practitioner the tongue in a relaxed and natural manner by poking it out and
stretching it as much as possible without unduly straining the tongue muscles. Before the visit, the TCM body should avoid having food with food colouring like strawberry lollies, coloured chewing gum, cough lozenges or drinks, as these foods can affect the tongue’s natural colour. He/she should also avoid perfume, fragrant soaps and body lotions as these may conceal significant body odours from the practitioner’s clinical investigation. One should also avoid make-up, lipstick, toupees and other beauty aids as these may affect an accurate monitoring of facial colour or body ‘spirit’. To prevent an inaccurate reading of the pulse of the TCM body, one should avoid strenuous physical activities immediately before a consultation. In addition, any alcohol or strong stimulants like coffee or tea should be avoided for two hours before a TCM consultation.115

Data generated by the TCM body and gathered through the TCM practitioner’s execution of the Four Examination Techniques, the diagnosis, body of yao or remedies prescribed, are all recorded in the medical case records yì an, which are then filed systematically.

Within this TCM knowledge space, balancing tools and instruments are kept for eventual use. They include hundreds of dried aromatic herbs neatly stored in rows of wooden herb chests which adorn the clinical space. Each herb compartment is labelled with such names as ‘peppermint,’ ‘Japanese catnip,’ ‘ginseng,’ ‘rhubarb rhizome’ and ‘tangerine peel’. These individual herbs, or their combinations in a formula, also come in powdered granules and pills for more convenient administration.

Disposable acupuncture needles, crystal glass cupping devices, moxa sticks of all makes and sizes, moxa boxes, an electric acupuncture stimulator or a bottle of Tiger Balm liniment are
placed on a mobile stainless steel trolley ready for therapeutic action. Books (ancient, classical, contemporary, in Chinese or English), acupuncture charts, herb charts, plastic miniature acupuncture models, are all found in the consultation and therapy rooms for the TCM practitioner's immediate reference and use.

After the consultation, if acupuncture or massage therapy is required, the patient is referred to the treatment rooms. Here patients lie on couches to receive balancing therapy. However, if herbal therapy is required, dried herbs are drawn from the herb chests, weighed and then wrapped in small paper packets for the patient to decoct and drink at home. For patients who do not have time to decoct the herbs, there are herb tablets, granulated pills or powder.

The 'key' which opens the door to the TCM knowledge space simultaneously opens to the wider natural and social space outside. People are boiling herbs in their kitchens. The bodies of yao remedies in plastic bottles containing herb tablets and granules, or bottles of Tiger Balm liniment, find their way into people's medicine cabinets. In people's bedrooms, acupuncture points are being used as 'pressure points' to massage their signs and symptoms away. Even the police have been using the body of yao remedies like 'pressure points' for crowd control.

People are choosing and eating foods in accordance with their Yin-Yang cold and hot attributes. Some are waking up early in the morning to get their breath of Qi through Qigong and Tai Ji Quan exercises. Supermarket shelves now stock a herbal preparation called 'Clearing the Way' Xiao Yao San, which is used to clear Liver Organ system Qi stagnation. The corporate body of TCM practitioners is being officially registered as legitimate health practitioners in accordance with the provisions of the Victorian state legislation - The Chinese Medicine Registration Act 2000. Through the TCM assemblage of the corporate body of TCM practitioners, patient
bodies, and the body of yao or remedies, the TCM knowledge space is expanding as local clinical and even everyday practices develop in diverse contexts.

The TCM body is contingent. It is simultaneously effected as material and symbolic, individual and collective. This is certainly not a non-body in the material sense, yet dealing with and through the TCM body is quite different to managing the Western biomedical body. There are some ways in which the TCM body can be said to be 'the same' as the Western biomedical body. We need to recognise these. They are important in generating and sustaining a translating knowledge space. At the same time we need to recognise profound ontological and metaphysical differences between bodies that feature in TCM and Western medicine. These too are important. Finding ways to separate and respect the different bodies is likewise an important aspect of the working of a translating knowledge space. In my final two chapters I give readings of the yao of TCM herbal medicine and of acupuncture, that cohere and link up with this complex, contingent, and emergent TCM body. In a translating knowledge space it is important to work towards establishing a shared 'story' about these elements of TCM practice.
Endnotes

Chapter 4


3 Medical Society of Victoria, "Special Meeting to express an opinion upon the recent application of a Chinaman to be placed upon the Medical Register of Victoria," *Australian Medical Journal*, 1875 (16 June), pp. 209-210

4 I am using ‘map’ and ‘icon’ here as Donna Haraway used them. In *Simian Cyborg and Women: The Reinvention of Nature*, Haraway stated: ‘My thesis is that the immune system is an elaborate icon for principal systems of symbolic and material ‘difference’ in late capitalism. Pre-eminently a twentieth-century object, the immune system is a map drawn to guide recognition and misrecognition of self and other in the dialectics of Western biopolitics. That is, the immune system is a plan for meaningful action to construct and maintain boundaries for what may count as self and other in the crucial realms of the normal and the pathological’ (p. 275).

5 Pensabene defines legal status as the ‘extent to which a community or government is willing to grant autonomy or self-control to an occupation, and to the limits to which a community or government endorses the legal restriction of competition and entry into an occupation’. (T.S. Pensabene, *The Rise of the Medical Practitioner in Victoria*, Canberra, Australian National University, 1980, p. 120)


13 Veith commented in her introduction to the Neijing that the ‘Chinese concept of the structure of the human body are connected with the Chinese theories of cosmogony. As a result of this great stress upon schematisation, we receive a picture of the human anatomy that is highly stylised and of little practical significance’. (Ilza Veith, *The Yellow Emperor’s Classic of Internal Medicine*, Berkeley, University of California Press, 1972, p. 25.)

14 Jia Wei Cheng, *San hai zhong yijie lu* [A Record of 300 Medical Classics], Heilongjiang kexue Joshua chubanshe, Harden, 1982, pp. 40-41
15 Some of these inner body organ charts and acupuncture tracts and their improved versions also appeared in numerous ancient books on Chinese medicine. I have sighted these charts in the following English and Chinese language books.

1. Li Sheng Shao et al. (1992), *The Complete Book On the Acu-tracts 素體全書*, China Ancient Books Publication. This book contains three separate texts by three different authors on the subject of the acu-tract or jinglu, published during the Ming Dynasty. It contains 3 plate of the Inner Body Landscape 內景圖; 27 illustration plates of the acu-tracts; and 13 illustration plates of individual internal organ like the heart, spleen etc.

2. Li Ting, *Yixue runen* [Introduction to Medicine, vol.1] (1575). One chart of the whole inner body organ and two plates of acu-tracts (anterior and ventral views). This book is from my private collection.


a) Illustration of digestive organs and intestines (Fig., p. 43). Source: *Ha To xuanmen neishao tu* 胎恆玄門脈診內照圖.

b) Chart of Inner Lights Source: *Lei jing tu yi* (Illustrated Supplementary to the Classified Cannon (fig. 2, p. 44).

c) The orb of the liver with its resident spirits. Source: *Huangting nei jing wuxiang liu fu bu xie tu* (fig. 3 p. 44).


a) Chart of the internal organ sanfu tu 腎腑圖 p. 188.

b) Acu-tract Chart (front and back view) yangren jingtu 仰人經圖; fu ren jing tu 伏人經圖.


This edition was published by the Shanghai Science and Technology Publishing House in 1978.

a) A plate on inner body landscape nei jing tu (this illustration is a photograph of the line drawing, hence not very clear).

b) Plates on whole acu-tracts (3 plates illustrating front back and side views), p. 2.

c) Plates on surface body measurements (2 plates), p. 3-4.

d) Plates of individual organ and corresponding acu-tract on one page of the book (22 plates).


a) Chart of the Inner Body Landscape 內景圖 Nei jing tu, p. 205.

b) Charts of the acu-tracts flowing on the head, back and front of the body, legs and arms - 10 plates.

c) Individual acu-tract plates -14 plates.

d) Individual acu-tract plates -11 plates.

e) Illustration of the Triple Burner san jiao - 1 plate.

8. Wu Jian, 1742, *Yi Zong Jin Jian* [The Golden Mirror of Medicine 醫宗金鏡, Vol. 2]. This book was republished by the People’s Health Publishing House in 1982, Beijing. This is a collection of writings in two volumes covering 14 disciplines in TCM including acupuncture, external discipline, paediatrics, febrile diseases and women’s diseases. The inner organ and acu-tract illustration plates (which were clearly drawn) are mainly in the acupuncture and external discipline sections of the book.

a) Individual organ illustrations - 12 plates.

b) Acu-tracts - 60 plates.

c) Illustration of individual acu-points locations and the diseases they indicate - 26 plates.

16 Veith, I. p. 25

17 Porkert, M. pp. xiv
Chapter 4 The TCM Body


e. Li Jingwei et al., *Zongshuo gudai yixue shilue* [Brief History of Ancient Chinese Medicine 中國古代醫學史], Hebei kexue Joshua chubanshe, Hebei, 1990, pp. 178-179


g. Yang Yi Ya, *Zongshuo yixue shi* [History of Chinese Medicine 中國醫學史], Hebei kexue jishu chubanshe, Hebei, 1996, pp. 75-76

h. Si Yuan, *Zongshuo yixue shi* [History of Chinese Medicine 中國醫學史], Renmin weisheng chubanshe, Beijing, 1982, pp. 66-67

i. Jia De Dao, *Zongshuo yixue shilue* [An Outline History of Medicine in China 中國醫學史], Shanxi renmin chubanshe, Shanxi, 1979, pp. 150-157


19 According to Chinese medical historians Si Yuan and Zhao Pu Shan, this ‘anatomical dissection’ of insurrectionists generated an interior body chart called *Wu Zhang Tu* 五臟圖 *Illustration of the Five Inner Organs*. Si Yuan claims that the illustration is now lost to posterity. But some of the stories surrounding the chart may be found in other ancient Chinese texts.


22 Yu Shen Chu, op.cit., pp. 147-148

23 Yang Yi Ya, op.cit., p. 75

Another Qing dynasty medical scholar by the name of Xue Sheng Bai was quoted as follows: ‘The Zang and Fu internal organs are the roots of the acu-tract; while the acu-tracks are the branch and leaves of the Zang Fu inner organs’ (Yan Hong Chen et al., *Nei nan jing xuan shi* [Selections from the Inner and Difficult Classics and Their Elucidations 內難經選釋], Jilin renmin chubanshe, Jilin, 1979, p. 28

24 Joseph Needham et al., op.cit., p. 111

25 Ted Kaptchuck also read the history by Jia De Dao but concluded that ‘in China, internal anatomy is generally irrelevant to clinical practice’. (Ted J. Kaptchuck op.cit. p. 71.)

Shigeihsa Kuriyama in *The Expressiveness of the Body and the Divergence of Greek and Chinese Medicine* cited a historical analysis of probably the first recorded ‘anatomical dissection’ in China which was featured in the *Han Shu*. This anatomical dissection unlike the Sung dissection did not generate any anatomical illustration charts. In his book, Kuriyama erroneously concluded that it was ‘ostensibly the first, and quite possibly the only dissection ever conducted in ancient China’. (Shigeihsa Kuriyama, *The Expressiveness of the Body and the Divergence of Greek and Chinese Medicine*, New York, Zone Books, 1999, p. 156.)
Chapter 4: The TCM Body

26 The book *Zhen Jiu Xue* 針灸學 by the Shanghai College of Traditional Chinese Medicine (1977) states:

‘Another aspect on the origins of the principles of acupuncture channels is that it is the result of the ancient observation of human anatomy and physiology’ jing luo xue shuo xing chuang liao yuan de ling i fang mian,shi gu ren du ren ti jie pou he sheng li xian xiang de guan cha de jie guo (Shanghai College of Traditional Chinese Medicine, zhen jiu xue [The Study of Acupuncture] Joint Publishing, Hongkong Co., 1977, p. 18).

This book was translated by John O’Connor and Dan Bensky in 1981. In their translation/interpretation of this Chinese segment of chapter 2 ‘The formation and development of the channel theory’ they wrote as follows:

These observations were based upon a relatively broad understanding of human anatomy and physiology. Two thousand years ago dissections were performed on the bodies of executed criminals as was recorded in the book of Han *The Inner Classics* and a slightly later work, *The Classic of Difficulties*, contain descriptions of the distribution of blood vessels and blood circulation, the connection between the muscles, tendons and ligaments with the bones, joints, and the internal organs (p. 45).

27 In the supposed first ‘anatomical dissection’ in ancient China which was featured in the *Han Annals* or *Han Shu* 許慎 (J.L. Yang, ed.), *Xin Jiao Ben Han Shu Ji Zhu Bing Fu Bian Er Zhong* [New Annotated Volumes of the Han Annals, Vol. 5], Ding Wen Book Company, Taiwan, 1980, pp. 4145-4146. *Ku* means ‘to hollow out’ as in hollowing out a tree trunk, while *bo* means to peel, skin or flay. In the *Han Shu* annotations, *ku* was defined as similar to *pou* or to open-up. However, Homer Dubs, in his translation of the *Han Shu*, translated *ku* and *bo* as ‘dissect and flay’ (H. Dubs, *The History of the Former Han Dynasty*, Waverly Press, Baltimore, 1955, p. 365). In 1991, Yamada Keiji described the capital punishment of Wang Sun Qing in his translation of this segment of the *Han Shu* as just plain ‘dissection’ and the Chinese word *bo* was left untranslated (Y. Keiji, *Anatomies in Ancient China*, *Chinese Science*, No. 10, 1991, p. 39-52). Another barbaric capital punishment practised in ancient China was referred to as *bo pi* 剃皮, which means to skin alive.

28 This is an English translation of Yang Shang Shan’s ‘reconstruction’ of this passage from the *Ling shu*. Yang Shang Shan, an imperial physician, was one of the earliest annotators of the *Neijing*. He wrote the book *Huang Di Nei Jing Tai Su* during the Sui Dynasty (581-618 AD) wherein he annotated many chapters of the Neijing. This passage is an English translation of the following Chinese quote from Yang Shang Shan’s book.

> 人力不可度量。人之八之身，生则溉其皮肉。切虚脉，死则解其身节。视其脏腑。 (Yang Shang Shan, annotator and editor, *Huang Di Neijing Tai Su* [Yellow Emperor’s Inner Classic - A Great Simplification], Renmin weisheng chubanshe, Beijing, 1983 edition of Sui dynasty version, p. 65.)

The original quote in the *Lingshu* which Yang Shang Shan annotated is the following:


In his book, Yang Shang Shan used the Chinese words *jie bu* instead of the words *jie pou*. *Jie bu* in this context means to open up by separating parts, as in untying a knotted shoe lace or opening up a puzzle hidden within; while *jie pou* connotes more an opening up through the use of a knife.

29 According to Wang Yong Kuan, in his 1991 book *Ancient China’s Barbaric Torture and Criminal Punishments*, some of these execution methods like the ‘slow death by a thousand cuts’ or *ling chi* could even last for three days, when the final ‘slash’ was made (Wang Yong Kuan, *Zhongguo gudai xingzi* [Ancient China’s Barbaric Torture, Crime and Punishments], Zhongzhou guji chubanshe, Henan, 1991).

Line illustrations of this ancient brutal method of execution were also featured in the book *A Study of Chinese Legal History*, written by Noboru Niida in 1959.

Photos of the last *ling chi* done in China during the Qing Dynasty are also featured in the book *The Tears of Eros* by George Bataille (translated from French by Peter Connor), City Lights Books, San Francisco, 1989, pp. 204-206.
Chapter 4. The TCM Body

30 Ling chi is also referred to by Derk Bodde as ‘lingering death’. It is a form of capital punishment imposed upon offenders who committed “heinous crimes such as parricide, mutilation of a living person for purposes of witchcraft, murder of three or more persons belonging to the same family and other offences collectively known as the “Ten Abominations”’. According to Bodde, the slicing of the offender’s body could reach up to 1,500 to 4,700 ‘bits’. Shen Chai-pen, was quoted as saying that the rationale for this form of barbaric capital punishment is not so much to inflict torture ‘but to destroy the future as well as the present life of the offender - he is unworthy to exist longer as a man or a recognisable spirit... As spirits to appear must assume their previous corporeal forms, he can only appear as a collection of little bits’. (D. Bode D. & C. Morris, Law in Imperial China, Cambridge, Harvard University Press, 1967, pp. 93-94.

31 Fang Xiang Hong (ed.), op.cit., p. 1
Qiu Ke An, in his book A History of Chinese Culture (1993), says that ‘Chinese (painting) technique admits of no correction, and the artist must therefore know beforehand what he intends to do. He closely observes and stores his observations in his memory. He conceives his design, and having completed the mental image of what he intends to paint, he transfers it swiftly and with sure strokes to the silk. It is said that in a master’s work the idea is present even where the brush has not passed. This, however, demands confidence, speed, and a mastery of technique acquired only by long practice’. Qiu Ke An, A History of Chinese Culture, Henan, Henan University Press, 1993, p. 392


33 ibid. p. 46

34 Doctor Benjamin Hobson, whose adopted Chinese name was He Xin 合新, was a British missionary physician who lived and worked in China in the 1840’s and 1850’s. He hailed from Welford, Northamptonshire, and was a graduate of University College, London. Aside from translating and compiling the book Treatise on Midwifery and the Diseases of Children, he also compiled Chinese the following WLM books: An Outline of Anatomy and Physiology; Natural Philosophy and Natural History; First Lines of the Practice of Surgery in the West; Practice of Medicine and Materia Medica. All these books, according to the historian K. Chinlin Wong, became ‘standard works in Chinese,’ and he refers to ‘their influence not only upon the Chinese in touch with Western medical men but upon scholars in general’. (Wong K. Chinlin & Wu Lien Teh, op.cit., pp. 364-366)

* Please see Chapter 4 Appendix 7a, 7b and 7c which were photocopied from the original book from my private collection.

36 G.D. Lu & J. Needham, op.cit., p. 22
We should actually translate this into Orbisconography and Anatomy.

* Appendices to Chapter 4

39 In 1988, Chinese medical researchers from the Hebei Provinical Medical Institute conducted an ‘anatomical investigation’ of four cadavers to work out the histological structure of the Lung acu-tract. First they consulted the text of the Ling Shu Neijing for a description of the lung acu-tract and then with this ‘old and outmoded’ view of the body they ‘dissected’ the lifeless body to reconstruct a ‘mechanical body with Qi and acu-tracts. After 8 years of study, they came to the conclusion that ‘the histological structure of the lung acu-tract [which are lifeless tissues they dissected from the four cadavers] is the material foundation of the lung-acutract; while the manifesting functions xian xiang [I do not know how they worked this out from the lifeless cadavers] of the lung acu-tract is the functional manifestation of the essence of the lung acu-tract. (Xie Hao Ruan, ‘Fei jingxuixiu zuzhi jiegou de guancha yanjiu’ [Observation and research of the histological structure of the lung acu-tract], Zhongguo zhenjiu [Chinese Acupuncture and Moxibustion], Beijing, No.6, 1988, pp. 35-37.)

30 Wilder G.G. & Ingram J.I., op.cit., p. 229
‘Sheng 生 may also be translated into English as ‘life,’ which is a “symbol of a continuously growing plant. (Rey Tiquia, Traditional Chinese Medicine: A Guide to its Practice, Marrickville NSW, Choice Books, 1996, p. 139

31 Angus Charles Graham, (1958), op.cit., p. 108


33 Y. Crouzet et al., Bamboos, Italy, Evergreen, 1998, p. 14
Chapter 4. The TCM Body


46 In the book *Celestial Lancets: A History and Rationale of Acupuncture and Moxa* (1980), Needham and Lu Guei Djen wrote: 'We have spoken of stars and railways, but the really classical analogy was with the earthly water works. There is no doubt that in the Ching-Io system we have to deal with very ancient conception of a traffic nexus with a network of trunk and secondary channels and their small branches. From the beginning these were thought of in terms analogous to those of hydraulic engineering (readers of SCC will long have appreciated the outstanding importance of hydraulic engineering in the shaping of Chinese culture), involving rivers, tributaries, derivative canals, reservoirs, lakes etc.; and this analogy is quite explicit in the Ling shu. For example, each one of the twelve regular tracts listed in Table 1 below was placed in symbolic correlations with one or other of the great rivers of the Chinese homeland. Thus the pulmonic tract was analogised with the Yellow River...'. (G.D. Lu & I. Needham (1980), op.cit. pp. 22-23.)

47 This is a quote from one of the works of the Qing Dynasty TCM scholar Xue Sheng Bai (1681-1770), featured in the book *Annotated Selections From the Neijing and Nanjing Nei Nan Jing Xuan Shi* by Yan Hong Chen et al. (1979), op.cit., p. 288).

48 *gen ben*

49 *sheng*, or as A.C. Graham puts it, the ‘breeding’ growths of human life.

50 *Yuan Qi*. I am using A.C. Graham’s translation of the Chinese word *yuan Qi* into the English phrase ‘primary ether (Qi)’ (Angus Charles Graham, (1958), op.cit.).

51 *ji*

52 Please refer to note 49.

53 *Jing luo*

54 *Ji biao*

55 *Zang Fu*

56 *Yan*

57 The Five Zang organs are the kidneys 肾, liver 肝, spleen 脾, lungs 肺 and heart 心.

58 *Yin shi*

59 The Six Fu internal organs are the stomach 胃, small intestines 小肠, large intestines 大肠, gall bladder 胆, Triple Burner 三焦, and pericardium 心包.

60 The Chinese name for the ‘epiglottis’ is 会厭. The hui yan is one of the seven important openings 冲门 (door where things ‘rush in or out’). It opens during respiration and closes during swallowing and vomiting. It is considered as the ‘residence’ of the voice and sounds.

61 *Fen liu*

62 *Ge*

63 *Hua gai*

64 *Xin bao*

65 *Jun zhu* The ‘sovereign monarch’ refers to the organ of the ‘heart’ which stores the *shen*.

66 *宗氣*

67 *qing*

68 *xu*

69 *Pi*

70 *Zhong zhou*

71 *wei*

72 *pi*

73 *Yun hua*. *Yun* has always been translated as ‘transportation’ in English. I think *yun* is better understood as ‘turning around’ as in 運轉 *yun zhuan*.

74 *Gan*
Chapter 4 The TCM Body

75 Shen

76 Ji. Yu Zeng in his book The Complete Book on Acu-tracts also refers to ji or ‘spine’ as lu, which also can be translated into English as ‘backbone’ or ‘principal beam’. We can also see the ‘spine’ as the ‘rhizome’ or ‘backbone’ or principal beam or culm of the bamboo tree from which the branching culms spring out. Yu specified the spine as starting from the ‘big vertebra da zhui from the top to the end of the sacrum at the bottom (p. 35).

77 Yao. Yu Zeng refers to the yao as ‘the horizontal bone above the buttocks’ (p. 43).

78 Mai

79 Fu
80 Shu
81 Shui
82 Gu
83 Wan


85 San xuan
86 Shu
87 Pi jing

88 You men
89 Xiao chang
90 Lan men
91 Qing
92 Zhuo

93 湛别清浊 mi bie qing zhuo: ‘One of the functions of the small intestines by which the nutrients are absorbed from the digested food, while the residues are passed to the large intestines and the urinary bladder and discharged as faeces and urine,’ p. 313

94 Pong guang
95 Qiao
96 Shen xie

97 Shen xie. The Neijing Dictionary describes the process of shen 深 as ‘to leak through slowly and in small quantities,’ while xie 深 means to ‘pass down and out’. (Guo Ai Chun, Huangdi Neijing cidian [The Yellow Emperor Inner Classic Dictionary], Tianjin kexue Joshua chubanshe, Tianjin, 1991, pp. 789 & p. 546.)

This process is quite similar to the process of osmosis where water solution moves from an area of greater concentration of solute to a lesser one. The modern translation of osmosis in Chinese is shen tou 深透.

98 San cai
99 Jing
100 Shen jing
101 Yi
102 Mai lu
103 Gui
104 Gen
105 Jing wei
106 Kan is one of the Eight Trigrams in the Yijing representing ‘water,’ and in this context, representing the kidneys.
107 Zhen ming
Gen miao

Xue

Zi gong

Ming men

Tian gen


内景图

旧图有精道，循脊背，过肛门者，甚属非理，而且子宫命门之象，皆大失也，今改正之。

心系七节，七节之旁，中有小囟，以肾系十四椎下，由下而上，亦七节也。

The Inner Body Landscape

Source: Xu Zeng (Ming) Jìngluò quān shū [A complete book on the acu-tract]; Zhang San Xi (Ming) Jìngluò kào [Examining the acu-tracts]; Zhai Liang, Jìngluò huìbian [The Corpus on the acu-tracts]. Li Sheng Shao (punctuation and proofreading), Zhongyi guji chubanshe, Beijing, 1992, p.275
Appendix 3

C. 1601-Portraiture of the Inner Organs 脏腑之圖 Zang Fu zhi Tu
This portraiture is featured in the Great Compendium of Acupuncture
and Moxibustion. 針灸大成. (Yang Ji zhou, Zhen Jiu da cheng [Great
Compendium of Acupuncture] Renmin weisheng chubanshe, Beijing, 1980,
p. 188). This is a typeset printed edition of this book.
H. 16th Century- Inner Body Portraiture 内照圖 featured in the Ming dynasty Taoist meditational book *Meaning of Nature and Destiny*. This Taoist meditational text has been republished recently by the Chinese People’s University Publishing House, Beijing, 1993 together with another Taoist text *Collection on Centering and Harmony*. 中和集 under the book entitled *Heavenly Primordial Inner Elixir Methodology 天元丹法*. This is a typeset edition of this book.
1575, "Ming Tang Ventral/Dorsal Inner Organ Portraiture" "Ming Tang Yang Fu Zang Fu Tu". This portraiture is from volume 1 of an 8-volume thread-bound books entitled "Introduction to Medicine Yi Xue ru Men" authored by a Ming Dynasty medical scholar, Li Ting. These volumes were originally from the private library of F.S. Goon. Now they are part of my private collection.
J. 1874- Ming Tang Inner Organ Portraiture 腎肝明堂圖 featured in the Qing Dynasty (1874) book *Striving School On Acupuncture and Moxibustion Collection* 劉學堂針灸集成 by Liao Run Hong. This book was republished recently (1998) by the *Zhong guo zhongyi yao chubanshe*. This is a typeset printed edition of this book.
This is the front cover of the Chinese biomedical book *Fu Ying Xin Shuo* (Treatise On Midwifery and Diseases of Children) written by Doctor Benjamin Hobson (whose Chinese name was *Ile Xin*). This book was printed in Chinese using new woodblocks cut on the 8th year of the reign of *Xian Feng* (1858). This book was originally part of T.S. Goon’s private library and currently is part of my private collection.
Appendix 7b

Two anatomical cross-section biomedical drawings of an infant coming out of the birth canal. This illustrations are from the book *Treatise On Midwifery and Diseases of Children* written by Doctor Benjamin Hobson.
Appendix 7c

Three anatomical biomedical illustration of the inner and outer structure of the uterus featured in Doctor Benjamin’s book *Treatise on Midwifery and Diseases of Children.*
The front cover of the book *State of the Viscera and Anatomy* published by the Shanghai Book Company in Hongkong in 1990.
性頭風，所以乙酸塩塩對小汗腺有促進分泌的作用。面頰皮膚流
量增加恆作汗腺分泌提供了必要的水分，說明神經的調節及血流
顱骨與汗腺的關係有密切關係。心主血而主神，故古之人
為心主神是有一定的道理，人在精神疲憊或精神緊張時可表現手
燥。醫學性體會汗增多，將為精神性發汗，心熱虛則自汗，心熱虛
則腫汗。心陽虛則汗出冷熱。風懶、肝腎兩虛、陰虛傷心腎汗、
由肺及血的營養功能差，外露於皮膚，這是以“心主神”之理
論來指導的。

二、肺

1. 肺的解剖形態位置

The biomedical illustration of the respiratory system
“superimposed” on the TCM inner organ of the ‘lungs’ fei featured
Appendix 8c

五、膀胱

1. 膀胱的解剖形态位置

膀胱位於小腹中央，屬小骨盆腔前方，與脊骨聯合的後方。膀胱的形状在空虛時近似卵形體，分爲三部：膀胱頂、體及底。當空虛時，膀胱頂不超過脊骨聯合上緣。當充滿時成卵圓形則有不同程度上提。充滿尿時可高出脊骨聯合上緣。膀胱是排尿的平滑肌性囊狀器官，其平均容量，一般正常成人的300～500毫升，最大容量可達900毫升左右（見圖22，23，24，25）。

Biomedical illustration of the reproductive and urological system ‘superimposed’ upon the TCM inner organ ‘urinary bladder’ pangguang featured in the book State of the Viscera and Anatomy.
Chapter 5: ‘Doing’ the Qi in a Translating Knowledge Space

TCM Treatment Modalities

The ‘key’ which opens the door to the TCM knowledge space simultaneously opens to the wider natural and social space outside. People are boiling herbs in their kitchens. Yao remedies are packed in plastic bottles containing herb tablets and granules, bottles of Tiger Balm liniment find their way into people’s medicine cabinets. In people’s bedrooms, acupuncture points are being used as ‘pressure points’ to massage their signs and symptoms away. Even the police have been using the body of Yao remedies like ‘pressure points’ for crowd control. People are choosing and eating foods in accordance with their Yin-Yang cold and hot attributes. Some are waking up early in the morning to get their breath of Qi through Qigong and Tai Ji Quan exercises. Supermarket shelves now stock a herbal preparation called ‘Clearing the Way’ Xiao Yao San, which is used to clear Liver Organ system Qi stagnation. The corporate body of TCM practitioners is being officially registered as legitimate health practitioners in accordance with the provisions of the Victorian state legislation - The Chinese Medicine Registration Act 2000. Through the TCM assemblage of the corporate body of TCM practitioners, patient bodies, and the body of Yao or remedies, the TCM knowledge space is expanding as local clinical and even everyday practices develop in diverse contexts.

In chapter 5 I consider how the ‘Qi’ is done in a translating knowledge space, it leads into my final chapter which focuses squarely on the Qi. Yao is one of the pivotal agential figures within the TCM assemblage. It is an interventionary tool that TCM practitioners have at their disposal when practising the ‘tailoring of remedies to a diagnosed clinical pattern,’ which is referred to in Chinese as bian zheng lun zhi. Yao is a modality of TCM body-TCM...
practitioner communication. It mediates the interactions between the TCM practitioner and the TCM body. It opens up particular possibilities or ‘lines of communication’ between the body and the TCM practitioner.

In beginning to ask how we might understand herbal medicine and acupuncture within traditional Chinese medicine (TCM) and how they ‘do’ the Qi, we need to remember that TCM is a system of medical practice embedded in the ethic which understands health-as-balance. The general aim of the therapy is the restoration of balance from imbalance and preventing imbalances. Health is the preservation of balance and the prevention of imbalances. Therapies used in TCM, i.e. acupuncture, ‘herbs,’ food and tuina, as well as health preservation systems like Taijiquan and Qigong, are considered as agents which redress imbalances manifesting as illnesses or signs and symptoms of clinical patterns:

[T]he story behind traditional Chinese medicine is actually a composite picture; a working together of varying ways of picturing balance. Working different ways of picturing balance together can give a precise and sensitive way to detect and represent imbalance, and provide a framework for recommendations to restore balance.\(^1\)

In TCM, health is a balance between the imaginary Yin and Yang which metaphorically express a cultural imaginary. A healthy body is one where there is balance between body and mind, as well as between the human body and the body of environment. Health means having a life free from discomfort, pain and suffering, which imaged as a beam-balance scale deviating towards imbalance. The ideology or imaginary of health-as-balance is also embedded in the Chinese characters which refer to TCM, Zhong Yi 中 as well as in the Chinese character Ping 平 which conjures the image of ‘balance’. Ping means free
expansion on all sides, level or tranquil. 

In the ancient way of writing the character for ping (平), a contracted version of the character for the imaginary Qi (气) is shown overcoming an obstacle, represented by the Chinese script for number one yi (一). This conveys an image of an uninhabited and free Qi flow. Another character Ba (八), which is the Chinese word for ‘number 8,’ is inserted in between the two ‘hindrances,’ represented by two number ones Yi (一) placed on top of one another. This enhances the meaning of an ‘unimpeded Qi flow’ in the Chinese character Ping (平).

A balanced and healthy person is therefore referred to in the Chinese language as a ping ren (平人). A ping ren is level-headed, calm and in harmony with himself and the world around him. S/he is a healthy, well-centered person with his/her Qi flowing freely, and enjoys freedom from any extremes and deviations. S/he is a product of balance between the overall body resistance (Zheng Qi Yang and all disease-causing factors Xie Qi Yin; the body exterior Yang and the interior (Yin), the Qi Yang and the blood Yin; Hollow Organ Systems Yang and Visceral Organ Systems Yin; body functions Yang and body constitution Yin.

The Yellow Emperor asked: ‘How does an excess clinical pattern come about? How does a deficient clinical pattern come about? Please explain how these conditions come about’.

Qi Po replied: ‘The Yang acu-tracts as well as the Yin acu-tracts both have acupuncture points through which they enter and leave. For example, if the Qi and blood from the Yang
Acupuncture flows into the Yin Acuttract, then the Qi and blood from the Yin acu-tracts will overflow outside. In this way, the Yin and Yang are in balance, the body form will be replenished and substantiated; and the configurations of the Nine Regions of the pulse will manifest in unison. This is what we refer to as a Ping Ren.

When the Yin and Yang balance is disrupted, dis-ease Bing 病 and its clinical patterns or Zheng Hou emerge. Signs and symptoms of imbalance occur. In TCM, the general therapeutic approach vis-à-vis clinical patterns or imbalance is to restore the balance Yi Ping Wei Qi 以平為維期, that is bring about a reversal from imbalance to balance, from illness to health, from Bing to Ping, from disharmony to harmony, from extremities to the centre. Parallel to the recognition of the varied manifestations of health as balance and illness as imbalance over thousands of years is the realisation of the balancing attributes (therapeutic action or Gong Xiao) of thousands of TCM ‘remedies’ or Yao 藥.

The Yao 藥

Yao 藥 is a Chinese word for which an equivalent English word is very difficult to find. It has been loosely translated into ‘herb,’ an English word which actually refers only to plants, whereas in TCM practice Yao includes plant materials, minerals, animal by-products, food matter, etc. In ancient times, the Chinese word Yao is sometimes combined with another Chinese word Yong 用 (‘to use’) as in Yong Yao 用藥 which means zhi liao ‘醫療 to treat’ ‘Hence, the Chinese word Yao also means ‘to Yi 醫 ‘to treat’ ‘藥, 猶 醫也’ Yao, you yi ye “medicine is just like Yao” 6. By extension then, we can say that doing Yao is similar to writing the Chinese word Yi 藥 yi which brings the actants in this assemblage of Chinese
Chapter 5  ‘Doing’ Qi

characters into life stroke by stroke. From the ‘dot’, the inscription moves horizontally, vertically, crosses, slants downwards and upwards, and the agential figure comes to life. In this sense, we can say that yao can be understood as referring to those routine therapeutic practices that move the patient’s Qi including acupuncture, tuina (traditional Chinese massage), food therapy, prescribing materia medica, Qi exercises (Qi gong), Taiji quan etc.

Through these routine therapeutic practices, the specific yin or yang Qi inclination ‘僧’ of each yao is ‘manipulated’ to put into balance the disharmonious clinical pattern of a contingent, specific local patient. This specific yin or yang Qi inclination ‘僧’ of each of these routine therapeutic practices or yao is the ‘specific Qi nature’ 氣性 Qi xing of each and everyone of them. Yao therefore refers to those therapeutic practices designed to address imbalances in the flow of Qi

Here in the State of Victoria, with the passage of the Chinese Medicine Registration Bill 2000, a ‘new discipline’ in TCM has been born - ‘Chinese Herbal Medicine,’ which, when translated back into Chinese, becomes Zhong Yao Liao Fa, a Chinese term which sits incongruously with other traditional TCM disciplines. Sometimes the word yao is translated as ‘remedies,’ which suffers from being a very general term in English. Some people translate yao as ‘materia medica’. Wieger, Wilder and Ingram translate yao as ‘medicine’ (Wilder, 1974, 155), (Wieger, 1965, 658). In ancient Taoist meditational practices yao refers to the ‘meditational state’ resulting from compounding, tempering or xiu lian of the principles of the ‘essence’ 精, Qi 氣 and ‘spirit’ 神.

The Chinese Medical Dictionary (1921) defines yao as ‘all objects or substances which can be used to treat diseases’ 凡物可以治病者皆謂之藥. These ‘materialities’ or wu 物 include
Chapter 5  Doing ‘Qi

‘grain’ 穀 which have Qi 氣, ‘body’ 體, ‘colour’ 色, ‘flavour’ 味, ‘form’ 形, ‘nature’ 性,
‘ability’ 能 and ‘strength’ 力. The Kang Yan Classical Chinese Dictionary defines yao as
‘those categories 類 which can heal 愈 diseases 疾, such as ‘plants’草, ‘trees’木, ‘metal’ 金,
dictionary Shuo Wen defines Yao as ‘plants which cures diseases’治病草.’

The ancient Chinese script for yao 營 is made up of symbols for a musical instrument,
consisting of bells and a drum set on a wooden platform, with a radical character representing
plants or grass on top. “The drums are on the sides and the bell is in the middle. This
instrument gives the five sounds of the Chinese scale. These five parts of the instrument are all
in tune.” So yao refers to the orchestration of music which can provide pleasure and joy, just
as properly used medicines, medicinal or healing remedies restore balance, harmony and health,
and freedom from illness and pain: hence pleasure and joy in life and ‘the proper functioning of
the body’.

The Medicinal Value of Yao

Yao is an integral part of the practice of TCM. The yao is our professional tool, our ‘primary
medical resource’. As the Ming Dynasty medical scholar Li Shi Zhen puts it, the yao or Ben
Cao ‘is the physician’s roller,’ hoe, bow and arrow’ 本草者, 医家之鍾弓矢也.” What is
in this yao which creates its value as medicine? It is the nature of the yao to embed a Qi. Qi
assumes a Yin and Yang life, a motion dichotomising into dispersion, condensation,descending,
ascending, sinking, floating, expanding, contracting, moving in, moving out, hot and cold etc.
Plants, animals, minerals humans and non-humans all embed this ‘life’. We might understand this as the emergence of entities which are live in this system. The metaphor of ‘live’ here means not biologically live but something closer to the notion of a ‘live electric wire’. The wire is ‘live’ only within a particular configuration, and particular understandings are needed to generate that configuration.

When the human body’s Qi is out of balance as in having a deficient Qi, Qi exhaustion, Qi stagnation and so on, different categories of yao with an appropriate Qi nature (differentiated Qi) are used to restore the unbalanced Qi into balance. It is relatively easy for the Western mind to accept that biological organisms or even natural items like rocks have Qi (as in the revival of the practice of Feng Shui in the West). But it is much less easy to accept that a contrived object like yao has Qi.

As medical objects and tools generating a dynamic Qi motion, these yao, when used to deal with illnesses, imbalance or disharmony in the human body, are found to bring about balance, harmony and health.

Specifically, each individual yao is a ‘condensed Qi’ ju Qi 聚氣 or ‘clotted Qi’ with a specific nature or attribute vis-à-vis defined clinical patterns. This specific nature of a specific yao is referred to as its pian sheng 偏性 - inclination, deviation, or bias. The specific nature of each individual yao defines its balancing or harmonising effect upon the ‘TCM body’. Specifically, this means that every yao may be inclined towards being hot, cold, cool, warm, ascending, floating, descending, sinking, moistening, drying, sweet, pungent, sour, salty bitter, tonifying, sedating, associated with or inclined towards a particular organ system Zang-Fu 脏腑 or certain acu-tracts gui jing 归经 of the TCM body.
Yao 藥 In China

The use of yao as a therapeutic tool which balances the flow of Qi, has a history of more than four millennia in China. From the time of the *Yellow Emperor's Classic of Internal Medicine* through to the time of Zhang Zhong Jing during the Eastern Han Dynasty up to the period of pre-modern China when TCM and Western scientific medicine first converged, there has been an unbroken cross-fertilisation between practices of Chinese medicine and the use of Yao and the thoughts and religious practices of Taoism. As Joseph Needham observed:

"Ancient Chinese medicine was closely associated with the beliefs of the philosophers who may broadly be termed Taoist. In contradistinction to the Confucians who were interested primarily in human society alone, the Taoists devoted themselves to the study of Nature, believing that man’s life should be lived in conformity with her, and they developed a system of religious mysticism, which has been termed the only one ever known in the world which was not essentially antiscientific. The Taoists believe in the possibility of attaining a material immortality so that they could continue to exit as etherealized beings on the earth, enjoying the beauties of nature. For this purpose they engaged in the study of alchemy, sought drugs which could confer longevity or immortality, and practised all kinds of techniques (some ascetic, some not) which they thought might contribute to this end. Their relation with preventative medicine was therefore particularly intimate. They spoke of the art of nourishing the life (yang sheng) concentrating special attention on the inner causes of illness, which they pictured as the result of an improper balance between the Yin and the Yang. It was necessary to harmonize the two in order to remove the the cause of disease."

"While in the latter times (e.g. in the thought of the 13th century Neo-Confucians) chhi (Qi) came to mean all forms of matter, from the most condensed, to the most tenacious; in ancient China it referred rather to the subtle matter (comprising what we should now think of as gases, and vapours, radioactive emanations, radiant energy etc.) and invisible biological influences (including nerve impulses, hormonal actions, infections and contagion). In medical thought chhi was something like a vital force in living mind-body organisms, acted upon favourably or unfavourably by other chhi from the envi-
Chapter 5  ‘Doing’ Qi

... but also itself sometimes capable of spontaneous malfunction...and like Tao it is better left untranslated.”

“The object of the devout Taoist was to transform himself by all kinds of techniques, not only alchemical and pharmaceutical but also dietetic, respiratory, meditational, sexual and heliotherapeutic, into a Hsien, in other words an Immortal, purified ethereal, and free, who could spend the rest of eternity wandering as a wraith through the mountains and forests to enjoy the beauty of Nature without end.” 14

In contemporary times, the “alchemical and pharmaceutical” and “drugs” refer to the use of materia medica; “dietetic” corresponds to the use of food matter as balancing tools; while “respiratory, meditational and sexual and heliotherapy” refers to the practice of Taijiquan, Qigong, and Taoist yoga meditation practices.

However, with the continued propagation and deepening of the Chinese Mainland policy of integrating TCM with Western medicine Zhong Xi yi jie he, the holistic, vitalist and Taoist philosophy which underpins the above practices of yao is continuously being fragmented and ‘reduced’ into discrete ‘science-like’ disciplines i.e. the separate disciplines of acupuncture 針灸, moxibustion 灸療法, cupping 拔火罐, Chinese herbal medicine 中藥, Chinese herbal formulary 方劑, traditional Chinese massage 推拿, Chinese infant massage 小兒推拿 and traumatology 骨傷科 etc.

Chinese Materia Medica

Historically, in terms of the Chinese materia medica, information about them has been compiled, publicised and referred to as ben cao. Ben refers to a bound manuscript or a book, and cao to shrubs, grass or herbs. Ben also means the root of a plant, which can also mean the ‘origin’ of things. The first codified ben cao was the Shen Nong Ben Cao, written in the years 1-2 BC, which documents the use of 365 materia medica - 252 plants, 67 animals and 46
mineral yao. All these materia medica were classified into three grades of categorisation. The use of the plant Ginseng was first documented in this ben cao.  

The Collection and Annotations on the Ben Cao Classics 本草經集注, written by Tao Hong Jing in the year 500 AD, increased the number of yao collected and documented from 365 to 730. Based upon their origins, yao were classified into 10 different categories of jade and stones, shrubs and trees, insects and beasts, fruits, grains etc. In 657 AD the first state-sponsored compilation on yao was published - the Revised Ben Cao (Xin Xiu Ben Cao). About 850 yao were included in this ben cao, which also featured line illustrations. In this collection, about 20 yao from outside the Han empire were included. During the Song Dynasty, the number of yao in use increased to 984 with the publication of another state-sponsored ben cao - the Open Treasure Ben Cao (Kai Bao Ben Cao).  

Over half a millennium ago, from 1552-1578 AD, the Chinese medical scholar Li Shi Zhen undertook a most comprehensive investigation into China’s materia medica resources. After 26 years of scholarly work, he published the celebrated volumes of the The Great Systematic Materia Medica of 1576 (Ben Cao Gang Mu), which compiled information on 1,892 yao or materia medica. This volume, which evolved a very innovative system of classification and ordering of yao, included 1,094 plant materia medica, 443 animal materia medica, 275 mineral materia medica and seventy nine others (Xue Y. 1984, 282). These yao, over a thousand, were classified into 46 categories:

1. Water 水
2. Fire 火
3. Earth 土
4. Metal-Stones 金石
5. Grass or Herb 草
6. Grain 谷
7. Vegetables 菜
8. Fruits and Melons 果
9. Trees 木
10. Implements and Utensils 服器
11. Insects 蟲
12. Scaled Creatures 鱗
13. Shelled Creatures 介
14. Fowls 禽
15. Beast 獸
16. Humans 人

The tradition of compiling information on Chinese materia medica continued up to the modern times with the publication of the *Encyclopaedia Of Traditional Chinese Medicinal Yao (Zhong Yao Da Ci Dian)*, with 5,767 entries on various yao. This *yao* pharmacopoeia was published by the Jiangsu Provincial New Medical College in 1977. It contains information on the nomenclature (Chinese names and standard botanical and zoological names), description of the *yao*, the part used, traditional attributes (flavour, Qi, Acutact association), traditional clinical use, processing and dosage. This contemporary pharmacopoeia also contain results of biomedical and pharmacological research into the active constituents of these *yao*. 
China also promulgates state-sponsored standard yao pharmacopoeias which attempt to set national standards in the quality of materia medica. The 1985 *Pharmacopoeia of the People's Republic of China (Zhong Hua Ren Min Gong He Guo Yao Dian)* comes in two volumes. The first volume sets quality control standards for the yao and yao preparations, while the second volume sets the standards for Western pharmaceutical drugs. The first volume provides information on the 455 most commonly used yao and about 140 'formed yao' (cheng yao - patent herbs). The information included the yao's nomenclature, description of physical appearance, identification using micro and macro physicochemical methods of identification, therapeutic action, indications, contraindications, dosage and methods of storage.

A nation-wide Chinese materia medica resources survey, covering 80% of China's land area and conducted over a period of 5 years under the auspices of the National Council (the executive arm of the Chinese Parliament), revealed in 1983 that there are now 12,807 materia medica currently in medical use in China. Out of this number, 11,146 are of plant origin; 1,581 are of animal origin, and 80 items are of mineral origin."

Out of 12,807 materia medica only 1,200 are considered as *yao cai* or materia medica materia, i.e. individual materia medica that has been initially processed *pao zhi* and commodified for traditional clinical use. Of this number, only 500 to 600 *yao* are used in TCM herbal medicine practice. Out of the 1,200 odd materia medica, 800 to 900 species are plant *yao cai* (about 90%), 100 species are of animal origin, while 70 to 80 are mineral *yao cai*. Of the plant materia medica material, 200 to 250 come from plant roots, 180 to 230 from seeds or fruits, 160 to 180 from whole plants, 70 to 80 from flowers, 50 to 60 from leaves, 30 to 40 from tree barks, 40 to 50 from crawling vines, and 20 from fungus and mushrooms. Among the materia medica of animal origin, 30 to 40 are from invertebrates, 30 to 40 from insects, 40 to 60 from aquatic creatures, amphibians and reptiles, and 60 to 80 from beasts.
Western Yao

Western laboratory-based medicine or pharmaceutical drugs, which the Chinese referred to as xi yao (Western drugs) or yang yao (foreign yao) - opium included - flooded the Chinese market after the Opium War and subsequently ‘displaced’ and hegemonically translated Chinese imaginaries and its traditional system of yao and medicine.

After Western laboratory-based medicine came to China, Western drugs came with it. Almost in every province and cities of my country, Western chemist shops were set up. These drugstores almost all came from Shanghai and other major cities. According to the 1941 census there were more than eighty chemist shops in Beijing, and their head shops are in Shanghai. Major chemist shops in Shanghai also have their branches in major towns. Most of the Yao sold in these shops came from overseas. They include poison yao like opium and heroin. They destroy human health and are used rampanty. At the same time Western drugs are very expensive and the broad poverty-stricken labouring people have no means to buy them. For example, when the infectious disease Ala-Kasar or ‘black fever’ struck the Lu Nan District in the north of Jiang Su province, many people perished. There was then a Western drug that was used to treat ‘black fever’ called ‘New Antimony Powder’. Each patient had to pay 30 yuan for this drug. Several poor folk had to pool their money to buy this drug. Those who had no money had to wait for their death. It is just too horrible to talk about.

Through the power of the literary devices deployed by biomedicine, Western yao also found their way into China’s traditional materia medica pharmacopoeias. The book Records of TCM and Western biomedicine in Combination includes 45 Western pharmaceuticals in its listing of yao, like Aspirin, Aether, Acidum hydiochloicum, Oleum Ricini, Magnesium Sulfarium, Natrium Chloratum and Adicum Coricum.
Another materia medica pharmacopoeia, published in 1924 by Chen Ren Shan and entitled
_Differentiating Materia Medica from the Place they are Produced_ 藥物出產辨, lists 54
Western _yao_ including ‘opium’ 鴉片, menthol concentrates 薄荷腦, cod liver oil 鯷魚肝
油, and manatee or sea cow 海牛. 22 An existing copy of this book originally belonged to the
private library of T.S. Goon, a Chinese herbalist in Melbourne during the 1930’s.

**Thriving Chinese Materia Medica in Australia**

In Australia, after more than one and half centuries of ‘clandestine’ existence, no
comprehensive study has been conducted on the Chinese materia medica used clinically by
TCM practitioners. Using 1990 price quotations listings from two major wholesalers of
materia medica material _yao cai_ (one from Sydney and another from Melbourne) it can be
confirmed that 600 to 800 items of materia medica materials are used by TCM practitioners in
this country. One of the wholesale price lists records 767 materia medica materia or _yao cai_
made available for sale to TCM practitioners. Within this number 695 are of plant origins,
thirty from mineral origins, seventeen of animal origins and three of human origins i.e. human
hair ash, dried placenta and urine crystals 人中白. Among the animal _yao_ are tiger bone gel
虎骨膠, monkey bone gel 猴骨膠, deer antlers, seal gonads 海豹鞭, sea horse, pangolin
scales 山甲, yellow inner lining of the chicken gizzard, land tortoise shell 龜板, moulded
cicada skin, antelope horn, wingless cockroach 土蜚蠊, dried earthworm and abalone shells.

Most of the above materia medica are imported from Hongkong, Taiwan, Singapore and China.
However, a growing number of ‘indigenous _yao_’ i.e. plants, mineral and animals, are now being
‘grown’ and utilised locally. Examples of the locally evolving and developing materia medica
now available and in use in Australia are ginseng (*Panax quinquefolium*, now growing in the
Victorian countryside, with seeds obtainable from local plant nurseries), gingko biloba, arsenic (used by biomedical health practitioners to treat cases of leukaemia), garlic, ginger, spring onion, mung beans, adzuki beans, nashi pear, seaweed, cattle gall stones and deer antlers. Sea horses are now being farmed in Tasmania. As well, some of these materia medica are being exterminated as pests by people unaware of their traditional healing value. They include cane toad secretions, fennel seeds, ragwort, camel thorn, wild teasel, St. John’s wort, mugwort, nutgrass and dodder.

Using contemporary Chinese materia medica pharmacopoeia as a screening tool, I have scanned Australian botanical literature for Chinese plant materia medica growing locally. So far, I have located about 243 Chinese plant materia medica growing in Australia. Using the PRC State materia medica pharmacopoeia, the above-mentioned material medical price quotation list and my own private practice as 'filtration devices,' I have narrowed down this number to 131 essential plant materia medica. This is sufficient to supply the materia medica material needs of an average individual TCM herbal practice in a suburban area in Melbourne. After an initial census of Chinese plant materia medica growing in the Royal Botanical Garden of Melbourne, I have so far confirmed that 40 of these plant materia medica are growing there. (See Appendix 2 to Chapter 5.)

Within the Royal Botanical Garden of Melbourne (RBGM) a new 1,650 square metre 'garden space' is emerging. It is the 'Southern Chinese Collection,' which will be a dedicated space for 4,000 botanical collection of plant species from southern China. In recent years some of these Chinese plants have been collected from the wild in China and then transplanted into the RBGM. This garden space will be 'used as a place to celebrate Chinese festivals or cultural
art forms such as painting, music, and dance. In addition it will highlight the cultural importance of Southern Chinese flora for festivals, traditional medicine, textiles, and food, and emphasise their importance in Chinese art and literature. The Southern Chinese collection will also:

- Aid in the conservation of rare and threatened Southern Chinese species and interpret the importance of conserving threatened populations,
- Interpret the history and interest in Southern Chinese flora, including tea production and the horticultural importance of species and hybrids,
- Display a great diversity of rare and common Southern Chinese plants with an emphasis on plants from temperate and subtropical regions of southwest China; provide visitors and education groups with a more intimate 'hands-on' experience of Southern Chinese plants.

The Royal Botanic Garden Melbourne Master Plan states:

The mission of the Royal Botanic Gardens is to advance knowledge and enjoyment of plants, and to foster their conservation, in order to give people a better understanding of the essential part that plants play in all life on Earth. This will be achieved through research, management and interpretation of living and preserved plant collections.

On 29 September 2000 I was taken on a tour of the Southern Chinese Collection by one of the curators of the RBGM, Ms Terry Smyth, who had been to China on four occasions (1992, 1994, 1996, and 1998) collecting botanical species for ex-situ transplantation from China to the Southern Chinese collection plant beds of the Melbourne Botanical Garden. Some of the plants in this collection also ended in this temperate climate of Melbourne through the international seed exchange programme, index seminum. Terry is a horticulturist and currently learning Mandarin. She is also acquiring a knowledge of both the horticultural and traditional Chinese medical value of the plant species from South China. She drew my attention to the dark green
grass-like plants growing along the edges of the plant beds in some parts of the botanical garden. She said that it was Mondo grass, which is becoming a favourite ornamental plant in Melbourne and Victoria, and that it has nodules on the roots which are used as medicine. She told me that the botanical name of Mondo grass is *Ophiopogon japonicus*. I told Terry that this plant is referred to in TCM as *Mai dong* 麦冬, and that it has the therapeutic properties of ‘tonifying the Yin’.

Terry also pointed to a cluster of tiny plant seedlings a couple of inches long. She said that this plant had just been planted from a collection which came from China. It is the essential medicinal plant *Jie Geng* 桔梗, *Platycodon grandiflorum* which can clear heat and alleviate soreness of the throat when one is having a cold. Another plant which Terry showed me was labelled as *Camphorosma acuminata*, which, as she discovered in one of her trips to China, has ‘cancer reducing properties’. The name of the plant in Chinese is 喜树, which means ‘Happiness Tree’. An orchid bearing pink flowers, which she said had medicinal properties of ‘reducing swelling,’ is *Bletilla striata* 白及 *Bai Ji*. This is another essential medicinal plant whose dried tuber is an effective medication for internal and external bleeding, i.e. severe menstrual bleeding, or stomach or intestinal bleeding. Another plant in the Botanical Gardens which is commonly used to staunch bleeding is *Trachycarpus fortunei*. The charred aged petiole of this plant is used as materia medica and is referred to as *Zong ban* 棕板. I asked Terry about the Latin name of this plant. She said that the species nomenclature ‘fortunei’ comes from the name of the British botanist Fortune, who ‘discovered’ this plant in China.

*Isatis tinctoria* or *Banlangen*, a bushy plant, can also be found in the Herb Garden and Plant Craft Cottage of the Botanical Garden. The garden census shows that this plant was introduced in 1981. Other Chinese medicinal plants which I saw at the botanical garden are
Agastache Rugosa, Paeonia Suffruticosa, Lirope Muscari, Camellia Oleifera, Curculigo Molineria and Gingko Biloba. I also had a significant encounter with the ‘live’ Changshan, more than a meter tall, with her violet flowers in full bloom.

Back in the 1940’s in China, Changshan (whose root is used as a yao to treat malaria) figured in a controversy between TCM and biomedical practitioners. This resulted in the Changshan’s traditional Qi properties being hegemonically translated as an ‘unidentified isolated alkaloid’ and reworked into the biomedical socio-technical network.\(^9\) In the twentieth century the values of Western science became the sole criterion upon which TCM was to be judged. An all-powerful ‘scientific translation,’ as mentioned elsewhere, provided the universal theoretical benchmark imposed on ‘pre-modern’ knowledge systems and cultures like traditional Chinese medicine. To be accepted as ‘scientific’ the elements of TCM practice had to be de-localized and placed in ‘universal’ theoretical frames.

In a critique of modernity and the hegemony of this mode of scientific translation which governed the interaction between the two medical knowledge systems, Doctor Sean Hsiang-lin Lei from the Center for the History of Science and Medicine, University of Chicago, writing in the June 1999 issue of the Social Studies of Science, pictured the dominant translation network in this way:

In short, in the Reversed-Ordered Program,\(^{30}\) Chinese drugs would more or less circulate in their traditional socio-technical network until Western-style doctors succeeded in materially reducing them into the constituents of their network. In this case, Chinese doctors had a good chance to travel with the Chinese drugs into places where they had not previously had access (like in hospitals). On the contrary, if the Received Program did work, the fully scientised drugs would be taken away from the hands of Chinese doctors. Drugs would be synthesised chemically, named by their chemical composition, designated
to treat “Western” diseases, and circulated in the network of Western-style hospitals, laboratories and pharmacies. Chinese doctors had nothing to do and nowhere to go except to watch the inevitable demise of Chinese medicine.

According to Doctor Sean Hsiang-lin Lei, scientific translation, unlike translation between common languages, ‘presupposes a highly asymmetric relationship between the host language (scientists’ social-technical network) and the guest language (Chinese doctors’ socio-technical network)’. Furthermore this type of ‘translation’ monopolizes the means of scientific translation, is strictly one-directional (the basic categories of the host language are unchanged), and is a ‘complete translation’ with information being translated in its entirety as measured by the practical purpose of the host language.

In a historical case study focusing on changes in China in the 1940’s, Lei looked at the fate of one of the TCM tools of medicine, changshan (a herb root constituting part of the yao used to treat malaria), that was, as he put it, ‘de-coupled’ from the TCM socio-technical network and then allowed to circulate within the biomedical social-technical network. Changshan was materially transformed ‘from one of the seven drugs in a prescription into an unidentified isolated alkaloid’. This hegemonic network translates everything to its (inverse) mirror image.

Not only was Changshan made part of the biomedical socio-technical network, but the TCM practitioners and their medical practice were displaced and excluded. The move follows the conventional line which accepts the domination by science of other knowledge traditions, and leads to the extinction of traditional Chinese medicine as an expanding body of practice and knowledge.
Through the efforts of Australian horticulturists like Terry to localise _ex-situ_ the Chinese plant _yao_ in Australia, as well as through the endeavour by TCM practitioners and other agencies to legitimise the practice of TCM in Australia, _Changshan_ and other plant _yao_ are starting to lead a legitimate life in the garden space of the Southern Chinese Collection at the Botanical Garden. This garden space is becoming a locus of plant _yao_, botanical and TCM and laboratory-based expertise, and the study of biomedical entities like DNA and alkaloids. It will be a space to advance the knowledge of plants, a shared translation space wherein TCM and biomedicine can coexist. In no way will Changshan be hegemonically translated into an ‘unidentified alkaloid’.

**Chinese Materia Medica and Endangered Species**

I come now to the issue of certain species of plant and animal materia medica which are becoming extinct. Like all environmentally conscious citizens of this continent, we as TCM practitioners in Australia are most concerned about the extinction of the tiger, rhino, bear and Manchurian ginseng. In many ways these have now become a TCM trademark in the West, including Australia. We are first to recognise the impact of their extinction on our medical practice, for they constitute part of our primary medical resources. Hence, we support efforts that will enhance their continued survival. Viewed from another perspective, their survival is linked to the survival of our profession. The continued existence of our primary medical resource, Chinese materia medica, means the survival of our practice of _Li Fa Fang Yao_ (choosing individual therapeutic agent for a formula on the basis of the established therapeutic method and principle) in Australia.
However, we are concerned about the increasing number of our medical resources (animal and plant based) on the list of endangered species, and the ways in which decisions are made by certain agencies to put them on that list. A working manual used by one Australian Federal Government agency includes the following very commonly used Chinese materia medica in their list of banned endangered species.  

1. Panax ginseng *Renshen* 人参

2. Pinellia ternata *Banxia* 半夏

3. Cibotium barometzi *Goujizi*

4. Gastrodia elata Blume *Tianma* 狗脊子

5. Panax quinquefolium *Xi yangshen* 西洋参

6. Dendrobium nobile *Shihu* 石斛

7. Bletilla striata *Baiji* 白及

In addition, it has to be pointed out that recent campaigns against the use of such resources as tiger bones, bear bile and rhino horns have led to a negative stereotyping of our practice. Despite attempts at correction, certain myths perpetuated by uninformed members of our community refuse to disappear. One of these myths is that tiger bones, rhino horns and bear bile are used as aphrodisiacs. This relates to the old link between the ‘other’ and ‘sex’. And then there are media stories coverage emphasising exotic TCM materials like deer penises, bull testes and seal penises.  


Yet another image is that of "cruelty" to animals, typified in the bear bile campaign. We are still reminded of the picture of the huge bear kept in a cramped cage and milked of gall bladder bile through a surgical procedure. Questions are then asked as to the reason for the cruelty and the use of the bile. The answer: TCM uses it as an aphrodisiac. And a simplistic analogy is made: TCM equals cruelty to animals. This is little different from the fiasco in the Victorian Parliament described in Chapter 3 regarding the use of leopards, bats, magpies and pigeon dung in Chinese medicine.

How might we establish a more transparent system to draw up the list of endangered *yao* species? The international system should work closely with the TCM profession and related industries. With the establishment of the Chinese Medicine Registration Board in Victoria this work can be attended to expeditiously. In addition, a comprehensive ‘census’ of plant, animal and mineral Chinese materia medica used in Australia must be conducted. In this study, emphasis must be put upon finding alternatives to those materia medica which are becoming extinct. And finally, to prevent the stereotyping of TCM in Australia, an education campaign should be launched to raise community awareness of TCM as a tradition of health care that is part of our pluralistic medical system, with the emphasis on how this Australian tradition of health care can complement the knowledge and resources of other medical traditions in promoting the health and well-being of all Australians.

**Chinese Materia Medica and Biomedical Entities - The Interactions**

**Chinese materia medica preparations with pharmaceutical ingredients (CMMPPPI)**

Knowing something about the *yao* as a tool in TCM practice, we come now to its interaction with entities with which it has a long-standing and seemingly ‘unreconciled relationship’:
biomedical entities. These are contrived phenomena generated from a constellation of laboratory practices. They are a stable set of practices which in turn generate standards and criteria. In his book *Science in Action* Latour helps us to see DNA in this way. Latour shows that once things hold in the complex negotiations between human and non-human, material and non-material actors in a laboratory setting, the entire set of practices and stories, the messy and difficult laboratory procedures and their justification, become mundane and conventional - something which anyone can do who is sensitised to the 'story' (theory) and has trained eyes and hands.

Aside from the DNA, other biomedical entities produced by the immense industry of our laboratories are the alkaloids, injections, viruses, immunisations, bacteria, glycosides, genes, pharmaceutical drugs, synthetic hormones etc. Following the opium war, China’s ports were forcibly opened to Western medicines, which came with the gamut of biomedical entities and the culture embedded in them: *Aether, Aspirin, Acidium hydriochloicum, Magnesium sulfurium* and *Natrium chloratum Adicum Coricum* found their way into the Chinese *yao* pharmacopoeia.

Eventually biomedical entities (mainly pharmaceutical drugs) found themselves interacting with Chinese materia medica in some proprietary medicines which I refer to as Chinese materia medica preparations with pharmaceutical ingredients (CMMPPi). CMMPPi are therapeutic products which are manufactured from a combination of Chinese materia medica and pharmaceutical substances. They are mainly manufactured in Mainland China and come in standard pharmaceutical form such as sugar-coated tablets, injections, syrups and tinctures, or in traditional *yao* form like *wan* (Chinese pills made from pulverised *yao* using honey or water as binders) and *chongji* or granulated powders. The CMMPPi and traditional Chinese materia
medica preparations which are made into tablets, pills and so on are collectively referred to as ‘formed medications’ or *cheng yao*.

A typical example of CMMPPPI is a tablet for use against viral influenza and common colds which has the proprietary name of *Ganmao Su An Pian*, which translates into English as ‘Quick Relief Cold Tablets’. Its main ingredients are:

1) Rheum officinalis root *Dahuang*

2) Bos taurus domesticus (cattle) gall stones *Niu huang*

3) Dexamethasone 地塞米松

In 1994, two asthma patients in Melbourne suffered side-effects such as moon-shaped faces and fluid retention after being prescribed CMMPPPI imported from Mainland China containing the steroid drug Dexamethazone and the bronchial dilator drug Theophylline. The Victorian Government Health Department press release on this incident quoted one of the patients as saying that she had been ‘attending a herbalist and taking herbalist tablets for six months, which has relieved her asthma’.

In Australia, state and federal legislations classify both drugs Dexamethazone and Theophylline as prescription drugs only. They are included among the Schedule 4 drugs, which restricts their possession and prescription to registered biomedical health practitioners, dentists or veterinary practitioners.

This particular case was reported to the Victorian Health Department by a biomedical health
practitioner who noticed the ‘unusual moon-shaped face’ on one of the female patients he was
then treating, and thought that it may have been caused by a cortisone drug. After receipt of
this information, the health authorities conducted a long investigation involving laboratory
analysis of the the CMMPPi preparation, which confirmed the presence of the pharmaceutical
drugs. Subsequently, a combined Health Department and Drug Squad raid was conducted
on the herbalist’s premises on 12 August 1994. The raid resulted to the confiscation of thirty
‘herbal preparations,’ including traditional materia medica preparations, CMMPPi and
penicillin injections.

Quoting an official from the Health Department, the press release from the Department stated
that there had been cases recorded overseas where traditional Asian herbalists drugs had been
mixed with pharmaceutical drugs. People think that they are receiving a safe traditional drug
and being cured for having their symptoms relieved, when it is the pharmaceutical drugs at
work: ‘The reason they work is because they have real drugs in them’.

The technological artefact CMMPPi and its ‘effects’ in the case of these asthma patients, and
the Health Department’s response, reveal a yawning gap between the Chinese materia medica
and biomedical entities. In many ways it is not just a purely technical or juridical problem that
can be addressed by running a few laboratory tests or a a number of police raids. It is a technol-
social problem requiring symmetrical translation work between the ‘workings’ of the Chinese
materia medica and biomedical entities as well as between the TCM and biomedical systems
of knowing. To understand the complexities of the interactions between the Chinese materia
medica and biomedical entities, the workings of the traditional Qi inclinations of the Chinese
materia medica vis-à-vis the clinical patterns they address must be translated into the clinical
workings of the biomedical entities like Dexamethazone and vice-versa. Clinical effects from
CMMPPPI are 'real' in the sense that they are generated from two entities and not just from one 'real drug'.

_Yao and the TCM Practitioner: Chinese Materia Medica and Rhyming Poems or _Ge jue_.

Given the complexity and sheer volume of information about _yao_ and their Qi, how does the practitioner remember? How to keep to hand a convenient way through the body of knowledge?

Mobilising this body of accumulated knowledge of the inclinations or _pian sheng_ of thousands of Chinese _materia medica_ from various temporal and spatial sites towards a specific clinical pattern of an individual patient is and always has been a daunting task for a TCM practitioner. Hence, in the history of the use of _materia medica_ in China, information on the Qi inclination of these thousands of individual _materia medica_ 中藥 and _materia medica formula_ 中藥方 was encapsulated in rhyming poems or _ge jue_.

_Ge jue_ is an ancient literary form with four or six rhyming lines. Some ancient medical texts were written in this way to aid in memorising numerous acupuncture points or _materia medica_ and their Qi inclinations or motion. The text and sound of these rhyming poems not only preserve the data on these _yao_ therapeutic practices but also aid in their application to a contingent localised clinical pattern. They are similar in many ways to the mnemonics used in the portolan charts, which aid in remembering lists of ports in a catalogue of directions. 37

Below are data on the Qi motion of some plant _yao_ growing in the Southern Chinese Collection of the Royal Botanical Garden Melbourne, put into a _ge jue_ that I have translated into English. It is a 'Rhyming Poem on the Nature of 400 Yao 药性歌括四百味' by the Ming
Dynasty medical scholar Gong Ting Xian, reprinted as part of the book *A Required Primer of Rhythmic Poems on TCM* 中医入门必读歌, published in 1996 by the China TCM Publishing House (Beijing). I have intentionally included the alphabetised *pinyin* with the English translation so one can see the pinyin rhyming of the poems,
**Changshan**  常山  *Dichroa febrifuge*

*Chang Shan ku han*  Chang Shan is bitter and cold  
*zai mue chu tan*  Brings down malarial attacks and dispels  
*jie shang han re*  Relieves attacks from cold and heat  
*shui zhang neng kuan*  Thereby relieving fluid distension
**Zhi Zi**

**Gardenia jasminoides**

- **Zhi zi xing han**
  - Zhi Zi’s nature is cold

- **jie yu chu fan**
  - It relieves stagnation, dispels irritation

- **tu niu wei tong**
  - nasal bleeding and stomach pain

- **huo jiang xiao bian.**
  - Heat descends through passing urine
**Jie Geng** 桔梗  *Platycodon grandiflorus*

- **Jie Geng wei gan**  Jie geng tastes sweet
- **liao yan zhong tong**  Treats swollen and painful throat
- **zai yao shang sheng**  Moves the **yao** upwards
- **kai xiong li yong**  Opens the chest and frees obstruction
**Nu Zhen Zi**

**女貞子**

**Ligustrum lucidum**

- **Nu Zhen Zi ku**
  - Nu Zhen Zi tastes bitter
- **hei fa wu xu**
  - Blackens hair and beard
- **qiang jin zhuang li**
  - Powers the tendons and gives strength
- **qu feng bu xu**
  - Dispels wind and tonifies what is deficient
Bai Shao  白芍  Paeonia lactiflora

Bai Shao is sour and cold
It can gather in and tonify
For diarrhoea, abdominal pain
And deficiency cold
None can be more effective
*Jin Ying Zi*  金樱子  Rosa Laevigata

- *Jin Ying suan se*  Jin Ying is sour and puckery
- *meng yi jing hua*  Wet dreams and involuntary emissions
- *jin zhi yi niao*  Stops urinary incontinence
- *cun bai chong sha*  Annihilates worms everywhere
Acupuncture As A Therapeutic Practice That Balances the Flow of Qi

When the patient’s Qi is running out of control manifesting in symptoms of diarrhoea, wet dreams, involuntary emission and urinary incontinence, the ge jue provides the TCM practitioner clear indications on the Qi inclinations or Qi nature of specific materia medica like the ‘sour flavour’ and ‘gathering in’, ‘tonifying’ and ‘cold’ natures of Paeonia lactiflora and Rosa Laevigata which can redress those clinical imbalances. But the yao of TCM’s materia medica is not the sole means for ‘doing’ a patient’s Qi. Acupuncture, traditional Chinese massage tuina, moxibustion, cupping, Qi exercises Qi gong, etc. are also used. In using these, the practitioner has other aids-body maps.

Many years of scientization, biomedicalization, modernisation and materialist rationalist philosophical influences have for some practitioners, reduced contemporary acupuncture practice into a simple ‘medical procedure involving the insertion of needles on some anatomical sites on the body’ where ‘needling’ is guided by contemporary acupuncture maps or illustration charts superimposed upon “modern anatomical diagrams whether superficial, myographic or osteographic” (chapter 4 p. 196) and when the “Teh-Chi” or “input of energy” is seen as irrelevant to the practice of acupuncture. As a result, acupuncture practice has been stripped off it’s vitalist philosophical core-- the philosophy of Qi. Without this core, acupuncture as a therapeutic practice designed to address imbalances in the flow of Qi, loses it’s Qi nature or Qi inclination. It loses it’s traditional therapeutic edge. The outcome is an ‘acupuncture procedure that is ‘segregated’ from traditional disciplines like materia medica prescribing, traditional Chinese massage, traumatology, nurturing life, Qi exercises (Qi gong ) etc. which was originally integrated as a ‘whole’ system of medicine or yao becomes detached. Hence, finding one’s way around through the acupuncture tracts is indeed very hard.
Acupuncture Charts and Figurines

In the practice of acupuncture, a proper acutact chart or map is a very important tool in deploying the acupuncture needle successfully to balance the flow of Qi in the body of the patient. A proper acutact chart or 'map,' is a 'road map' or a 'flow chart' used for locating acupuncture points or the acu-tracts on the surface of the body, as well as indications of Qi flow. In China acupuncture ‘road maps’ were created as early as the Tang Dynasty, while bronze acupuncture models were created as early as the Song Dynasty. However, there is no evidence that these printed charts or bronze acupuncture models survived and made their way into colonial Australia.

What we have instead is an ‘acutact chart’ inscribed in the English translation of Yee Quock Ping’s qualification diploma as an acupuncturist. It is not an illustrated chart. It is a ‘chart’ whose ‘flow’ and ‘indicators’ are inscribed through the medium of English (Appendix 1, Chapter 5): ‘that you have studied for six years, and understand the seven external and eight internal pulses, together with the liver, heart, lungs, kidney, and stomach and bladder, spleen, pericardium, big and small bowels, and their pulses, in all parts of the body...’.”

Why am I suggesting that this is a description of an acu-tract? I think that embedded in this description is a significant mis-translation. Revealing the mis-translation is actually revealing of the resources the TCM practitioner has at his disposal. I see as a possible error of translation of the phrase ‘seven external and eight internal pulses’ from the original Chinese document. It may be due to the fact that the translator is a ‘stranger’ or wai hang to the body of knowledge and technique of acupuncture. If we translate the English phrase back into Chinese it may be written as 七外經八內脈 qiwai jing ba nei mai. I checked the Chinese Medical Dictionary (Zhongyi Yixue Da Cidian) for words or phrases starting with the Chinese character 七 qi or ‘seven’. There were over eighty words and phrases in Chinese beginning
with this word. There were, however, no phrases beginning with the word Qi and followed by jing or mai, which actually means ‘Acutrace,’ ‘channel’ or ‘pulse’. I then looked for another word which is also pronounced as qi but written as 奇, and means ‘unusual’ or ‘rare’. I again consulted the Chinese medicine dictionary and looked for words among Chinese characters requiring eight strokes, and was directed to look for such a word on page 1502 of the second volume. I found there thirty-two entries of words and phrases beginning with the word 奇 qi. Among them was the phrase 奇經 qi jing, which means ‘unusual Acutrace’ or ‘unusual acupuncture channels’. It gave the following definition of qi jing:

Acutrace mai which are other than the twelve (acu-tracts) jing. The twelve acu-tracts jing are the ‘usual acu-tracts’ chang mai. Outside the sphere of the usual acu-tracts chang mai are those with no co-ordination between the exterior and the interior biao li. Hence they are referred to as ‘unusual acu-tracts’ qi jing.

The ‘Qi-blood Qi xue of humans usually circulate xing along the twelve usual acu-tracts jing mai. When these acu-tracts jing are full and overflows, the Qi-blood then flows through to the ‘unusual’ acu-tracts qi jing. 

On this basis, I think that the English translation of the Chinese phrase qi jing as ‘seven external’ was wrong. Instead, it should have been translated as ‘unusual acu-tracts’ or ‘unusual acupuncture channels’.

We now come to the second half of the phrase in question: ‘internal pulses’. This problem of translating the concept of ‘pulses’ symmetrically between the TCM and biomedical knowledge systems is a complex matter connected to a wider controversy about concepts of blood circulation and pulse reading in biomedical practice and the concepts of acu-tracts or acupuncture channels or meridians, referred to in Chinese as jing mai and jing luo (Qi-blood circulation and pulse reading in traditional Chinese medicine).
I checked the Chinese medicine dictionary for the word *nei mai* and could not find any equivalent word in Chinese for 'inner pulses'. There are entries for *neijing*, but they refer to the *Inner Classics*, also referred to in Chinese as *Neijing*. Returning to the entry on *qi jing* ‘unusual acu-tracts’ I found past this entry a four character phrase *qi jing ba mai* 奇經八脈, which the dictionary defines as:

<table>
<thead>
<tr>
<th>Acu-tract</th>
<th>Chinese</th>
<th>English</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>Chong mai</em></td>
<td>沖脈</td>
<td>Penetrating Acu-tract</td>
</tr>
<tr>
<td><em>Du mai</em></td>
<td>督脈</td>
<td>Governing Acu-tract</td>
</tr>
<tr>
<td><em>Ren mai</em></td>
<td>任脈</td>
<td>Conception Acu-tract</td>
</tr>
<tr>
<td><em>Dai mai</em></td>
<td>帶脈</td>
<td>Girdle Acu-tract</td>
</tr>
<tr>
<td><em>Yang Wei mai</em></td>
<td>陽維脈</td>
<td>Yang Linking Acu-tract</td>
</tr>
<tr>
<td><em>Yin Wei mai</em></td>
<td>陰維脈</td>
<td>Yin Linking Acu-tract</td>
</tr>
<tr>
<td><em>Yang Qiao mai</em></td>
<td>陽蹻脈</td>
<td>Yang Heel Acu-tract</td>
</tr>
<tr>
<td><em>Yin Qiao mai</em></td>
<td>陰蹻脈</td>
<td>Yin Heel Acu-tract</td>
</tr>
</tbody>
</table>

These are not directly related to the ‘regular’ Acu-tract *zheng jing*. Hence they are referred to as ‘unusual’ qi. Being unusual means they do not come in pairs *ou*. Please refer to ‘Difficulty No. 27’ of the *Nan Jing*, where one finds details about each of these (unusual acu-tracts). 42

With the clarification of some of the mistakes made in translating Yee Quock Ping’s qualification diploma, the ‘chart’ of the ‘Eight Unusual Acu-tracts’ 43 begins to make sense.

This leaves the other sections of Yee’s diploma, which refer to the inner organs like the stomach, big and small bowels, pericardium and their pulses, ‘in all parts of the body’. I think
they point to the twelve ‘orthodox’ zheng or ‘regular’ acu-tracts, which are all ‘paired’ or ou uids and connect with a particular internal visceral or hollow organ system or zang fu. 

The Twelve Regular Acutracts

Each of the Twelve Regular Channels or Acutract is named in accordance with the internal organ system with which it is ‘connected’ or related, its Yin and Yang categorisation and whether it runs along the upper or lower extremities. There are in all six visceral organ systems (the heart, liver, spleen, lungs, kidneys and pericardium) and six hollow organ systems (the small intestines, gall bladder, stomach, large intestines, urinary bladder and Triple Energiser).

Each of the regular or usual Acutract connects with one visceral or one hollow organ system, making six acu-tracts paired to one another. These are:

<table>
<thead>
<tr>
<th>YIN ACUTRACT</th>
<th>YANG ACUTRACT</th>
</tr>
</thead>
<tbody>
<tr>
<td>UPPER EXTREMITIES</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Small Intestine Acutract</td>
</tr>
<tr>
<td>2. Hand Lesser Yin Heart Acutract</td>
<td>2. Hand Bright Yang</td>
</tr>
<tr>
<td></td>
<td>Large Intestine Acutract</td>
</tr>
<tr>
<td></td>
<td>Energiser Acutract</td>
</tr>
</tbody>
</table>
LOWER EXTREMITIES

4. Foot Greater Yin Spleen Acuttract

4. Foot Greater Yang Urinary Bladder Acuttract

5. Foot Lesser Yin Kidneys Acuttract

5. Foot Bright Yang Stomach Acuttract

6. Foot Terminal Yin Liver Acuttract

6. Foot Lesser Yang Gall Bladder Acuttract

The Yin acu-tracts connect with the Visceral Organ Zang systems and flow along the inner side of the extremities, while the Yang acu-tracts connect with the hollow Fu organ systems and flow along the lateral and outer areas of the extremities. In accordance with the ebb and flow of Yin Qi or Yang Qi, the Yin and Yang acu-tracts subdivide further into three categories.

The Acuttract where the Yin Qi commences to flow is the Terminal Yin Acuttract jue yin jing. The Acuttract where Yin Qi builds up is the Lesser Yin Acuttract shao yin jing. When the Yin Qi has reached to its highest peak point, it is the Greater Yin Acuttract tai yin jing.

As for the Yang acu-tracts, the acuttract where the Yang Qi is beginning to rise is referred to as the Lesser Yang acuttract shao yang jing; the point where there is a build-up of the Yang Qi is the Yang Bright Acuttract yang ming jing; while the Acuttract where the Yang Qi reaches the zenith of its flow is referred to as the Greater Yang Acuttract tai yang jing.

Flowing along the upper extremities are the following three Yin acu-tracts: the Hand Greater
Yin Lung Acutract, the Hand Lesser Yin Heart Acutract; and the Hand Terminal Yin Pericardium Acutract. The three Yang acu-tracts which flow along the upper extremities are: Hand Lesser Yang Triple Energiser Acutract; the Hand Bright Yang Large Intestines Acutract and Hand Greater Yang Small Intestines Acutract.

Flowing along the lower extremities are the three Yin Acutract: the Foot Terminal Yin Liver Acutract; the foot Lesser Yin Kidney Acutract, the Foot Greater Yin Spleen Acutract. The three Yang acu-tracts which flow along the lower extremities are: The foot Lesser Yang Gall Bladder Acutract; the Foot Bright Yang Stomach Acutract; and the Foot Greater Yang Urinary Bladder Acutract.

The three Yin acu-tracts along the upper extremities which emanate from the chest flow along the inner side of both arms and terminate at the fingers. The Yang acu-tracts along the upper extremities commence from the fingers of both hands to terminate at the head and face.

The Yang acu-tracts which flow along the lower extremities start from the head and face and then, in separate pathways, flow either along the front, side or back of the trunk and down to the outer sides of the lower extremities to terminate at the toes. The Yin acu-tracts along the lower extremities on the other hand commence from the toes and then ascend along the inner side of the leg to terminate in the abdomen and chest.

Both Yin and Yang acu-tracts meet in the hand and feet, and there are converging points of the Yang acu-tracts in the head, while those of the Yin acu-tracts converge in the chest and abdomen. This constitutes the circulatory network of the twelve regular acu-tracts. "Acutract charts were traditionally referred to as Ming Tang tu."
Chapter 5  'Doing' Qi  276

The Acupuncture Bronze Figurine - Anatomical Tool

Finding one's way through the circuit of several acu-tracts simultaneously running along the extremities towards and away from the body can be difficult if one only has a two-dimensional chart as a guide in following the acu-tracts. Hence, through the development of acupuncture practice, three dimensional acupuncture figurines ('dolls' or human models) emerged as convenient tools for 'modelling' the flow of Qi along the acu-tracts on and in the body. The first of such models were crafted during the Song Dynasty, which was also the time when the first 'body charts' were drawn in China (the body chart is discussed more fully in Chapter 4).

The acupuncture chart and the figurine are material embodiments or a 'crystallisation' jie jing 結晶 of the Qi, blood, acu-tracts, acupuncture points and the internal organ systems zang fu. They embed the culture of the body as seen from practices and knowledge system of traditional Chinese medicine. As such, they are the embodiments of the body's 'anatomy'. But how the body is embodied in this way of anatomical rendering is very different from the way the body is rendered in the biomedical knowledge system. In 1870, when Yee Quock Ping applied to be registered as a medical practitioner, the then Medical Board of Victoria rejected his application on the ground that he did not do a course on biomedical anatomy. De Courcy Ireland Q.C., defending Yee, then said:

[T]hey did not consider him qualified, because he had not pursued a course of anatomy. That is not a good ground. But though the applicant had not practised or studied actual dissection (that not being allowed in his country), he had studied anatomy from accurate and minute plates (or charts) prepared at one period by certain eminent men, as described in the standard work of Abbe' Huc upon China.
In 1878, as the Parliament of Victoria debated the *Medical Statute Amendment Bill*, the Honourable Mr Orr had this to say about the three-dimensional material embodiment of TCM’s system of the body’s anatomy:

The Chinese system of anatomy was infinitely superior to the English system. In China no person was allowed to practice medicine until he had gone through an ordeal of this kind: a figure of the human body, full of holes, was placed before the students, the holes being as close to each other as they could be made by a needle. These holes were all numbered and after a student had undergone a course of training on the figure, it was covered with wax, so that the positions of the holes could not be seen. The student was then required to take a needle and insert it in any hole that he might be asked to put it in, and if he inserted it in the wrong place he was plucked. 46

Let us see a ‘translation’ by the Chinese medicine historians K.Chimin Wong and Wu Lien-teh of the acupuncture bronze figure in 1977:

Regarding the bronze model, the earliest account of it was in 1027 AD. Owing to the fact that there were different versions of the *Ming Tang tu* 明堂圖 or Anatomical Charts and that pictures were not as illuminating as models, Emperor Jen Tsung ordered Wang We-teh, 47 one of the court physicians, to study the subject and to construct a bronze image in which all the old theories of anatomy were to be corrected and incorporated.

The interior of the figure was fitted with models of the organs and viscera, and these were surrounded with water. On the exterior of the image small holes were drilled to represent the points for needling. Two such figures were made; one was placed in the Imperial Academy of Medicine and the other in the Jen Chi Hall.

These figures were formerly used for teaching purposes. The model was covered with a coating of yellow wax while the interior was filled with water. The students practised acupuncture on and it and they were required to exercise their skill in hitting the holes exactly. When the needle entered the right spot water flowed out. Before the Sung dynasty, there were serious discrepancies in the exact number of acupuncture points and the their specific locations as indicated in the ancient classical
texts such as the *Ling Shu* and the *Jia Yi Jing*. The Sung Emperor Renzong thought that the use of acupuncture could be a potential threat to human life i.e. a slight discrepancy in the location of an acupuncture point could cause harm to human life. Hence, he summoned Wang Wei Yi to construct the bronze figure which delineates the visceral and hollow organs and their twelve channels, with the acupuncture points and their names clearly indicated.  

Hence Wang Wei Yi conducted textual research *kao ding* 考訂 and 'standardisation work' ('unifying' work) *tong yi* 統一 on the matter. He collated all the old literature and manuscripts and corrected the errors and fabrications. The work he did was written in the three volumes of the *Illustrated Manual of Acupoint of the Bronze Figure* (*Tongren shuxue zhenjiu tujing*), a book written by Wang Weiyi in 1027, in which the author 'enumerated and corrected the previously mistaken location of channels and acupoint'.  

At the same time, he supervised the casting of two bronze acupuncture figurines.  
In this work, which took 30 years, Wang accomplished four things:

1) Verification and confirmation of the acupoints and channels in the *Ming Tang Tu*

2) Creation of the acupuncture chart

3) Creation of a three-dimensional or 'solid' *li ti* acupuncture model

4) Engraving of the acupuncture points and channels on stone slabs  

The acupuncture bronze figure constructed by Wang Wei Yi is a figure of a young naked man standing 162 centimetres (about 5 feet 6 inches in height). The thumb and middle fingers of his left hand are naturally bent, forming a loop to indicate the standard of 'body-inch conversion from middle finger measurement' *zhong zhi tong shen cun*.  
On the surface of the bronze figure are inscribed the continuous linear illustrations of the fourteen acupuncture channels and the acupuncture points along them using black lacquer paint. Close to every acupuncture
point indicated is a small hole through to the body cavity. Beside every acupuncture hole is inscribed in gold paint the name of the acupuncture point. 53 There are 674 acupuncture points. It is a comprehensive quan mian recording of acupuncture points and acupuncture channels upon a material acupuncture model renzi zhenci shiwu moxing.

The exterior shell of the bronze figurine may be disassembled. The chest and abdomen may be opened and closed. Inside, the normal location, appearance and size of the Five visceral organs and Six hollow organs wu zang liu fu can be seen. 54

The whole body of the bronze figure may be disassembled into twelve segments. The chest and abdominal cavities may be opened. Inside there are wooden models of the inner organs.

Along the four extremities are wooden skeletal structures. 55

The bronze acupuncture figure is a material embodiment of the ‘body’ of Qi, acupuncture points and acupuncture channels, as well as the ‘body’ of Five Visceral and Six Hollow inner organ systems wu zang liu fu. It is a ‘clotting’ or standardisation of the practice of acupuncture zhenjiu zhi zhunce. 56 It is an embodiment of the TCM body.

**Acupuncture Mechanism : ‘Plausible’ or ‘Practical’**

After this presentation of the material embodiments of acupuncture, an attempt will now be made to work out a practical mechanism (TCM practice-based) of how acupuncture works. ‘Mechanism’ here refers to how the various material embodiments of the acupuncture assemblage work together to bring about a Yin and Yang balance i.e. through acupuncture needles, charts, models and channels, Qi, blood, acupoint, acupuncturists and patients. The mechanism is the ji - the ‘trigger’ or ‘impulse’ from which ‘movement starts’. 57 The Chinese word ji is an ancient term sometimes translated as ‘machines’ in general. Specifically it refers to wooden machines like looms. G.D. Wilder and J.H. Ingram, in their translation of the
complex character \( ji \), refer to 'a few pieces of wood which develop movements'. The \( ji \) 機 may also be the component parts of the trigger mechanism of the Chinese crossbow 弩 \( nu \). Hence I see the word 'mechanism' as a 'live' practical assemblage of component parts.

Before we look into acupuncture's practical mechanism it is worth examining how, in the absence of a translating knowledge space between TCM and biomedicine in the past, acupuncture's mechanism was unilaterally and hegemonically translated by 'causal' and science-based theoretical explications, commonly expressed as a 'plausible mechanism'. In Chapter 1, I mentioned a typical, self-confessed 'reductionist' theoretical explanation of acupuncture's 'plausible mechanism' presented by Professor Stephen Holgate, which he referred to as 'science based'. Through this mechanism, acupuncture as an integral part of the TCM assemblage was reduced to and translated as 'pricking a particular area on the foot' where the 'needles were put somewhere else,' thereby generating a change in the vascular pressure and the brain. In this theoretical explanation of the mechanism of acupuncture, core aspects of the TCM assemblage became invisible (its tools, the points, the channel and so on) while core elements of the biomedical assemblage became very visible - biomedical health practitioners like Professor Stephen Holgate, the biomedical patient's body ('an area on the foot,' the 'brain'), diagnostic tools which measure 'vascular pressure,' and the 'needles' viewed as biomedical interventionary tools.

More than a decade ago the peak medical research body in Australia, the National Health and Medical Research Council (NHMRC), provided in similar fashion a 'plausible mechanism' for the operation of acupuncture analgesia - 'the theory of the DNIC'. The authors of the report refer to this 'plausible mechanism' as the 'neurophysiological mechanism' or the 'mechanism of nociception'. The authors of this report stated:
While acupuncture has been heralded as an ancient art
with mystical properties and mechanism beyond the realm
of Western medicine, the abundant research that has been
conducted into acupuncture analgesia strongly implicates
mechanisms similar to those involved in morphine analge-
sia; involving the same pathways and transmitter substances
as those involved in the descending nociceptive modulatory
systems.

Diffuse Noxious Inhibitory Controls (DNIC) is a physiological
phenomenon in which the transmission of nociceptive information
at a given spinal cord segment can be inhibited by the application
of a second, new, noxious stimulus at a site remote from the origi-
nal noxious stimulus... DNIC operates by the second stimulus act-
vating brain stem centres and descending modulatory pathways
to enhance the clarity of the second stimulus by recruiting centre-
surround inhibition. However, in enhancing the second stimulus,
the inhibition inadvertently blocks the transmission of the first
stimulus. To operate, DNIC requires the integrity of the spinal
cord, the NRM and its transmitter-serotonin.

Thus, DNIC may explain the analgesic effect of the various
forms of hyper stimulation analgesia... The recently deve-
oped technique of transcutaneous electrical nerve stimulation
is yet another treatment modality which produces analgesia
by this mechanism.

In this context, a plausible mechanism for acupuncture
analgesia can be perceived. Acupuncture constitutes a second
stimulus which recruits a centre-surround inhibition which in
turn blocks any pre-existing nociceptive transmission. This ex-
planation is consonant with the observed physiological features
of acupuncture analgesia, for just as acupuncture does not work in the face of spinal cord injury or if serotonin or the NRM are inhibited, neither does DNIC. Moreover, DNIC operates at a distance as does acupuncture.

This mechanism explains many of the peculiar idiosyncracies of acupuncture analgesia which had previously defied physiological explanation and therefore attracted mystical or fanciful explanations.

With this ‘plausible mechanism,’ the authors of the report attempted to use the DNIC to ‘mimic’ the presence of an acupuncture stimulus inside the patient’s body and represent it as ‘a second stimulus which recruits a centre-surround inhibition which in turn blocks any pre-existing nociceptive transmission’. In the theory of causality, acupuncture generates the ‘hyper stimulation analgesia,’ caused by the application of a second noxious stimulus at a site distant from the original one.

This explanation might have provided a biomedical physiological explanation, but failed to provide a practical mechanism (with all its practical assembly components, ‘idiosyncrasies’ and ‘mystic’ elements) for acupuncture’s operation. Acupuncture as a core component of the TCM assemblage was hegemonically translated into the biomedical assemblage core components, including DNIC, nociception, morphine analgesia and a second stimulus.

A major study into the practice of TCM in Australia in 1996 also looked at a ‘plausible mechanism’. However, the ‘mechanism’ thus presented ‘isolated’ acupuncture as a therapeutic practice from ‘the integrated body of TCM’. Chapter 3 of the study, which looked at the clinical benefits from acupuncture (a summary of findings) described a ‘plausible mechanism’ by adding the theory of neurohormones and neurological pathways to the 1989 NH&MRC neurophysiological mechanism of acupuncture, and then supporting this
'mechanism' with the experimental evidence of pharmacological manipulation, evoked neurological response and biochemical assays.

[Three principal lines of experimental evidence (pharmacological manipulation, evoked neurological responses, and biochemical assays) indicate that traditional acupuncture results in physiological changes that are distinct from those caused by stress response due to needling. It is apparent that both opioid and non-opioid systems are involved in many acupuncture responses. It may no longer be suitable to claim that endorphins are the most likely mechanism of action behind acupuncture.

Distinct neurohormones and neurological pathways have been shown to be influenced in the process of acupuncture. The research overall has monitored the behaviour of a variety of neurotransmitters (most especially neuropeptides) in different brain nuclei and in the spinal cord. The evidence on the role of specific neurotransmitters is reliable across a range of experiments. (For example, the analgesic effect of acupuncture can be enhanced or lowered by the corresponding increase or decrease of serotonin level in the central nervous system).]

It is interesting to note that, in the presentation of this 'theoretical drawing' of the 'mechanism' of acupuncture, reference was made to 'stress response due to needling,' as distinct from 'physiological changes'. Does this 'stress response' comes from the acupuncturists, the one being acupunctured or the acupuncture needle itself? Because of the undue stress placed upon the use of experimental evidence, neurohormones, neurotransmitters and neurological pathways in the mimicking of traditional acupuncture, this study failed to provide a 'mechanism' for acupuncture. Therefore no answer could be made to the practical questions raised above. Acupuncture as a core component of the TCM assemblage was hegermonically translated into the biomedical core components of pharmacological manipulation, evoked neurological responses and so on.
Intervening in the Qi, Clinical Trials and The Translating Knowledge Space

The thinking that only ‘real interventions’ produce ‘real effects’ has led to a view that the clinical ‘effects’ from therapeutic agents generated from the diverse microworlds of many clinical traditions can only be measured by science. Stabilised biomedical entities have been universalised and mobilised as real, as distinct from the “socially contrived” entities of TCM (and other tradition of healthcare). Biomedical entities have taken on the role of universal yardstick, i.e. a value which is instantiated everywhere.

Randomised control trial (RCT) is the ‘gold standard’ of scientific evaluation as used in the measurement of the efficacy of purified pharmaceutical drugs. With this system of clinical evaluation, controls are instituted to ensure that non-specific and subjective factors such as experimenter bias and subject expectancy do not interfere with the objectivity of the results of the trials. This means that a pill’s effects can be stripped down ‘to its pure specific chemical form’. These controls are randomisation of subject allocation in the clinical trial and blinding of both the experimenter and the target subjects.

Dr. Hong Yen Hsu in his book Oriental Materia Medica: A Concise Guide (1986) pointed out that ‘Western medicine generally uses pure chemicals or synthetics while Chinese medicine uses mainly natural products and herbs’. But this is a misunderstanding because plant, animal and mineral yao are not not dependent for their action on pure chemically active principles or constituents. Using RCT to clinically evaluate efficacy of a yao or TCM intervention presents a major problem. Doctor Ian McDonald, an epidemiologist, looked into a hundred clinical trials used to test the efficacy of Chinese herbal medicine in China which
were published in three TCM journals from 1983-1995, and stated that

to apply the western analytical method of the clinical trial to the
evaluation of an aspect of traditional Chinese medicine (TCM) exposes a
mismatch inherent in the intellectual paradigms of two cultures. The main
motivation of Western medicine in epidemiological methods to the
assessment of herbal medicine is essentially to trawl the Chinese
pharmacopoeia for new wonder drugs, to tap into a source of
pharmacologically effective, standardizable potentially commercial
treatments. To state this is not to criticise a worthwhile scientific
enterprise. It is simply a statement that the application of modern analytical
reductionist methods to the evaluation of a holistic approach to treat-
ment is problematic both as an exercise in scientific research and as a
claim to representing an evaluation to the practice of TCM."

Seeing that TCM’s overriding concern is the ‘relief of symptoms in the individual,’ Doctor
McDonald proposed that instead of using the RCT design to test the efficacy of yao, the N-
of-1 design should be used instead. This system of clinical evaluation originated from social
science research and was later used to evaluate clinical problems. A yao is dispensed to a single
patient in a randomised manner. Then clinical symptoms are used to test the response.
According to McDonald this system’s ‘unique applicability to TCM is that it would be
possible to tailor the precise composition and dose of the decoction for the individual patient’.

In 1998 the Medical Journal of Australia reviewed forty-six randomised and controlled clinical
trials conducted in China for the use of Chinese herbal medicine in the treatment of acute
respiratory infections. While finding the clinical study methodology inadequate, it
nevertheless recommended protocols for studies in which TCM would be tested in clinical
settings outside China: ‘Further studies should examine herbs and formulas that are widely
used and accepted by Chinese practice as well as those that show promise in treating ARI
(acute respiratory infections). While calling for a more rigorous evaluation of CHM the study interestingly noted that a TCM formula *Shuang Huang Lian* 'does appear to be useful for treating lower respiratory tract infection'. The study made use of four criteria in assessing the quality of the China clinical trials: patient allocation; treatment description, outcome assessment and data analysis.  

This scientific evaluation of TCM, which reduces this ancient body of knowledge into shrinking bits of laboratory data, is becoming a worrying trend in TCM research - one confirmed by the above-mentioned survey of a hundred Chinese clinical trials testing the efficacy of Chinese medicinal herbs. These, which Doctor McDonald looked at, were published in five Chinese-language TCM journals covering a period of 10 years (1986-1996). In these clinical trials, the therapeutic efficacy of the yao (in the form of decoction, powder, injections, pills, tablets, suppositories etc.) was evaluated in terms of its effect upon biomedical entities like SGPT, Lipoperoxide, Coli baccilus, rotaviruses, helico bacter pulori, para-influenza I-IV, glucagon and ECG.

An example is the clinical study of the efficacy of a yao formula *Bu Yang Huan Wu Tang* (Decoction To Tonify the Yang Qi and Recover the Five) in the treatment of coronary diseases. The results of this study was published in the *Chinese Journal of Integrated Traditional and Western Medicine* (1995). This clinical trial involved 102 subjects, randomly divided into two groups. Seventy subjects of the treatment group were administered the decoction for fifteen days, including necessary Western pharmaceutical medications. On the other hand, thirty two subjects in the control group were administered the standard Western pharmaceutical medication without the decoction. Data on blood tests i.e. lipoperoxide LPO) apoliprotein (apo), B100, super oxide dismutase (SOD) and ECG were monitored before and
Chapter 5. ‘Doing ‘ Qi

After the treatment.

According to the trial, the level of LPO, apo, B100 SOD was lowered ‘remarkably’ in the treatment group administered with the herbal decoction, which was thus judged to be efficacious (Zhang H. et al., 1995, 213-215).

The ‘Decoction Formula To tonify the Yang Qi and Recover the Five’ was developed by the Qing Dynasty Chinese medical scholar Wang Qing Ren (1768-1831), who is the author of the TCM classical text Correction of Medical Errors (Yi Lin Gai Cuo). Wang advanced the notion that the body has five pairs of Yang Qi (10 all in all), distributed equally on both hemispheres of the body. If five of these Yang Qi becomes deficient, this could lead to a paralysis of one hemisphere of the body, a condition which in modern times is currently referred to as hemiplegia. Hence the use of the yao formula, with the therapeutic action of tonifying the Qi, can redress the Qi deficiency and restore the balance. Consequently the name of the yao formula ‘recover the five’.

This formula has been traditionally used to deal with a clinical pattern with signs and symptoms commonly seen among those who suffer from hemiplegia resulting from apoplexy. The signs and symptoms of this clinical pattern are facial distortion, speech impairment dribbling at the corner of the mouth, wasting of muscles of both extremities, frequent urination or incontinence, a slow pulse and a tongue white in colour. The yao ingredients of the formula are:

1. Astragalus membranaceus (root) Huangqi 60 g. (a major Qi tonifying plant yao. Note the large dose used)
2. Angelica sinensis Danggui 6 g.
3. Pheretima aspergillum (‘Earth dragon’) *Dilong* 3 g.

4. Ligustichii Wallichii *Chuanxiong* 3 g.

5. Prunus persica *Taoren* 3 g.

6. Carthamus tinctorii *Honghua* 3 g.

The ‘scientific’ biomedical evaluation used in assessing the efficacy of this *yao* formula demonstrates the incongruous situation in which values instantiated in the laboratory are being used to assess the efficacy of a therapy which assumes life in the TCM microworld. Biomedical entities like the LPO, SOD, apo and B100 are taken as representing unproblematic, objective standards that can test the therapeutic efficacy of a *yao* preparation which is normally prescribed and tested in accordance with the standards springing from TCM’s clinical pattern. The laboratory dominates the clinic.

In the choice for an evaluation system for TCM practice, be it in or out of China, I have argued against the use of the values, standards and theory generated from the laboratory: a system of evaluation which translates TCM practice into laboratory replications. Yet, in China, this is precisely the path being taken by researchers in clinically evaluating the practice of TCM.

A set of clinical trial protocol for evaluating *yao* has to be established which is consistent with the practical logic and paradigm of TCM. Laboratory entities must not be permitted to dominate the TCM clinical patterns which assume life from the practice of *bian zheng lun zhi*.

**James Linda’ Wholistic Clinical Trial Circa 1774**

In designing this clinical trial protocol to establish the therapeutic effects of plant, animal or mineral *yao* or *yao* formula vis-à-vis their effects upon clinical patterns, signs and symptoms,
it is instructive to revisit the first clinical trial in medical history, conducted by Doctor James Lind almost three centuries ago in 1747. This was the first ‘controlled’ trial, involving twelve seamen suffering from scurvy, the sailor’s scourge at that time. The site of the clinical experiment was the HMS Salisbury. Doctor Lind was the ship’s surgeon. It does not involve TCM - but exemplifies the methods of wholistic clinical trials.

In his record of this particular clinical trial, *The Treatise of the Scurvy*, which was published in 1753, Lind drew a vivid picture of the signs and symptoms of the disease.

For the sake of perspicuity I choose to describe the symptoms in their order in which they generally appear and as peculiar to the several stages of the disease, and shall distinguish as I go along those which are more constant or essential from the less frequent or adventitious.

The first indication of the approach of the disease is generally a change of colour in the face from the natural and usual look to a pale and bloated complexion, with a listlessness to action, or an aversion to any sort of exercise. When we examine narrowly the lips or the caruncles of the eyes where the blood vessels lie exposed, they appear of a greenish cast. Meanwhile the person eats and drinks heartily and seems in perfect health, except that his countenance and lazy inactive disposition portent a future scurvy.

Their former aversion to motion degenerates soon into an universal lassitude, with a stiffness and feebleness of their knees using exercise with which they are apt to be much fatigued and upon that occasion subject to breathlessness and panting. And this lassitude and breathlessness upon motion, are observed to be among the most constant concomitants of this distemper.

Their gums soon after become itchy, swell and are apt to bleed upon the gentlest friction. Their breath is often offensive, and upon looking into their mouths the gums appear of an unusual livid redness, are soft and
spongy and becomes afterwards extremely putrid and fungus, the pathogenicomic sign of the disease. They are subject not only to to bleeding from the gums, but more prone to fall into haemorrhages from other parts of the body.

Their skin at this time feels dry, as it does through the whole course of the malady. In many, especially if feverish, it is extremely rough; in some it has an anserine appearance; but most frequently smooth and shining. And when examined it is found covered with several reddish, bluish or rather black and livid spots, equal with the surface of the skin, resembling an extravasation under it, as if were from a bruise. These spots are of different sizes, from the bigness of a lentil to that of handbreadth and larger. But the last are more uncommon in the beginning of the distemper, they being usually then but small and of an irregular roundish figure. They are to be seen chiefly on the legs and thighs, often on the arm, breast and trunk of the body, but more rarely on the head and face.

Then Lind proceeded to describe the signs and symptoms of scurvy as it develops into its second and final stages.

Towards the close of this malady the breast is most commonly affected with a violent uneasy straitness and oppression and an extreme dyspnoea, accompanied sometimes with a pain under the sternum, but more frequently in either of the sides, while other without any complaint of pain have their respiration become quickly contracted and laborious, ending in sudden and often unexpected death. 47

The clinical trial was conducted aboard HMS Salisbury on 20 May 1747. Twelve subjects all had symptoms of scurvy: 'putrid gums, the spots and lassitude, with weakness of their knees'. All of them were lodged together in the one section of the ship and provided with a common meal for breakfast, dinner and supper: 'Water gruel sweetened with sugar in the
morning; fresh mutton broth often times for dinner; at other times puddings, boiled biscuit with sugar etc.; and for supper barley, raisins, rice and currants, sago and wine...'. The twelve seamen were then divided into six pairs, with each pair allocated different daily treatment for a period of fourteen days. The treatment administered was

1. One quart (1.1 litres) of 'cider' (hard apple cider in American terminology).
2. Twenty-five 'gutts' (drops - about 1 ml.) of elixir vitriol, three times throughout the day; the men also gargled with it.
3. Two spoonfuls (about 18 ml.) of vinegar three times throughout the day before meals; the men also gargled and acidulated their food with it.
4. Half a pint of sea water (about 0.3 litres). (The two men of this treatment were the only ones in the group with the tendons of their hams rigid.)
5. Two oranges and one lemon continued for six days only, when the supply was exhausted.
6. An 'electuary' (medicinal paste), the size of a nutmeg (about 4 ml.), prescribed by another surgeon and made up of garlic, mustard seed, balsam of Peru (resin from the tree Myroxylon pereirae), rad. raphan (dried raddish root) and gum myrrh. In addition their drink was barley-water acidulated with tamarind seed; on three or four occasions, cremor tartar (potassium hydrogen tartrate) was added as a mild laxative.

The results of this controlled clinical trial conducted almost three centuries ago generated an outcome which is still held as a valid medical knowledge to this day. Lind’s remarks as to the outcome of the trial were:

The consequence was that the most sudden and visible good effects were perceived from the use of the oranges and lemons; one of those who had taken them being at the end of six days fit for duty. The spots were not indeed at that time quite off his body, nor his gums sound; but without any other other medicine than a gargarism of elixir of vitriol he became quite healthy before we came into Plymouth, which was on the 16th of June. The other was the best recovered of any of his condition, and being
According to the historian Carpenter, the results of this trial made little impact until fifty years after it was conducted. And it took three centuries (with the birth of the discipline of experimental design) before it was hailed as an exemplar. With this clinical trial James Lind established clinically the therapeutic effects of lemon and orange juices vis-à-vis the signs and symptoms of scurvy. At this point in the history of biomedicine, lemons, oranges and scurvy, with its clinical signs and symptoms, had not yet been ‘reduced to biomedical entities’. The laboratory had not yet gained hegemony in translating nature and the body. The patient’s body, the corporate body of the medical practitioner and the ‘body of remedies’ were all irreducibly interacting with each other. ‘Biopsychosocial medicines’ were evaluated through the irreducible values embedded within James Lind’s holistic clinical trial.

**Evaluating Yao in the Twenty-first Century**

The development of an evaluation system for TCM practice is a pressing contemporary issue. Up to this point in time there is no widespread recognition that systematic clinical evaluation is already embedded in TCM practice. TCM is not a static body of knowledge. It incorporates systematic forms of evaluation which support innovation. Critical here are clinical records and possibilities for developing new schools of practice. I describe such a situation in Chapter 3 (p. 152) describing the birth of the Wen Bing school, the school of warm febrile diseases.

Currently a system of values incompatible with TCM practice is widely used in evaluating TCM yao. It is the evaluation system that developed in association with Western biomedicine.
From the seventeenth-century alchemist van Helmont through the twentieth-century educational reformer Abraham Flexner, it was generally believed that establishing medicine as a science meant grounding medical practices in one or more of the laboratory-based disciplines which study the functioning of biological organisms—biochemistry, physiology, genetics, immunology—disciplines which in turn were to be based on the sciences of physics and chemistry. Scientific medicine was a matter of applying the bedside knowledge produced elsewhere, a conception of medical science that still thrives today.  

In contemporary China, this conception of medical science is still being used by researchers to evaluate the practice of TCM. Writing about their experience in using animal models to test the efficacy of TCM therapies, one such researcher has this to say in 1985.

"How to use animal pathological models in theoretical research in the discipline of integrated TCM and WSM (Western scientific medicine) is a new problem. This is due to the fact that traditionally, TCM mainly relies upon the Four Examination Techniques (observing, interrogating, listening, and smelling and palpation) to differentiate clinical patterns bian zheng. It does not have a laboratory or a discipline like pathology and histology with which to examine things."

I argue against allowing the values, standards and theory generated from the laboratory as the basis of evaluation. In contrast to the path being taken by researchers in China in clinically evaluating the practice of TCM, I propose that the embedded local practice of bian zheng lun zhi, i.e. "proposing treatment principles in accordance with the diagnosed clinical patterns" be recognised as an already existing and appropriate model for clinically evaluating yao. The basis of my argument is a claim that TCM is a coherent body of knowledge and should be assessed on the basis of its embedded values, practices and theory.
Before I get on to considering that in more detail, let me look at the current situation with respect to modern evaluation of TCM. In many places in the world today randomised controlled trials (RCTs) are used to evaluate the efficacy of TCM treatment. Some people argue that it is not possible to use RCTs in this way. However, this is not a valid argument. It obviously is possible. RCTs have been adapted and are widely used to effect a form of evaluation of TCM. The questions we need to ask about this is both what sorts of biases does this introduce into the evaluation methods, and what is the distorting effect on TCM to have RCTs as the standard form of evaluation.

In considering biases, some people note that RCTs involving TCM are invalidated because RCTs are set up to test single agents of intervention. However, increasingly, particularly with respect to cancer treatments ‘cocktails’ are tested. Multiple agent RCT trials are now common. Another issue is the issue of ‘double-blindness’. It is correct that double masking (that is hiding the nature of the treatment from both patient and doctor) cannot be used in TCM. However it is also true that double-blind trials are often impossible in biomedical treatments-- that is certainly true of chemotherapy tests, where the side effects make it impossible to ‘hide’ the nature of the treatment from doctors. Increasingly, patients too are aware of the side effects of particular drugs so even single-masking cannot be achieved.

Others argue that RCTs can only be carried out with pills as treatments and that makes RCTs unsuitable for TCM. However this fails to recognise that many TCM treatments are now available as pills. Similarly the argument that focuses on the impossibility of placebo control in TCM does not really hold since there are in fact very few drug trials for chronic diseases that use placebo control due to equipoise requirements.
The second issue with respect to the use of RCTs in TCM is more interesting. The forms of standardisation that RCTs introduce are incompatible with the knowledge practices of TCM, and their use systematises serious distortions in the clinical practice of TCM. Unlike biomedical practice, the focus of traditional Chinese medicine and all its 
vao therapies is the patient at their specific unease in the here-and-now. In contrast Western biomedicine has a focus on a generalised condition. It is true that there are now attempts to individualise biomedical treatments (by weight, gender, ages, and sometimes even genetic profile). However biomedical treatments still treat generalised standardised diseases, not uncomfortable, uneasy people. The capacity of biomedicine to ‘individualise’ is severely limited. RCTs introduce this inadequacy into TCM. It is on that basis that their application to TCM should be critiqued and rejected.

Harris Coulter, the author of the three volumes *Divided Legacy: A History of the Schism in Medical Thought*, in his investigation of the fallacies of modern scientific medicine’s fascination with the randomised clinical trials revealed that a survey of modern RCT specialists attending a consensus conference in Lugano Switzerland in 1987 gave the following response to the query why modern scientific RCTs are in a state of crisis:

* they are corrupted by too many purely commercial trials (74% agreed with this statement)
* trial protocols are often inadequate (72%)
* the results are often ambiguous and uninterpretable (58%)
* they are too expensive (50%)
* they are low priority as a research activity (41%)
* public pressure prevents many physicians from participating in them (38%)
* The gap between the CCT (controlled clinical trial) and clinical reality cannot be bridged (33%)
* They violate the doctor-patient relationship (30%)
Coulter also pointed out that the modern randomised clinical trial or controlled clinical trial also has a strong bias or “favours non-specific medicines over specific ones”. They are “biased in favour of large doses of non-specific medicines.” He stated that

Because the medicine undergoing trial is not specifically adopted to any individual but must exert its effect on a non-homogenous group, it must seek to influence the metabolism over a broad spectrum of functions. In this it is bolstered by the biological thinking, generally, which has concentrated on general metabolic processes common to all species.

Having this bias towards non-specific medicines in turn reinforces the modern scientific clinical trial’s bias towards “drugs of broad spectrum” which enables huge pharmaceutical companies “to recoup the enormous costs of the clinical trials needed for FDA approval which runs as high as $50 million or more—only if his product is later marketed for a variety of different disease conditions.”

It maybe that the only place that RCTs have in TCM is to compare whole treatments. Patients with similar conditions might be randomly allocated to treatment by a TCM practitioner or a biomedical practitioner. In a sense this type of RCT blackboxes the entire therapeutic system. Such holistic tests have shown a high success rate for TCM treatments especially in the field of cancer.”

Let me now suggest that a form of evaluation of TCM which derives from its values, practices and theories is already extant in systematic TCM practice. In Chapter 2 (p. 108) we saw an exemplary clinical case study of the application of bian zheng lun zhi as an effective ‘specific medicine’. Paul is an Australian patient who suffered from diarrhoea. Once his clinical pattern (Paul’s specific condition) has been established and a suitable method of treatment (therapy
specific to Paul) decided, and a corresponding acupuncture point formula (a specific formula for Paul) chosen, the result was a specific individual favourable response. Paul recovered from diarrhoea. In TCM, using the method of *bian zheng lun zhi* means the practitioner treats the individual patient and not the disease.

Signs and symptoms gathered through the Four Examination Techniques *si zhen*; the therapy administered and the therapeutic response must all connect with the medical case record. The medical case records connect uneasy bodies, the ways they are read, treated, and particular practitioners, in specific times and places. Records maintain spatial and temporal balance with the past and the future. This is not unique to TCM. Robert Houston, a science writer and an advocate-scholar of complementary and alternative anticancer therapies in the United States considers case studies as a valid alternative to the gold standard. He stated that "what is being dismissed as anecdotal evidence in cancer, [is] actually an impressive area of evidence, because you can have much more detail in the case studies than you can in a clinical trial." 74. Alvan Feinstein suggests that given this, clinicians should seek to improve the value of their own clinical description:

"Instead of zealously seeking dimensional measurement of symptoms, signs and other human properties that cannot be dimensionally measured with precision or convenience, clinicians must seek ways of improving the value of their own clinical descriptions of these entities." 75

In TCM, symptoms *zheng zhuang* become stories of imbalance, disharmonies, discomfort or abnormalities which the patients feel and relate and to which the TCM doctor listens, observes, palpate and through a systematic inquiry interprets as a clinical pattern *zheng hou*. They are the 'navigation marks' or 'connecting nodes' in a network consisting of the patient, clinician, the *yao* and medical records through which the ailments come to be known and recognised. Patterns of symptoms are the basis upon which doctors differentiate specific
illness as well as upon which clinical patterns are diagnosed. In the practice of TCM, symptoms make possible the creation of meanings embedded in a clinical pattern which emerge in a clinical encounter. The cry, the moans, groans, wheeze, lumps, agonising pain, tears, skin rash, the image of suffering are stories which bring to life a Yin or Yang, excess or deficient, interior or exterior patterns of illness, imbalance or disharmony.

A blocked nose, runny nose, uninterrupted sneezing, teary eyes, cough with phlegm, superficial pulse and a reddish tongue right in the middle of summer is a typical story of an imbalance affecting the lung organ system. Western doctors read this symptoms as rhinitis. Using the metaphor of the reed plant growing on the surface of the ground which provides clues for the presence of accumulated dampness, 74 or that of the cinnabar on the surface of the soil which can indicate possible gold lode underground, 77 clinical symptoms or signs are indicators of disruptions to balance, harmony and health. Clinical symptoms are signs, like the ‘water bubble’ in a spirit level, express and actively point towards extents or deviations to an excess, deficient, Yin or Yang, exterior or interior clinical pattern. An elevated or depressed surface can tilt the water bubble out of the marked boundary space of the centre i.e. norm towards either the extreme end of the tube.

In the case of Paul, the whole course of restoring balance from imbalance with its concomitant signs and symptoms ‘connect’ the medical case record. This case of yesteryears can ‘connect’ to the present and future practice of TCM. When clinically evaluating the efficacy of therapy or therapies administered to a specific patient, changes in the symptoms are the most reliable indicators of efficacy. As acupuncture, herbs, materia medica, foods, or traditional massage therapies are chosen and administered on the basis of the presenting clinical pattern of a particular patient, it therefore follows that the clinical efficacy of these therapies are also
assessed on the basis of the changes in the clinical pattern i.e. changes in the signs and symptoms of a specific patient. On subsequent visits, concentrating upon the patient’s complaints and other symptoms, the practitioner refers to the medical case record and proceeds to assess the patient’s response to the therapy.

This clinical evaluation is undertaken by employing the Four Examination Techniques *si zhen* 四診 as a clinical evaluation template or tool. Instead of using the Four Examination Techniques of observing, listening/smelling, palpating and inquiring to gather clinical data for eventual diagnosis, the Four Examination Techniques undergo a transformation into the Four Evaluation Techniques *si ping* 四評 to observer, palpate, listen/smell, and interrogate clinical symptoms and signs for data to evaluate the efficacy of administered therapy. The data gathered by the Four Evaluation Techniques is then checked, examined, verified and compared with data on clinical signs and symptoms collected and recorded in the medical case record during the previous visit. Using the Four Evaluation Techniques, the clinical pattern is ‘revisited’ or ‘retraced’ *lin zheng* to evaluate whether the therapy achieved the aim of bringing about balance or harmony. Hence, every subsequent visit or consultation is a process of evaluation of the therapy administered during the previous visit. During those visits, presenting symptoms or signs are used as indicators of efficacy of the therapy administered.

As one veteran TCM practitioner summed-up:

"Changes which occur in the patient’s condition after the administration of the therapeutic remedy is the clear mirror which tests the efficacy of the practitioner’s formula set on the basis of a therapeutic method. Hence, with regards the results of the therapy, they should be timely evaluated and verified...there should be follow-up visits, all-round investigation as well as detailed records kept."
"
From the local practice of *bian zheng lun zhi* or 'proposing treatment principles in accordance with the clinical patterns', I propose that the practice of *bian zheng ping zhi* or 'evaluating the treatment administered in accordance with the diagnosed clinical patterns' be adopted as suitable evaluation model for TCM as opposed to the modern science-based RCT model. A set of clinical trial protocols evaluating *yao* that is based on standardising clinical records should be established. Working through clinical records is consistent with the values, practical logic and practice paradigms of TCM. TCM's clinical records give testimony about and witness the life of the *Qi* in TCM. It is to the *Qi* that I devote my final chapter.
ENDNOTES


3 Nanjing TCM College Medical Classic Teaching/Research Group, Huangdi nei jing su wen yishi [Elucidation and Translation of the Yellow Emperor's Classic On Internal Medicine, Plain Questions 皇帝內經素問釋], Shanghai kexue jishu chubanshe, Shanghai, 1981, pp. 443-444


5 DeFrancis, John (ed.), ABC Chinese-English Dictionary (Alphabetically Based Computerised), Honolulu, University of Hawaii Press, 1996, p. 715


7 Chen Ting Jing et al., Kangyan zidian [Kang Yan Chinese Script Dictionary, Vol. 2 顧炎注釋], Guoji wenhu chuban gongsi (1716), 1993 edition, Beijing, p. 1118

8 Xu Zhen (Han Dynasty) Duan Yu (Qing Dynasty), Shuo wen jie zi [Annotations on Explanations of the Culture of Chinese Characters 說文解字], Shanghai guji chubanshe, Shanghai, 1981 edition, p. 42


10 ibid. p. 156

11 Christine R. Geiser, Acupuncture in Florida, History, Regulation and Policy, PhD, University of South Florida, 1989, p. 129

12 A roller or you is an agricultural tool used to crush hard soil and level the ground.


15 Si Yuan Yi (1982), op.cit., p. 24

16 Xue Yu, Zhongguo yayue shilliao [Historical Materials on China's Studies on Yao 中国藥学史料], Renmin weisheng chubanshe, Beijing, 1984, p. 160-167


19 H.Y. Zhang et al., Wo guo de zhong yao ci yue zhonglei [Categories of China's Materia Medica Resources, 中國中藥雜誌], 7(20), 1995, pp. 387-390

20 Xue Yu, (1984), op.cit., p. 439
31 Opium was supposedly produced in India and transported to China for use as yao. It is burnt and smoked, which can ‘deplete one’s treasures and harm the body,’ so that words ‘are not enough to speak of the harm it brings’.

32 Sea Cow is supposed to be found in Australia and the Indian Ocean. The fat of the fish is is extracted and used as cod-liver oil.


3. Please refer to attached table of essential plant yao growing in Australia (Appendix I to Chapter 5)


27 Royal Botanic Gardens Melbourne, Royal Botanic Gardens Melbourne Master Plan, South Yarra, 1997, p. vii

28 The Southern Chinese Collection of the RBGM (Royal Botanic Garden Melbourne) is a project funded by the Sidney Myer Fund and is now completing its developmental phase. Another curator of the RBGM is scheduled to go to China this coming November. The project has attracted intense interest from the public as well as from university students studying traditional Chinese medicine (TCM). As a result a Chinese language (LOTE – Language Other Than English) program is being developed by the RBGM Education service with funding coming from the Department of Education LOTE division.

29 The Manual of Plant Yao Active Constituents 植物药有效成分手册 (1986), published by the Chinese Yao Information Station of the State Administrative Bureau of the People’s Republic of China, has now ‘identified’ the alkaloid contents of the yao as a-Dichoihe, b-Dichoine and y-Dichoine. y-Dichoine is supposed to be 150 times stronger in its anti-malarial efficacy than quinine.

30 The ‘reversed-ordered program’ and the ‘received program’ refer to the sequencing of the stages to be followed in carrying out the research on Changshansan. Most specifically it involves the question of when to start with the clinical testing stage. The reversed-order program favours doing clinical testing first while the ‘received-program’ favours doing chemical and animal testing first and then doing clinical testing later. (S. Le, ‘From Changshansan to a New Anti-Malarial Drug: Re-Networking Chinese Drugs and Excluding Chinese Doctors’, Social Studies of Science, 29/3 (June 1999), 323-58)

31 Mandarin Characters of Endangered Species Used in Herbal Medicines (undated Australian Federal Government internal manual). Panax quinquefolium and Bletilla striata are now growing in the Royal Botanical Garden Melbourne, and Dendrobium nobile is growing in Australia.


33 R. Tiquia, ‘Bears Caged for a Week in Bile Surgery,’ The Age, Letters to the Editor, 22 July 1993

34 J.H. Zhu, Zhongxi yaowu xiangwu zuoyong [Mutual Interaction Between Chinese Yao and Western Pharmaceutical Drugs 中西药物相互作用]. Renmin weisheng chubanshe, Beijing, p. 49. Data about this preparation came from this text in Chinese, which I translated into English.

"D. Gray, ‘Herbalists Raided After Steroid Found in Pills,’ The Sunday Age, 14 August 1994"
Chapter 5: ‘Doing’ Qi


37 David Turnbull, *On with the Motley: The Contingent Assemblage of Knowledge Spaces*, PhD, Department of History and Philosophy of Science, University of Melbourne, 1996, p. 73.

38 Working party on Acupuncture, ‘Acupuncture,’ *A Report to the National Health and Medical Research Council [NH&MRC]*, Canberra, Australian Government Publishing Service

39 Yee Quock Ping v *The Medical Board of Victoria*, 1875, 1, VLR 112


41 The English names given to the acu-tracts were lifted from the book by John O’Connor and Dun Bensky: *Acupuncture: A Comprehensive Text*, Shanghai College of Traditional Medicine, 1981, pp. 67-73

42 Xie Guan, op. cit., Vol. 2, pp. 1504-1505

43 O’Connor and Bensky translate qì jìng ba mai as ‘Eight Miscellaneous Channels’


45 The *Chinese Medical Dictionary* (Vol. 2, p. 1539) defines ming tang as being ‘when someone points to an acupuncture point and the medical practitioner records it, which is akin to the Yellow Emperor sitting in his proclamation hall (also referred to as ming tang) transmitting knowledge on medicine to his minister Lei Gong’. Tu refers to an ‘illustration’ or ‘chart’.


47 In Chinese script his name is written as 王惟德, which in Pin Yin is ‘Wang Wei De’. ‘Wang We-teh’ is another way of Romanizing the Chinese script. Wang Wei De, however, has another Chinese name - 王惟 - which in Pinyin is ‘Wang Wei Yi’. This is the name that Wang has been known by (Historical Literature Research Department of the China TCM Research Academy, *Zhongguo Renwu Cidian* [A Dictionary of TCM Personages], Shanghai cishu chubanshe, 1988, p. 60; Liu Hong Tao, *Zhongguo Gudai Kaji Shi* [History of China’s Ancient Science and Technology] Nankai daxue chubanshe, Tianjin, 1991, p. 632

48 Lin Zhao Gang et al. op. cit., p. 256


50 One of the Sung acupuncture bronze figurine has survived to this day and can be found in the Japanese National Museum (Lin Zhao Gang et al., op. cit., p. 206)

51 Shi Zhong Xu, (1984), op. cit., p. 98

52 ‘A measurement standard for acupuncture point location obtained by flexing the middle finger over the thumb to form a circle, and taking the distance between folds formed by the first and second interphalangeal joints as the standard inch (cun). This method can be used for longitudinal measurements of the extremities and horizontal measurements of the back’ (Ou Ming, ed.) *Han ying zhongyi cidian* [Chinese-English Dictionary of Traditional Chinese Medicine], Hongkong, Joint Publishing, 1988, p. 59

53 Yu Shen Chu (1983), op. cit., p. 149

54 Li Jing Wei et al., *Zhongguo Gudai Yixue Shilue* [An Outline History of Ancient Chinese Medicine], Hebei kexue jishu chubanshe, Hebei, 1990, p. 186

55 Lin Zhao Gang et al., op. cit., p. 204

56 Li Jing Wei et al., op. cit., p. 184

57 Angus Charles Graham (1989), op. cit., p. 477


59 The English word ‘plausible’ comes from the Latin word *plaudere*, which means to applaud. A common dictionary meaning of the word ‘plausible’ is ‘apparently reasonable, valid or truthful’ (Hanks P. (ed.), *Collins Dictionary of the English Language* (1st ed.), Sydney, 1979, p. 1123).
Chapter 5. ‘Doing Qi’


61 Alan Bensoussan et al. (1996), op.cit., p. 24

47 ibid. pp. 36-37


64 Alan Bensoussan et al. (1996), op.cit., p. 341-342


66 Bo Yan Kui, *Yi fan fa hui* [Elaboration of TCM Formulae 医方发挥]. Liaoning kexue jishu chubanshe, Liaoning, 1984, p. 532


68 K. Carpenter, *The History of Scurvy and Vitamin C*, Cambridge, Cambridge University Press, 1986, p. 52. Instead of narrating the substances administered by Lind in his book, I used instead this more recent broken down account, which also provided a ‘translation’ of some of the names and dosages used in the trial.

69 I am using the words ‘biopsychosocial medicine’ in terms similar to those used by the authors of the book *The Body, Culture and Society*, when they say that ‘biomedicine now seems to be in a crisis of legitimation, and alternative, more holistic concepts of medicine and embodiment are challenging its hegemony. Biomedicine has come under fire from epidemiologists, social scientists, feminists, gay and disabled people, theologians and - more tellingly - lay persons. In an attempt to incorporate these critiques and to respond to changes in the nature of disease as well as the economic imperative of neoliberalism, medicine is repositioning itself as a biopsychosocial practice (Armstrong 1987) in which health maintenance - rather than disease (and its) elimination - is becoming the locus for health care organisation and intervention’. (P. Hancock et al., *The Body, Culture and Society: An Introduction*, Buckingham, Open University Press, 2000, p. 6.)


71 Zhang Jia Qing et.al., “Zhong Xi Yi jiehe yanjiu zhong de dongwu bingli moxing “ [The use of animal pathology model in the integrated Western scientific medicine and traditional Chinese medicine research], *Zhong Xi Yi jiehe yanjiu xilu xin fangfa* [Thinking and Methodology in integrating TCM and WSM], Shanghai kexue jishu chubanshe, Shanghai, 1985,p.430

72 Harris L. Coulter, *The Controlled Clinical Trial*, Washington DC, Project Cure, 1991, p.4


75 Harris L. Coulter, op.cit. p. 66

76 TCM Research Institute, *Zongyang zhongxing fangyi zhenduan xuex* [The TCM diagnostic discipline of differentiating symptoms and signs ], Renmin weisheng chubanshe, Beijing, 1985, p. 1

77 Ma Zhong Xue, *Zhong yi xue zhenduan fu daquan* [Encyclopaedia of Chinese medicine diagnostic methods ], Shandong kexue jishu chubanshe, Shandong, 1991, p. 6

78 Wei Chang Chun, “Zhu yi jiu ji, qi feng hou xue” [ Retracing the old footprints, a message to future students], in *Ming liao zhongyi zhi lu* [ The road taken by veteran well-known TCM practitioners ], Shandong kexue jishu chubanshe, Shandong, pp. 243-244
Appendix 1

"At a meeting of the college. We, the doctors of this district, hereby certify that we know you, Quong Hung San San Neng Yong Ah Kan Oo, No. 42, Yee Quock Ping, and we hereby testify that we have correctly examined you, and find that you have studied for six years, and understand the seven external and eight internal pulses, together with the liver, heart, lungs, kidney, and stomach and bladder, spleen, pericardium, big and small bowels, and their pulses; that you are thoroughly conversant with all the pulses in all parts of the body; and that you have studied medicine for four years. We hereby certify that, having passed your examination satisfactorily, you are entitled to practise as a doctor in every district; and we hereby bear witness to your general and thorough knowledge of medicine and the pulses."

An English language version of Yee Quock Ping’s medical credentials

Ex parte Yee Quock Ping Re: The Medical Board of Victoria Vol.1 (June 29, 1875)
Victorian Law Report at 112
<table>
<thead>
<tr>
<th>A</th>
<th>Botanical name*</th>
<th>B</th>
<th>Common*</th>
<th>Pinyin*</th>
<th>Chinese*</th>
<th>F</th>
<th>G</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Botanical name*</td>
<td>B</td>
<td>Common*</td>
<td>Pinyin*</td>
<td>Chinese*</td>
<td>F</td>
<td>G</td>
</tr>
<tr>
<td>2</td>
<td>Acorus gramineus</td>
<td>A</td>
<td>Grass-leaved</td>
<td>Shichangpu</td>
<td>South Yam</td>
<td>root stem tubers</td>
<td>dried root</td>
</tr>
<tr>
<td>3</td>
<td>Adenophora tetraphylla</td>
<td>A</td>
<td>Beech-Silver</td>
<td>Nanshashen</td>
<td>Fragrant</td>
<td>whole plant</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>Agastacherosa</td>
<td>A</td>
<td>Patchouli</td>
<td>Huoxiang</td>
<td>Sage</td>
<td>fruit</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>Akebia quinata</td>
<td>A</td>
<td>Chocolate vine</td>
<td>Yuzhizi</td>
<td>Peony</td>
<td>fruit</td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>Albizia julibrissin</td>
<td>A</td>
<td>Silk tree</td>
<td>Hehuanpi</td>
<td>Mulberry</td>
<td>bark</td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Alpinia galanga</td>
<td>A</td>
<td>Galangal</td>
<td>Hongdoukou</td>
<td>Honey</td>
<td>ripe fruit</td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>Anemarrhena asphodeloides</td>
<td>A</td>
<td>'Know Mother'</td>
<td>Zhihu</td>
<td>Mother</td>
<td>stem tubers</td>
<td></td>
</tr>
<tr>
<td>9</td>
<td>Angelica sinensis</td>
<td>A</td>
<td>Tangkuei</td>
<td>Danggui</td>
<td>Dang Gui</td>
<td>dried root</td>
<td></td>
</tr>
<tr>
<td>10</td>
<td>Arctium lappa</td>
<td>A</td>
<td>Burdock</td>
<td>Niubangzi</td>
<td>Bitter</td>
<td>ripe fruit</td>
<td></td>
</tr>
<tr>
<td>11</td>
<td>Areca catechu</td>
<td>A</td>
<td>Betel palm</td>
<td>Binglang</td>
<td>Betel</td>
<td>seed</td>
<td></td>
</tr>
<tr>
<td>12</td>
<td>Arisaema amurense</td>
<td>A</td>
<td>Jack-in-the-pulp</td>
<td>Tiannanxing</td>
<td>Broadleaf</td>
<td>root pieces</td>
<td></td>
</tr>
<tr>
<td>13</td>
<td>Asarum forbesii</td>
<td>A</td>
<td>Tuxin</td>
<td>Xinshi</td>
<td>Water</td>
<td>stem tubers and root</td>
<td></td>
</tr>
<tr>
<td>14</td>
<td>Aster tataricus</td>
<td>A</td>
<td>Purple Aster</td>
<td>Zhan</td>
<td>Purple</td>
<td>root</td>
<td></td>
</tr>
<tr>
<td>15</td>
<td>Astragalus complanatus</td>
<td>A</td>
<td>Blackberry lily</td>
<td>Shegan</td>
<td>Blackberry</td>
<td>ripened seeds</td>
<td></td>
</tr>
<tr>
<td>16</td>
<td>Belamcanda chinensis</td>
<td>A</td>
<td>Bletilla</td>
<td>Baiji</td>
<td>Bletilla</td>
<td>stem tubers</td>
<td></td>
</tr>
<tr>
<td>17</td>
<td>Brassica juncea</td>
<td>A</td>
<td>Indian mustard</td>
<td>Huangjiejiezi</td>
<td>Mustard</td>
<td>stem tubers</td>
<td></td>
</tr>
<tr>
<td>18</td>
<td>Brassica javanica</td>
<td>A</td>
<td>Crow gull braid</td>
<td>Yadanzi</td>
<td>Crow</td>
<td>seed</td>
<td></td>
</tr>
<tr>
<td>19</td>
<td>Camellia oleifera</td>
<td>A</td>
<td>Tea Oil plant</td>
<td>Chayou</td>
<td>Tea</td>
<td>fruit</td>
<td></td>
</tr>
<tr>
<td>20</td>
<td>Campsis grandiflora</td>
<td>A</td>
<td>Chinese trumpet</td>
<td>Lingxiaohua</td>
<td>Trumpet</td>
<td>flower and root</td>
<td></td>
</tr>
<tr>
<td>21</td>
<td>Camphorosma acuminata</td>
<td>A</td>
<td>Japanese flower</td>
<td>Mugua</td>
<td>Japanese</td>
<td>flower, fruit, bark stems</td>
<td></td>
</tr>
<tr>
<td>22</td>
<td>Carthamus tinctorius</td>
<td>A</td>
<td>Safflower</td>
<td>Honghua</td>
<td>Safflower</td>
<td>flower</td>
<td></td>
</tr>
<tr>
<td>23</td>
<td>Cinnamomum camphora</td>
<td>A</td>
<td>Camphor</td>
<td>Zhangnian</td>
<td>Camphor</td>
<td>fruit</td>
<td></td>
</tr>
<tr>
<td>24</td>
<td>Cinnamomum cassia</td>
<td>A</td>
<td>Cassia</td>
<td>Rougui</td>
<td>Cassia</td>
<td>root, timber, bark, leaves</td>
<td></td>
</tr>
<tr>
<td>25</td>
<td>Citrus aurantium</td>
<td>A</td>
<td>Grape fruit</td>
<td>Zhiqiao</td>
<td>Grape</td>
<td>bark, tender stems and fruit</td>
<td></td>
</tr>
<tr>
<td>26</td>
<td>Citrus limonia</td>
<td>A</td>
<td>Lemon</td>
<td>Ningmeng</td>
<td>Lemon</td>
<td>recently ripened fruit</td>
<td></td>
</tr>
<tr>
<td>27</td>
<td>Citrus medica</td>
<td>A</td>
<td>Citron</td>
<td>Foshou</td>
<td>Citron</td>
<td>fruit and root</td>
<td></td>
</tr>
<tr>
<td>28</td>
<td>Citrus reticulata</td>
<td>A</td>
<td>Tangerine peel</td>
<td>Chenpi</td>
<td>Tangerine</td>
<td>fruit, leaves and root</td>
<td></td>
</tr>
<tr>
<td>29</td>
<td>Clematis armandii</td>
<td>A</td>
<td>Chuanmutong</td>
<td>Mufangyi</td>
<td>Clematis</td>
<td>fruit peel</td>
<td></td>
</tr>
<tr>
<td>30</td>
<td>Cocculus trilobus</td>
<td>A</td>
<td>Relative root</td>
<td>Dangshen</td>
<td>Relative</td>
<td>stem tubers</td>
<td></td>
</tr>
<tr>
<td>31</td>
<td>Codonopsis clatertidea</td>
<td>A</td>
<td>Myrrh</td>
<td>Moyao</td>
<td>Myrrh</td>
<td>dried root</td>
<td></td>
</tr>
<tr>
<td>32</td>
<td>Commiphora myrrha</td>
<td>A</td>
<td>Japanese corm</td>
<td>Shanzhuyu</td>
<td>Japanese</td>
<td>tree resin</td>
<td></td>
</tr>
<tr>
<td>33</td>
<td>Cornus officinalis</td>
<td>A</td>
<td>Hawthorn</td>
<td>Shanzha</td>
<td>Hawthorn</td>
<td>dried flesh of fruit</td>
<td></td>
</tr>
<tr>
<td>34</td>
<td>Crataegus pinnatifida</td>
<td>A</td>
<td>Saffron</td>
<td>Xionghua</td>
<td>Saffron</td>
<td>fruit, root and leaves</td>
<td></td>
</tr>
<tr>
<td>35</td>
<td>Crocus sativa</td>
<td>A</td>
<td>Croton</td>
<td>Badou</td>
<td>Croton</td>
<td>dried stigma</td>
<td></td>
</tr>
<tr>
<td>36</td>
<td>Croton tiglium</td>
<td>A</td>
<td>China fir</td>
<td>Shenn</td>
<td>China</td>
<td>dried ripened fruit</td>
<td></td>
</tr>
<tr>
<td>37</td>
<td>Cunninghamia lanceolata</td>
<td>A</td>
<td>Chinese weeping</td>
<td>Baishu</td>
<td>Cunninghamia</td>
<td>root bark</td>
<td></td>
</tr>
<tr>
<td>38</td>
<td>Cupressus funebris</td>
<td>A</td>
<td>Tunicate tuber</td>
<td>Jianghuang</td>
<td>Tunicate</td>
<td>dried stem tubers</td>
<td></td>
</tr>
<tr>
<td>39</td>
<td>Curcuma longa</td>
<td>A</td>
<td>Dodder seeds</td>
<td>Natusi</td>
<td>Dodder</td>
<td>dried stem tubers</td>
<td></td>
</tr>
<tr>
<td>40</td>
<td>Cuscuta australis</td>
<td>A</td>
<td>Nut grass</td>
<td>Xiangfu</td>
<td>Nut</td>
<td>dried flower buds</td>
<td></td>
</tr>
<tr>
<td>41</td>
<td>Cyperus rotundus</td>
<td>A</td>
<td>Daphne flower</td>
<td>Yuanhua</td>
<td>Daphne</td>
<td>dried ripe fruit</td>
<td></td>
</tr>
<tr>
<td>42</td>
<td>Daucus carota</td>
<td>A</td>
<td>carrot fruit</td>
<td>Nanheisi</td>
<td>carrot</td>
<td>stem</td>
<td></td>
</tr>
<tr>
<td>43</td>
<td>Dendrobium nobile</td>
<td>A</td>
<td>Bushel of stone</td>
<td>Shihou</td>
<td>Bushel</td>
<td>stem</td>
<td></td>
</tr>
<tr>
<td>44</td>
<td>Dianthus chinensis</td>
<td>A</td>
<td>Chinese pink fl</td>
<td>Qumai</td>
<td>Chinese</td>
<td>part of plant above ground</td>
<td></td>
</tr>
<tr>
<td>45</td>
<td>Dianthus superbus</td>
<td>A</td>
<td>Fringed pink flower</td>
<td>Changgan</td>
<td>Fringed</td>
<td>root</td>
<td></td>
</tr>
<tr>
<td>No.</td>
<td>Provenance</td>
<td>RBGN Location</td>
<td>Accession*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>-----</td>
<td>-------------------------</td>
<td>-------------------------</td>
<td>------------</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>Provenance*</td>
<td>RBGN Location*</td>
<td>Accession*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>Japan</td>
<td>Southern chinese bed</td>
<td>1952</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>China, Japan</td>
<td>Southern Chinese bed</td>
<td>1952; 1990</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>China, Japan, Korea</td>
<td>Drinking fountain bed</td>
<td>1950</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>China, Iran</td>
<td>Round eastern bed</td>
<td>1980</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>Indonesia, Southeast Asia</td>
<td>tropical house</td>
<td>1988</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Indonesia, Southeast Asia</td>
<td>Herb garden</td>
<td>1998</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>Europe, North Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9</td>
<td>Indonesia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10</td>
<td>Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11</td>
<td>Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12</td>
<td>Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13</td>
<td>Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>14</td>
<td>Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15</td>
<td>Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>16</td>
<td>China, Japan</td>
<td>south chinese bed</td>
<td>1999, 1950, 1985</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>17</td>
<td>South China</td>
<td>South Chinese bed</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>18</td>
<td>South China</td>
<td>south Chinese bed</td>
<td>1952, 1950, 1984, 1999</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>19</td>
<td>China, Japan</td>
<td>Zelkova bed</td>
<td>1950</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>21</td>
<td>China, Japan</td>
<td>Oak lawn; Alnus bed</td>
<td>1950, 1951, 1952;</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>22</td>
<td>Southeast Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>23</td>
<td>Arabia, Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>24</td>
<td>India</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>25</td>
<td>Souteast Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>26</td>
<td>China</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>27</td>
<td>China, Himalayas</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>28</td>
<td>Middle East &amp; Somalia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>29</td>
<td>Japan, Korea</td>
<td>Gleditsia bed</td>
<td>1978</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>30</td>
<td>North China</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>31</td>
<td>Middle East</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>32</td>
<td>Europe</td>
<td>Conifer bed</td>
<td>1950; 1992</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>33</td>
<td>Central China</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>34</td>
<td>Queensland, Australia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>35</td>
<td>India</td>
<td>orchid house</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>36</td>
<td>China</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>37</td>
<td>Europe &amp; Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>38</td>
<td>India, Southeast Asia</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>39</td>
<td>China</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>40</td>
<td>Drive bed</td>
<td></td>
<td>1950</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>No.</td>
<td>Qi*</td>
<td>Flavour*</td>
<td>Meridian Entrance*</td>
<td>Active principle*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>-----</td>
<td>-----</td>
<td>----------</td>
<td>--------------------</td>
<td>-------------------</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>Qi*</td>
<td>Flavour*</td>
<td>Meridian Entrance*</td>
<td>Active principle*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>warm</td>
<td>bitter, pungent</td>
<td>heart, stomach</td>
<td>B-Asarone</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>slightly cold</td>
<td>sweet</td>
<td>lung, stomach</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>slightly warm</td>
<td>pungent</td>
<td>lungs, spleen, stomach</td>
<td>Anethole</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>cold</td>
<td>bitter</td>
<td>liver, g. bladder, u. bladder,</td>
<td>Sapindoside AB</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>balanced</td>
<td>sweet</td>
<td>heart, liver, lung</td>
<td>Albitocin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>warm</td>
<td>pungent</td>
<td>spleen, lung</td>
<td>Acetoxychavicol acetate</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>cold</td>
<td>bitter, sweet</td>
<td>lung, stomach, kidney</td>
<td>Sarsasapogenin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9</td>
<td>warm</td>
<td>sweet, pungent</td>
<td>liver, heart, spleen</td>
<td>Ligustilide</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10</td>
<td>cold</td>
<td>pungent, bitter</td>
<td>lung, stomach</td>
<td>Arctin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11</td>
<td>warm</td>
<td>pungent, bitter</td>
<td>stomach, intestines</td>
<td>Arecoline</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12</td>
<td>warm</td>
<td>bitter, pungent, toxic*</td>
<td>lung, liver, spleen</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13</td>
<td>warm</td>
<td>pungent</td>
<td>lung, heart, kidney</td>
<td>Methyleugenol</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>14</td>
<td>warm</td>
<td>pungent, bitter</td>
<td>lung</td>
<td>Anethole, astersaponin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15</td>
<td>warm</td>
<td>sweet</td>
<td>liver, kidney</td>
<td>Vitamin A</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>16</td>
<td>cold</td>
<td>bitter</td>
<td>lungs</td>
<td>Iridin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>17</td>
<td>slightly cold</td>
<td>puckery, bitter, sweet</td>
<td>lung, liver, stomach</td>
<td>Bletilla mannan</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>18</td>
<td>warm</td>
<td>pungent</td>
<td>lungs</td>
<td>Benzyl isothiocyanate</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>19</td>
<td>cold</td>
<td>bitter, slightly toxic</td>
<td>l. intestines, liver</td>
<td>Brucantinol</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>20</td>
<td>balanced</td>
<td>bitter, slightly toxic</td>
<td></td>
<td>Fatty oil</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>21</td>
<td>cold</td>
<td>sweet, sour</td>
<td>liver, pericardium</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>22</td>
<td>warm</td>
<td>pungent</td>
<td>heart, liver</td>
<td>Carthamine</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>23</td>
<td>warm</td>
<td>sour</td>
<td>liver, spleen</td>
<td>Saponins</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>24</td>
<td>very hot</td>
<td>pungent, sweet</td>
<td>kidney, spleen, heart, liver</td>
<td>Cinnamaldehyde</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>25</td>
<td>slightly cold</td>
<td>pungent, bitter, sour</td>
<td>spleen, stomach</td>
<td>N-methyltyramine</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>26</td>
<td>warm</td>
<td>pungent, bitter, sour</td>
<td>spleen, stomach</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>27</td>
<td>very hot</td>
<td>pungent, sweet</td>
<td>kidney, spleen, heart, liver</td>
<td>Cinnamaldehyde</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>28</td>
<td>cold</td>
<td>bland, bitter</td>
<td>small intestines, u. bladder</td>
<td>Trilobine</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>29</td>
<td>cold</td>
<td>pungent, bitter</td>
<td>spleen, lungs</td>
<td>Hesperidin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>30</td>
<td>cold</td>
<td>pungent, bitter</td>
<td>spleen, lungs</td>
<td>Nobiletin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>31</td>
<td>Balanced</td>
<td>sweet</td>
<td>spleen, lungs</td>
<td>Codonopsis</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>32</td>
<td>balanced</td>
<td>bitter</td>
<td>spleen, lungs</td>
<td>Camaldehyde</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>33</td>
<td>slightly warm</td>
<td>sour, puckery</td>
<td>liver, kidneys</td>
<td>Gallic acid</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>34</td>
<td>slightly warm</td>
<td>sour, sweet</td>
<td>spleen, stomach, liver</td>
<td>Caffeic acid</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>35</td>
<td>balanced</td>
<td>sweet</td>
<td>heart, liver</td>
<td>Crocetin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>36</td>
<td>hot</td>
<td>pungent, heavily toxic</td>
<td>Phorbotol 12-Tiglate 13-decanonate</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>37</td>
<td>cold</td>
<td>bitter, pungent</td>
<td>spleen, liver</td>
<td>Curcumin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>38</td>
<td>balanced</td>
<td>pungent, sweet</td>
<td>liver, kidney</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>39</td>
<td>balanced</td>
<td>slightly bitter &amp; sweet, pungent</td>
<td>liver, spleen triple energizer</td>
<td>B-pinene, camphene</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>40</td>
<td>cold</td>
<td>bitter, pungent, toxic</td>
<td>lung, spleen, kidney</td>
<td>Apigenin</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>41</td>
<td>balanced</td>
<td>bitter, pungent, slight toxic</td>
<td>spleen, stomach</td>
<td>Dauosterol</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>42</td>
<td>slightly cold</td>
<td>sweet</td>
<td>stomach, kidney</td>
<td>Dendronine</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>43</td>
<td>cold</td>
<td>bitter</td>
<td>heart, s. intestines</td>
<td>y-Dichroine</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>No.</td>
<td>Common Name</td>
<td>Scientific Name</td>
<td>Language</td>
<td>Part</td>
<td>English</td>
<td>Chinese</td>
<td>Pinyin</td>
</tr>
<tr>
<td>-----</td>
<td>-------------</td>
<td>-----------------</td>
<td>----------</td>
<td>------</td>
<td>---------</td>
<td>---------</td>
<td>--------</td>
</tr>
<tr>
<td>50</td>
<td>Diospyros kaki</td>
<td>persimmon</td>
<td>Chinese</td>
<td>柿子</td>
<td>fruit calyx &amp; receptacle</td>
<td></td>
<td></td>
</tr>
<tr>
<td>51</td>
<td>Dolichos lablab</td>
<td>Hyacinth bean</td>
<td>Chinese</td>
<td>龙眼肉</td>
<td>false seed peel</td>
<td></td>
<td></td>
</tr>
<tr>
<td>52</td>
<td>Eriobotrya japonica</td>
<td>Loquat</td>
<td>Chinese</td>
<td>花椒</td>
<td>seed</td>
<td></td>
<td></td>
</tr>
<tr>
<td>53</td>
<td>Eucalyptus globulus</td>
<td>Tasmanian blue</td>
<td>Chinese</td>
<td>杜仲</td>
<td>dried bark</td>
<td></td>
<td></td>
</tr>
<tr>
<td>54</td>
<td>Eucommia ulmoides</td>
<td>Eucommia bark</td>
<td>Chinese</td>
<td>茴香</td>
<td>dried ripe fruit</td>
<td></td>
<td></td>
</tr>
<tr>
<td>55</td>
<td>Forsythia suspensa</td>
<td>Golden bells</td>
<td>Chinese</td>
<td>菊花</td>
<td>fruit</td>
<td></td>
<td></td>
</tr>
<tr>
<td>56</td>
<td>Fraxinus chinensis</td>
<td>Chinese ash</td>
<td>Chinese</td>
<td>秦皮</td>
<td>bark</td>
<td></td>
<td></td>
</tr>
<tr>
<td>57</td>
<td>Gardenia jasminoides</td>
<td>Cape jasmine</td>
<td>Chinese</td>
<td>梅子</td>
<td>fruit and root</td>
<td></td>
<td></td>
</tr>
<tr>
<td>58</td>
<td>Gentiana macrophylla</td>
<td>Qinjiao</td>
<td>Chinese</td>
<td>蒿</td>
<td>root</td>
<td></td>
<td></td>
</tr>
<tr>
<td>59</td>
<td>Ginkgo biloba</td>
<td>Maidenhair tree</td>
<td>Chinese</td>
<td>白果</td>
<td>seed kemi</td>
<td></td>
<td></td>
</tr>
<tr>
<td>60</td>
<td>Gleditsia sinensis</td>
<td>Chinese honey</td>
<td>Chinese</td>
<td>桂花</td>
<td>dried thorn</td>
<td></td>
<td></td>
</tr>
<tr>
<td>61</td>
<td>Glycine max</td>
<td>Soybean</td>
<td>Chinese</td>
<td>淡豆豉</td>
<td>fermented seed</td>
<td></td>
<td></td>
</tr>
<tr>
<td>62</td>
<td>Glycyrrhiza glabra</td>
<td>Licorice</td>
<td>Chinese</td>
<td>甘草</td>
<td>root and stem tubers</td>
<td></td>
<td></td>
</tr>
<tr>
<td>63</td>
<td>Hordeum vulgare</td>
<td>Pearl barley</td>
<td>Chinese</td>
<td>麦芽</td>
<td>seed sprouts</td>
<td></td>
<td></td>
</tr>
<tr>
<td>64</td>
<td>Ilex Cornuta</td>
<td>Chinese holly</td>
<td>Chinese</td>
<td>桃枝叶</td>
<td>leaves</td>
<td></td>
<td></td>
</tr>
<tr>
<td>65</td>
<td>Illicium verum</td>
<td>Star anise</td>
<td>Chinese</td>
<td>乌头</td>
<td>ripe fruit</td>
<td></td>
<td></td>
</tr>
<tr>
<td>66</td>
<td>Inula helenium</td>
<td>Elecampane</td>
<td>Chinese</td>
<td>土木香</td>
<td>dried root</td>
<td></td>
<td></td>
</tr>
<tr>
<td>67</td>
<td>Isatis tinctoria</td>
<td>Wood root</td>
<td>Chinese</td>
<td>板蓝根</td>
<td>dried root</td>
<td></td>
<td></td>
</tr>
<tr>
<td>68</td>
<td>Juglans regia</td>
<td>Persian walnut</td>
<td>Chinese</td>
<td>核桃仁</td>
<td>kernel</td>
<td></td>
<td></td>
</tr>
<tr>
<td>69</td>
<td>Juncus effusus</td>
<td>Soft rush</td>
<td>Chinese</td>
<td>灯心草</td>
<td>dried core of stem</td>
<td></td>
<td></td>
</tr>
<tr>
<td>70</td>
<td>Ligustrum lucidum</td>
<td>Glossy privet</td>
<td>Chinese</td>
<td>茶子</td>
<td>fruit</td>
<td></td>
<td></td>
</tr>
<tr>
<td>71</td>
<td>Lilium brownii</td>
<td>Lily bulb</td>
<td>Chinese</td>
<td>百合</td>
<td>bulb</td>
<td></td>
<td></td>
</tr>
<tr>
<td>72</td>
<td>Liriope muscari</td>
<td>Shanmading</td>
<td>Chinese</td>
<td>山麦冬</td>
<td>root tuber</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
| 73  | Liriope spicata | * |  | * | *
<p>| 74  | Lonicera japonica | Japanese honeysuckle | Chinese | 金黄花 | flower bud |
| 75  | Loranthus parasiticus | Mulberry paras | Chinese | 桑寄生 | stem with leaves |
| 76  | Luffa cylindrica | Sigualuo | Chinese | 丝瓜络 | vascular bundle |
| 77  | Lycium chinense | Chinese boxtho | Chinese | 枸杞子 | dried fruit |
| 78  | Lygodium japonicum | climbing fern | Chinese | 海金沙 | spore |
| 79  | Magnolia officinalis | magnolia bark | Chinese | 厚朴花 | tree bark and root skin, flower |
| 80  | Magnolia denudata | Yulan | Chinese | 辛夷 | flower bud |
| 81  | Melia azedarach | White cedar | Chinese | 苦楝皮 | dried bark and root peel |
| 82  | Mentha arvensis | Apple mint | Chinese | 薄荷 | whole plant above ground |
| 83  | Morinda officinalis | Bajitian | Chinese | 巴戟天 | root |
| 84  | Morus alba | White mulberry | Chinese | 桑白皮 | root bark |
| 85  | Myristica fragrans | Nutmeg | Chinese | 肉豆蔻 | dried nut |
| 86  | Nandina domestica | Heavenly bame | Chinese | 南天竹 | stem and fruit |
| 87  | Nelumbo nucifera | Sacred lotus | Chinese | 莲子 | seeds |
| 88  | Ophiopogon japonicus | Mondo grass | Chinese | 豆根 | pieces of root |
| 89  | Oryza sativa | Unhusked Rice | Chinese | 粳稻 | fermented grain |
| 90  | Paonia lactiflora | Peony | Chinese | 白芍 | root |
| 91  | Paonia lactiflora (wild species) | Chishao | Chinese | 赤芍 | root |
| 92  | Panax quinquefolium | Ginseng | Chinese | 西洋参 | root |
| 93  | Phragmites communis | Reed | Chinese | 户根 | stem tubers |
| 94  | Phyllanthus emblica | Myrobalan | Chinese | 餐甘子 | dried ripe fruit |</p>
<table>
<thead>
<tr>
<th>H.E.</th>
<th>Description</th>
<th>Year(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>50</td>
<td>China, Japan</td>
<td></td>
</tr>
<tr>
<td>51</td>
<td>South Africa</td>
<td></td>
</tr>
<tr>
<td>52</td>
<td>East, Asia</td>
<td></td>
</tr>
<tr>
<td>53</td>
<td>Victoria, Bass Strait, Island &amp; Tasmania, Australia, eucalypt lawn</td>
<td></td>
</tr>
<tr>
<td>54</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>55</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>56</td>
<td>Mediterranean region</td>
<td>herb garden</td>
</tr>
<tr>
<td>57</td>
<td>China</td>
<td>Rockberry bed</td>
</tr>
<tr>
<td>58</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>60</td>
<td>China</td>
<td>Conifer bed</td>
</tr>
<tr>
<td>61</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>62</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>63</td>
<td>Southeast Europe</td>
<td></td>
</tr>
<tr>
<td>64</td>
<td>Central Europe</td>
<td></td>
</tr>
<tr>
<td>65</td>
<td>East, China</td>
<td></td>
</tr>
<tr>
<td>66</td>
<td>China, Vietnam</td>
<td></td>
</tr>
<tr>
<td>67</td>
<td>Europe</td>
<td></td>
</tr>
<tr>
<td>68</td>
<td>Europe &amp; Asia</td>
<td>Herb garden, plant craft cottage</td>
</tr>
<tr>
<td>69</td>
<td>Iran</td>
<td></td>
</tr>
<tr>
<td>70</td>
<td>Europe &amp; America</td>
<td></td>
</tr>
<tr>
<td>71</td>
<td>China, Japan, Korea</td>
<td>Gov't/House bed</td>
</tr>
<tr>
<td>72</td>
<td>China, Japan</td>
<td></td>
</tr>
<tr>
<td>73</td>
<td>Japan, East Asia</td>
<td>Gate embankment</td>
</tr>
<tr>
<td>74</td>
<td>China, Egypt, Himalayas</td>
<td></td>
</tr>
<tr>
<td>75</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>76</td>
<td>Qld, N.T. (Australia), Asia</td>
<td>Fern Gully</td>
</tr>
<tr>
<td>77</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>78</td>
<td>Central China</td>
<td>Southern Chinese bed</td>
</tr>
<tr>
<td>79</td>
<td>Asia, W. Australia</td>
<td>Guilfoyle medicinal bed</td>
</tr>
<tr>
<td>80</td>
<td>Asia, Europe</td>
<td></td>
</tr>
<tr>
<td>81</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>82</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>83</td>
<td>Qld, N.T. (Australia), Asia</td>
<td></td>
</tr>
<tr>
<td>84</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>85</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>86</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>87</td>
<td>China, Japan</td>
<td>Lakeside Group</td>
</tr>
<tr>
<td>88</td>
<td>Central China</td>
<td></td>
</tr>
<tr>
<td>90</td>
<td>Asia, New Guinea, Qld. &amp; N.T.</td>
<td>Tropical House</td>
</tr>
<tr>
<td>91</td>
<td>China, Japan</td>
<td>Southern Chinese bed</td>
</tr>
<tr>
<td>92</td>
<td>Malay archipelago</td>
<td></td>
</tr>
<tr>
<td>93</td>
<td>China</td>
<td>Southern Chinese bed</td>
</tr>
<tr>
<td>94</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>95</td>
<td>China</td>
<td>Southern Chinese bed</td>
</tr>
<tr>
<td>96</td>
<td>E. North America</td>
<td>Winter Garden Bed</td>
</tr>
<tr>
<td>97</td>
<td>Europe</td>
<td></td>
</tr>
<tr>
<td>98</td>
<td>Asia</td>
<td></td>
</tr>
<tr>
<td>No.</td>
<td>Condition</td>
<td>Taste</td>
</tr>
<tr>
<td>-----</td>
<td>-----------------</td>
<td>----------------</td>
</tr>
<tr>
<td>50</td>
<td>balanced</td>
<td>bitter,puckery</td>
</tr>
<tr>
<td>51</td>
<td>slightly warm</td>
<td>sweet</td>
</tr>
<tr>
<td>52</td>
<td>slightly cold</td>
<td>bitter</td>
</tr>
<tr>
<td>53</td>
<td>balance</td>
<td>slightly pungent &amp; bitter</td>
</tr>
<tr>
<td>54</td>
<td>warm</td>
<td>sweet</td>
</tr>
<tr>
<td>55</td>
<td>warm</td>
<td>sweet</td>
</tr>
<tr>
<td>56</td>
<td>warm</td>
<td>pungent</td>
</tr>
<tr>
<td>57</td>
<td>slightly cold</td>
<td>bitter</td>
</tr>
<tr>
<td>58</td>
<td>cold</td>
<td>bitter, puckery</td>
</tr>
<tr>
<td>59</td>
<td>cold</td>
<td>bitter</td>
</tr>
<tr>
<td>60</td>
<td>balanced</td>
<td>bitter, pungent</td>
</tr>
<tr>
<td>61</td>
<td>balanced</td>
<td>sweet, bitter, puckery, toxic</td>
</tr>
<tr>
<td>62</td>
<td>warm</td>
<td>pungent</td>
</tr>
<tr>
<td>63</td>
<td>cool</td>
<td>bitter, pungent</td>
</tr>
<tr>
<td>64</td>
<td>balanced</td>
<td>sweet</td>
</tr>
<tr>
<td>65</td>
<td>balanced</td>
<td>sweet</td>
</tr>
<tr>
<td>66</td>
<td>cool</td>
<td>bitter</td>
</tr>
<tr>
<td>67</td>
<td>warm</td>
<td>pungent</td>
</tr>
<tr>
<td>68</td>
<td>warm</td>
<td>pungent, bitter</td>
</tr>
<tr>
<td>69</td>
<td>very cold</td>
<td>bitter</td>
</tr>
<tr>
<td>70</td>
<td>warm</td>
<td>sweet</td>
</tr>
<tr>
<td>71</td>
<td>slightly cold</td>
<td>sweet, bland</td>
</tr>
<tr>
<td>72</td>
<td>cool</td>
<td>sweet, bitter</td>
</tr>
<tr>
<td>73</td>
<td>cold</td>
<td>sweet</td>
</tr>
<tr>
<td>74</td>
<td></td>
<td></td>
</tr>
<tr>
<td>75</td>
<td></td>
<td></td>
</tr>
<tr>
<td>76</td>
<td></td>
<td></td>
</tr>
<tr>
<td>77</td>
<td>cold</td>
<td>sweet</td>
</tr>
<tr>
<td>78</td>
<td>balanced</td>
<td>bitter, sweet</td>
</tr>
<tr>
<td>79</td>
<td>balanced</td>
<td>sweet</td>
</tr>
<tr>
<td>80</td>
<td>balanced</td>
<td>sweet</td>
</tr>
<tr>
<td>81</td>
<td>cold</td>
<td>salty, sweet</td>
</tr>
<tr>
<td>82</td>
<td>slightly warm</td>
<td>bitter</td>
</tr>
<tr>
<td>83</td>
<td>warm</td>
<td>pungent</td>
</tr>
<tr>
<td>84</td>
<td>cold</td>
<td>bitter, toxic</td>
</tr>
<tr>
<td>85</td>
<td>cool</td>
<td>pungent</td>
</tr>
<tr>
<td>86</td>
<td>slightly cool</td>
<td>sweet, pungent</td>
</tr>
<tr>
<td>87</td>
<td>cold</td>
<td>sweet</td>
</tr>
<tr>
<td>88</td>
<td>warm</td>
<td>pungent</td>
</tr>
<tr>
<td>89</td>
<td>balanced</td>
<td>sweet, sour</td>
</tr>
<tr>
<td>90</td>
<td>balanced</td>
<td>sweet, puckery</td>
</tr>
<tr>
<td>91</td>
<td>slightly cold</td>
<td>slightly bitter, sweet</td>
</tr>
<tr>
<td>92</td>
<td>warm</td>
<td>sweet</td>
</tr>
<tr>
<td>93</td>
<td>slightly cold</td>
<td>bitter, sour</td>
</tr>
<tr>
<td>94</td>
<td>slightly cold</td>
<td>bitter, pungent</td>
</tr>
<tr>
<td>95</td>
<td>cool</td>
<td>slightly bitter, sweet</td>
</tr>
<tr>
<td>96</td>
<td>cold</td>
<td>slightly bitter, sweet</td>
</tr>
<tr>
<td>97</td>
<td>cool</td>
<td>sweet, sour, puckery</td>
</tr>
<tr>
<td>98</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>A</td>
<td>B</td>
</tr>
<tr>
<td>---</td>
<td>----------------</td>
<td>----------------</td>
</tr>
<tr>
<td>99</td>
<td>Phylllostachys nigra</td>
<td>Black bamboo</td>
</tr>
<tr>
<td>100</td>
<td>Phytolacca acinosa</td>
<td>Poke root</td>
</tr>
<tr>
<td>101</td>
<td>Pinus massoniana</td>
<td>Canton pine</td>
</tr>
<tr>
<td>102</td>
<td>Platycladus orientalis</td>
<td>Chinese arbor-baiziren</td>
</tr>
<tr>
<td>103</td>
<td>Platycodon grandiflorum</td>
<td>Dwarf balloon</td>
</tr>
<tr>
<td>104</td>
<td>Portulaca oleracea</td>
<td>Pigweed</td>
</tr>
<tr>
<td>105</td>
<td>Prunella vulgaris</td>
<td>Self-heal</td>
</tr>
<tr>
<td>106</td>
<td>Prunus armeniaca</td>
<td>Apricot</td>
</tr>
<tr>
<td>107</td>
<td>Prunus humilis</td>
<td>Yuliren</td>
</tr>
<tr>
<td>108</td>
<td>Prunus mume</td>
<td>Japanese apricot</td>
</tr>
<tr>
<td>109</td>
<td>Prunus persica</td>
<td>Peach</td>
</tr>
<tr>
<td>110</td>
<td>Punica granatum</td>
<td>Pomegranate</td>
</tr>
<tr>
<td>111</td>
<td>Quisqualis indica</td>
<td>Rangoon creepe</td>
</tr>
<tr>
<td>112</td>
<td>Raphanus sativus</td>
<td>Radish seed</td>
</tr>
<tr>
<td>113</td>
<td>Rehmannia glutinosa</td>
<td>Chinese foxglo</td>
</tr>
<tr>
<td>114</td>
<td>Rheum officinale</td>
<td>Rhubarb root</td>
</tr>
<tr>
<td>115</td>
<td>Ricinus communis</td>
<td>Castor oil plant</td>
</tr>
<tr>
<td>116</td>
<td>Rosa chinensis</td>
<td>China rose</td>
</tr>
<tr>
<td>117</td>
<td>Rosa laevigata</td>
<td>Cherokee rose</td>
</tr>
<tr>
<td>118</td>
<td>Sanguisorba officinalis</td>
<td>Green burnet</td>
</tr>
<tr>
<td>119</td>
<td>Santalum album</td>
<td>Sandalwood</td>
</tr>
<tr>
<td>120</td>
<td>Sophora japonica</td>
<td>Pagoda tree</td>
</tr>
<tr>
<td>121</td>
<td>Strychnos nux-vomica</td>
<td>Nux vomica</td>
</tr>
<tr>
<td>122</td>
<td>Terminalia chebula</td>
<td>Myrobalan fruit</td>
</tr>
<tr>
<td>123</td>
<td>Tetrapanax papyferus</td>
<td>Rice paper plant</td>
</tr>
<tr>
<td>124</td>
<td>Trachycarpus fortunei</td>
<td>Chinese wind m</td>
</tr>
<tr>
<td>125</td>
<td>Tribulus terrestris</td>
<td>Caltrop fruit</td>
</tr>
<tr>
<td>126</td>
<td>Trigonella foenum-graecum</td>
<td>Fenugreek seed</td>
</tr>
<tr>
<td>127</td>
<td>Tussilago farfara</td>
<td>Coltsfoot</td>
</tr>
<tr>
<td>128</td>
<td>Typha angustifolia</td>
<td>Cat tail</td>
</tr>
<tr>
<td>129</td>
<td>Vitex trifolia</td>
<td>Manjingshi</td>
</tr>
<tr>
<td>130</td>
<td>Zingiber officinale</td>
<td>Ginger</td>
</tr>
<tr>
<td>131</td>
<td>Zizyphus jujuba</td>
<td>common jujuba</td>
</tr>
<tr>
<td>H</td>
<td>E</td>
<td>L</td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td>99</td>
<td>Long Island</td>
<td>1951;1950;1951</td>
</tr>
<tr>
<td>100</td>
<td>Conifer Bed</td>
<td></td>
</tr>
<tr>
<td>101</td>
<td>South China</td>
<td></td>
</tr>
<tr>
<td>102</td>
<td>Southern Chinese bed</td>
<td>1992;1982</td>
</tr>
<tr>
<td>103</td>
<td>Inland Australia</td>
<td></td>
</tr>
<tr>
<td>104</td>
<td>Europe</td>
<td></td>
</tr>
<tr>
<td>105</td>
<td>South China, Mongolia</td>
<td></td>
</tr>
<tr>
<td>106</td>
<td>China, Japan, Korea</td>
<td>Northern Border Bed</td>
</tr>
<tr>
<td>107</td>
<td>China</td>
<td>Lagerstroemia Bed</td>
</tr>
<tr>
<td>108</td>
<td>West Asia</td>
<td></td>
</tr>
<tr>
<td>109</td>
<td>Malaysia</td>
<td></td>
</tr>
<tr>
<td>110</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>111</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>112</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>113</td>
<td>China, Tibet</td>
<td></td>
</tr>
<tr>
<td>114</td>
<td>Africa</td>
<td></td>
</tr>
<tr>
<td>115</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>116</td>
<td>China</td>
<td></td>
</tr>
<tr>
<td>117</td>
<td>China, Japan</td>
<td>Species Rose Collection</td>
</tr>
<tr>
<td>118</td>
<td>Europe</td>
<td></td>
</tr>
<tr>
<td>119</td>
<td>India</td>
<td></td>
</tr>
<tr>
<td>120</td>
<td>China, Korea</td>
<td>Nth American Woodland Collecti</td>
</tr>
<tr>
<td>121</td>
<td>India &amp; Malay peninsula</td>
<td></td>
</tr>
<tr>
<td>124</td>
<td>proclaimed as weed in Victoria</td>
<td></td>
</tr>
<tr>
<td>125</td>
<td>Mediterranean region</td>
<td></td>
</tr>
<tr>
<td>126</td>
<td>Europe &amp; Asia</td>
<td></td>
</tr>
<tr>
<td>127</td>
<td>North hemisphere</td>
<td>Touch Wood Bed</td>
</tr>
<tr>
<td>128</td>
<td>NSW, Qld., Asia</td>
<td>Lake View Shelter Bed</td>
</tr>
<tr>
<td>129</td>
<td>Tropical Asia</td>
<td>Tropical House</td>
</tr>
<tr>
<td>130</td>
<td>West Asia, China</td>
<td>Hoptoun Lawn</td>
</tr>
<tr>
<td>131</td>
<td></td>
<td></td>
</tr>
<tr>
<td>132</td>
<td></td>
<td></td>
</tr>
<tr>
<td>133</td>
<td></td>
<td></td>
</tr>
<tr>
<td>134</td>
<td></td>
<td></td>
</tr>
<tr>
<td>135</td>
<td></td>
<td></td>
</tr>
<tr>
<td>136</td>
<td></td>
<td></td>
</tr>
<tr>
<td>137</td>
<td></td>
<td></td>
</tr>
<tr>
<td>138</td>
<td></td>
<td></td>
</tr>
<tr>
<td>139</td>
<td></td>
<td></td>
</tr>
<tr>
<td>140</td>
<td></td>
<td></td>
</tr>
<tr>
<td>141</td>
<td></td>
<td></td>
</tr>
<tr>
<td>142</td>
<td></td>
<td></td>
</tr>
<tr>
<td>143</td>
<td></td>
<td></td>
</tr>
<tr>
<td>144</td>
<td></td>
<td></td>
</tr>
<tr>
<td>145</td>
<td></td>
<td></td>
</tr>
<tr>
<td>146</td>
<td></td>
<td></td>
</tr>
<tr>
<td>147</td>
<td></td>
<td></td>
</tr>
<tr>
<td>#</td>
<td>Cold</td>
<td>Temperature</td>
</tr>
<tr>
<td>---</td>
<td>------</td>
<td>-------------</td>
</tr>
<tr>
<td>99</td>
<td>Slightly cold</td>
<td>Sweet</td>
</tr>
<tr>
<td>100</td>
<td>Cold</td>
<td>Bitter, Toxic</td>
</tr>
<tr>
<td>101</td>
<td>Warm</td>
<td>Sweet</td>
</tr>
<tr>
<td>102</td>
<td>Balance</td>
<td>Sweet</td>
</tr>
<tr>
<td>103</td>
<td>Balance</td>
<td>Pungent, Bitter</td>
</tr>
<tr>
<td>104</td>
<td>Cold</td>
<td>Sour</td>
</tr>
<tr>
<td>105</td>
<td>Cold</td>
<td>Pungent, Bitter</td>
</tr>
<tr>
<td>106</td>
<td>Slightly Cold</td>
<td>Bitter, Slightly Toxic</td>
</tr>
<tr>
<td>107</td>
<td>Balance</td>
<td>Pungent, Bitter, Sweet</td>
</tr>
<tr>
<td>108</td>
<td>Balance</td>
<td>Sour, Puckery</td>
</tr>
<tr>
<td>109</td>
<td>Balance</td>
<td>Bitter, Sweet</td>
</tr>
<tr>
<td>110</td>
<td>Warm</td>
<td>Sour, Puckery</td>
</tr>
<tr>
<td>111</td>
<td>Warm</td>
<td>Sweet</td>
</tr>
<tr>
<td>112</td>
<td>Balanced</td>
<td>Pungent, Sweet</td>
</tr>
<tr>
<td>113</td>
<td>Cold</td>
<td>Sweet</td>
</tr>
<tr>
<td>114</td>
<td>Cold</td>
<td>Bitter</td>
</tr>
<tr>
<td>115</td>
<td>Balanced</td>
<td>Sweet, Pungent, Toxic</td>
</tr>
<tr>
<td>116</td>
<td>Warm</td>
<td>Sweet</td>
</tr>
<tr>
<td>117</td>
<td>Balance</td>
<td>Sour, Sweet, Puckery</td>
</tr>
<tr>
<td>118</td>
<td>Slightly Cold</td>
<td>Bitter, Sour, Puckery</td>
</tr>
<tr>
<td>119</td>
<td>Warm</td>
<td>Pungent</td>
</tr>
<tr>
<td>120</td>
<td>Slightly Cold</td>
<td>Bitter</td>
</tr>
<tr>
<td>121</td>
<td>Cold</td>
<td>Bitter, Very Toxic</td>
</tr>
<tr>
<td>122</td>
<td>Balanced</td>
<td>Bitter, Sour, Puckery</td>
</tr>
<tr>
<td>123</td>
<td>Slightly Cold</td>
<td>Sweet, Bland</td>
</tr>
<tr>
<td>124</td>
<td>Balance</td>
<td>Bitter, Puckery</td>
</tr>
<tr>
<td>125</td>
<td>Slightly Warm</td>
<td>Pungent, Bitter, Slightly Toxic</td>
</tr>
<tr>
<td>126</td>
<td>Warm</td>
<td>Bitter</td>
</tr>
<tr>
<td>127</td>
<td>Warm</td>
<td>Pungent, Slightly Bitter</td>
</tr>
<tr>
<td>128</td>
<td>Balanced</td>
<td>Sweet</td>
</tr>
<tr>
<td>129</td>
<td>Slightly Cold</td>
<td>Pungent, Bitter</td>
</tr>
<tr>
<td>130</td>
<td>Slightly Warm</td>
<td>Pungent</td>
</tr>
<tr>
<td>131</td>
<td>Warm</td>
<td>Sweet</td>
</tr>
<tr>
<td>132</td>
<td></td>
<td></td>
</tr>
<tr>
<td>133</td>
<td></td>
<td></td>
</tr>
<tr>
<td>134</td>
<td></td>
<td></td>
</tr>
<tr>
<td>135</td>
<td></td>
<td></td>
</tr>
<tr>
<td>136</td>
<td></td>
<td></td>
</tr>
<tr>
<td>137</td>
<td></td>
<td></td>
</tr>
<tr>
<td>138</td>
<td></td>
<td></td>
</tr>
<tr>
<td>139</td>
<td></td>
<td></td>
</tr>
<tr>
<td>140</td>
<td></td>
<td></td>
</tr>
<tr>
<td>141</td>
<td></td>
<td></td>
</tr>
<tr>
<td>142</td>
<td></td>
<td></td>
</tr>
<tr>
<td>143</td>
<td></td>
<td></td>
</tr>
<tr>
<td>144</td>
<td></td>
<td></td>
</tr>
<tr>
<td>145</td>
<td></td>
<td></td>
</tr>
<tr>
<td>146</td>
<td></td>
<td></td>
</tr>
<tr>
<td>147</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>A</td>
<td>B</td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td>148</td>
<td></td>
<td></td>
</tr>
<tr>
<td>149</td>
<td></td>
<td></td>
</tr>
<tr>
<td>150</td>
<td></td>
<td></td>
</tr>
<tr>
<td>151</td>
<td></td>
<td></td>
</tr>
<tr>
<td>152</td>
<td>* Botanical names used the method of Binomial Nomenclature</td>
<td></td>
</tr>
<tr>
<td>153</td>
<td>which is in Latin and included the genus and specie of the plant</td>
<td></td>
</tr>
<tr>
<td>154</td>
<td></td>
<td></td>
</tr>
<tr>
<td>155</td>
<td>* Common names of these plants were lifted from Bodkin’s book</td>
<td></td>
</tr>
<tr>
<td>156</td>
<td>Encyclopaedia Botanica and Bensky et.a. (trans.) book Chinese Herbal medicine</td>
<td></td>
</tr>
<tr>
<td>157</td>
<td></td>
<td></td>
</tr>
<tr>
<td>158</td>
<td>*Pinyin refers to the phonetic transcription of Chinese characters.</td>
<td></td>
</tr>
<tr>
<td>159</td>
<td>The Pinyin name used in this table was adopted from those used</td>
<td></td>
</tr>
<tr>
<td>160</td>
<td>in the PRC State Pharmacopoeia, TCM practitioners in Australia</td>
<td></td>
</tr>
<tr>
<td>161</td>
<td>are now starting to use the Pin yin system in writing their</td>
<td></td>
</tr>
<tr>
<td>162</td>
<td>herbal prescription for patients.</td>
<td></td>
</tr>
<tr>
<td>163</td>
<td></td>
<td></td>
</tr>
<tr>
<td>164</td>
<td>*Chinese names which appear in this table are standard nomenclature</td>
<td></td>
</tr>
<tr>
<td>165</td>
<td>used in the PRC State Pharmacopoeia as well as those which</td>
<td></td>
</tr>
<tr>
<td>167</td>
<td>75 Ultimo Rd. Haymarket Sydney 2000 Australia* (1990), a wholesaler</td>
<td></td>
</tr>
<tr>
<td>168</td>
<td>of Chinese materia medica in Sydney. When writing a Chinese herb prescription,</td>
<td></td>
</tr>
<tr>
<td>169</td>
<td>these are the standard Chinese name used.</td>
<td></td>
</tr>
<tr>
<td>170</td>
<td></td>
<td></td>
</tr>
<tr>
<td>171</td>
<td>*Yao refers to the part of the plant used for medicinal purposes</td>
<td></td>
</tr>
<tr>
<td>172</td>
<td>Information in this table about the Yao comes from the standard PRC State</td>
<td></td>
</tr>
<tr>
<td>174</td>
<td></td>
<td></td>
</tr>
<tr>
<td>175</td>
<td>* Provenance or origins of these Chinese medicinal plants growing</td>
<td></td>
</tr>
<tr>
<td>176</td>
<td>in Australia came from two sources:</td>
<td></td>
</tr>
<tr>
<td>177</td>
<td>Bodkin F. (1986). Encyclopedia Botanica</td>
<td></td>
</tr>
<tr>
<td>178</td>
<td>Angus and Robertson, NSW</td>
<td></td>
</tr>
<tr>
<td>179</td>
<td>Graham R. (1997) Botanica The Illustrated A-Z of Our 10,000 Garden Plants</td>
<td></td>
</tr>
<tr>
<td>180</td>
<td>Random House, Sydney</td>
<td></td>
</tr>
<tr>
<td>181</td>
<td>* RBGM Location refers to those plants growing in the Royal Botanical Garden</td>
<td></td>
</tr>
<tr>
<td>182</td>
<td>Melbourne. This author saw some of these plants while some</td>
<td></td>
</tr>
<tr>
<td>183</td>
<td>were located through the August 2000 Plant Census of the</td>
<td></td>
</tr>
<tr>
<td>184</td>
<td>botanical garden.</td>
<td></td>
</tr>
<tr>
<td>185</td>
<td>* Accession points to the year the plants were planted in the</td>
<td></td>
</tr>
<tr>
<td>186</td>
<td>Royal Botanical Garden of Melbourne</td>
<td></td>
</tr>
<tr>
<td>187</td>
<td></td>
<td></td>
</tr>
<tr>
<td>188</td>
<td>* Qi, Flavour and Meridian Entrance are the attributes of</td>
<td></td>
</tr>
<tr>
<td>189</td>
<td>the various Yao. Information mainly came from the State</td>
<td></td>
</tr>
<tr>
<td>190</td>
<td>Pharmacopoeia of the People’s Republic of China (1985)</td>
<td></td>
</tr>
<tr>
<td>191</td>
<td></td>
<td></td>
</tr>
<tr>
<td>192</td>
<td>* Active Principles refers to some of the biomedical</td>
<td></td>
</tr>
<tr>
<td>193</td>
<td>entities (alkaloids, glucosides) which have been chemically identified and present</td>
<td></td>
</tr>
<tr>
<td>194</td>
<td>in these plant yao. Data on the presence of these biomedical came from the</td>
<td></td>
</tr>
<tr>
<td>195</td>
<td>The Manual of Plant Yao Active Constituents</td>
<td></td>
</tr>
<tr>
<td>196</td>
<td>(1986) published by the Yao Information Station of the</td>
<td></td>
</tr>
</tbody>
</table>
Chapter 6: Recognising the Qi

An Encounter with the Qi in Melbourne, Australia

Late in the afternoon of 12 March 2002, I saw a number of patients. One of them, Simone, said that she had not smoked since the last treatment but that she was not sleeping well. I proceeded to administer treatment, placing the acupuncture needles on the acupoint Tai Chong 太冲, San Yin Jiao 三阴交, Neiguan 内关 (on right arm only, for there was bruising on the left wrist where I had placed the needle the previous time). I used a stainless steel prod to locate some acupoints on her left ear, and then wiped the ear with disinfectant swabs and placed two half inch long acupuncture needles on points Shen Men 神门 and Pizhi Xia 皮质下 (Subcortex).

After I had placed the needles, Simone complained that the smallest toe of her left foot still hurt. (I had placed a needle on the acupoint Zhi Yin 至阴 on 6 March to deal with her swollen and aching small toe.) I placed a half-inch acupuncture needle on the acupoint Zhi Yin. Plastic guide tubes were used to place all the needles on respective acupoints. As soon as the acupuncture needle touched the skin over the acupoint Zhi Yin, Simone said: ‘I felt a sensation on the middle of my spine!’ I asked Simone exactly where she felt the sensation; she said that she felt it at the left side from the middle of the spine, pointing to the equivalent spot on my back. The location of the sensation corresponds to the acupoint Shen Shu 脾俞, which is one of the many acupoints that dot the Urinary bladder acu-tract. I told Simone that the sensation she felt was the Qi. Using a plastic acupuncture model I indicated to her the flow of the Qi from the outer side of the cuticle of the small toe, up along the back of the leg, and along the
side of the spine to the outer canthus of the eye. Simone said: ‘That’s amazing!’

As a sequel to this encounter with the Qi, Simone came for her last acupuncture treatment on 14 March 2002. This time the ear points used were Shen Men and Nao Dian, and the procedure was similar. When Zhi Yin point was needled, Simone felt another sensation. Previously she had felt it in the lower back; this time she felt a sensation from the tip of the small left toe; it moved more slowly, travelling through the back of her leg and stopping just below the Shen Shu point on the lower back.

Qi, 'Chee,' ‘Energia’

I am currently giving acupuncture to a seventy year old lady of Italian background at the Austin Hospital. She is suffering from paralysis of the right side from a stroke a number of weeks ago. I placed acupuncture needles on some of the acupoints of the affected limb. While implanting the acupuncture needle on the acupoints Zu San Li and Tai Chong, I ‘felt’ and ‘saw’ quick wavy twitching movements of the muscles around these points, moving away from her body. The patient did not feel this, but one of her sons, who was watching the treatment, saw this movement, referring to it as nerve ‘reflexes’. When I connected a couple of acupuncture needle handles to a low voltage acupuncture stimulator and put them on acupoints along the right arm or leg, one could see a wavy, throbbing movement of the skin and muscle around the acupoints. One of her sons commented that it looked like a ‘pulse,’ and I told him it was the Qi. This he could not understand: I then wrote the character 氣, described its pronunciation, then asked him what ‘energy’ was in Italian. He replied: ‘Energia’. I told him that the pulsing movement around the acupoints, referred to as ‘Qi,’ was analogous to ‘energia’. ‘Ahh!’ he replied. Qi is something that can be sensed not only by the TCM practitioner and the patient. It is also a ‘stimulus’ 氣 (represented by the wavy movement
along the arm provoked by an acupuncture needle attached to an electric acupuncture stimulator) that can elicit a ‘response’ yīng from relatives not receiving acupuncture.

Using Materia Medica To Bring Down Maria’s Rising Asthmatic Qi

One winter day of June 1984, one of my old acupuncture patients, Louise, who is also a nurse working in one of the hospitals in the suburbs of Melbourne rang up and booked her thirteen year old daughter Maria for a TCM consultation and yào therapy. Louise told me that Maria was not keen to have acupuncture for her condition and instead would prefer to have Chinese herbs (materia medica).

On Jun 11, 1994, I saw Maria with her mother for consultation. Louise told me that Maria had been suffering from asthma for the past 18 months. When I inquired about what the symptoms of her asthma, Louise said that Maria has this “wheezing sound” from her chest after heavy physical exertions and when she has “less clothes on”. These symptoms occur during the cold weather conditions which triggers symptoms of shortness of breath. When her condition was diagnosed as asthma by a Western biomedical practitioner, Maria was put on western medications like Ventillin and Intal.

Upon inquiry, I found out that Maria had a good appetite but did not sleep well. It took a while for her to go to sleep and she often woke up several times at night. She also had her first menstruation this year. I took her pulse. I felt a ‘slippery’ type of pulse. Her tongue was more reddish in colour than usual. I also used the stethoscope to listen to her chest and back. I heard some rattles and rales as well as wheezing sound on both sides of her upper back.

Asthma is referred to in the Chinese language as xiao 哮 chuan 喘. Xiao 哮 means to generate
that wheezing sound in the chest; while chuan 喘 is the Chinese word for suffering from shortness of breath. Chuan 喘 is also the dis-ease label given to this illness traditionally in TCM. Maria’s symptoms and signs pointed to a clinical pattern of the External Cold Pathogenic Factor 寒邪 which affects the physiological function of the lungs to spread the Qi all over the body, leading to a build up of phlegm in the organ system. Hence Maria’s manifest symptoms of wheezing and shortness of breath. Her slippery pulse points to accumulated phlegm while her red tongue indicated some initial build up of inner heat Qi in her lungs. Such is the li or the embedded principle underlying Maria’s clinical pattern

Confronted with Maria’s clinical pattern, I adopted the therapeutic method fa of bringing down the ascending Qi 降氣 (which accounts for the symptoms of wheezing and shortness of breath) and transforming the phlegm 化痰, thereby calming the asthma attack 平喘. I used the formula fang ‘Perilla Fruit Combination that Brings Down the Qi 蔓子降氣湯. This is a Song Dynasty materia medica formula which was first featured in the Tai Ping Sacred State Sponsored Formulary which Benefits the People 太平惠民和劑局方 compiled by the Imperial Medical official Wang Huai Yin in the year 992 AD. The materia medica yao ingredients of this formula are the following

1. Perilla fruit 紫蘇子 3 g.
2. Pinella 半夏 4 g.
3. Citrus 陳皮 2.5 g.
4. Magnolia 厚朴 2.5 g.
5. Peucedanum 前胡 2.5 g.
6. Cinnamon 肉桂 2.5 g.
Chapter 6 Recognising Qi

7. Tang-Kuei 川當歸 2.5 g.
8. Jujube 大棗 2.5 g.
9. Ginger 生薑 1.5 g.
10. Licorice 甘草 1 g.

The English names of the ingredients in this formula came from the late Peter Townsend’s Practitioner’s Manual for Commonly Used Chinese Herb Formulas (1992). Peter, who passed away several years ago was a TCM practitioner and concurrent director of the company Chinaherb. The Chinese names of the formula came from Bo Yan Kui’s Chinese formulary book, Yi fang fahui [Elaboration of TCM Formulae 医方发辉]. Liaoning kexue jishu chubanshe, Liaoning, 1984)

Perilla fruit is the main ingredient of this formula which can bring down the ascending Qi transforms phlegm and calms the shortness of breath and wheezing. Pinella with a pungent flavour can dry out the dampness in the lungs while bringing down the ascending Qi and preventing nausea and vomiting. Magnolia also can bring down the rebelling Qi. Peucedanum has the Qi inclination of being bitter, pungent and slightly cold and can transform the phlegm. Cinnamon can warm the kidneys so as to be able to grasp the ascending Qi downwards thereby alleviating shortness of breath and wheezing. Tang-kuei is used to nourish the blood which can indirectly make the Qi descend. In Chinese medicine Qi leads the flow of blood, while blood is the mother of Qi. ¹

I prescribed Maria the formula Perilla Fruit Combination that Brings Down the Qi which came in granulated powder and packed in individual plastic bottles of 100 grams. This preparation was manufactured by the Sun Ten company in Taiwan and distributed here in Australia to TCM practitioners by the Chinaherb company. Maria was advised to take 8
grams (a plastic spoon was provided which can scoop one gram of the preparation) each time and three time a day.

On the 18th of June 1994, I saw the patient again. This time I employed the Four Evaluation Techniques sping to verify the efficacy of the materia medica formula vis-a-vis her signs and symptoms. I listened to her back using the stethoscope and found no rails and rattles. Looking at her demeanour, I saw that she was not having any difficulty in breathing. Her tongue was red and her pulse was not slippery. So the patient was told to continue to take the medication and also to do early morning abdominal breathing exercises (facing the northern aspect to maximise the benefits from the Yang Qi) to boost her lung and kidney Qi.

A few weeks later I saw Louise and she told me that Maria had not had any asthma attacks.

De Qi and the NH&MRC in Australia

Outside China, and specifically in the Western world, research into acupuncture virtually ignores the phenomenon of de Qi. The National Health and Medical Research Council (NHMRC) in Australia said in their 1986 study of acupuncture that the Qi is ‘simply an alternative or romantic interpretation of the fact that insertion and manipulation of the acupuncture needle must be relatively painful so that it can constitute a second noxious stimulus as required for DNIC to operate’. 2

The ‘neurophysiological mechanism for acupuncture analgesia’ not only rejected the acupuncture needle as a core element in the acupuncture assemblage, but also rejected other vital constituents of this assemblage such as the acupuncture point, the acu-tracts or meridians, the TCM body and the acupuncture chart. More importantly, the ‘mechanism’
proposed by the NHMRC failed to account for that element in the acupuncture assemblage which brings all the elements of the practice together and gives it ‘life’ - the notion of Qi, described above as ‘romantic’.

With this ‘mechanism’ that supposedly underpins acupuncture, the NHMRC tried to ‘match’ what is in the patient’s body with what is on the WLM map, and tried to ‘match’ the presence /absence of body ‘stimuli’ with the DNIC map. What resulted was the mechanism of a neurophysiological body and not that of an acupuncture body.

The ‘clots’ of TCM practice have been eclipsed by the assemblage of WLM. This ancient healing art has been reduced to such biological entities as DNIC, ‘morphine analgesia,’ ‘transmitter substances’ and ‘descending nociceptive modulatory systems’. No clear and practical account is given of the generation of acupuncture as a ‘second stimulus’. Was it generated by a ‘machine,’ a human being, or was it just a ‘given’? The acupuncture practitioner and his patient, the Qi, the acupuncture channels, and the crucial acupuncture needle, have all been displaced.

In place of the acupuncture needle the authors of the NHMRC report prescribe the use of the TENS (transcutaneous nerve stimulation) machine. The report states that the stronger the stimulus, the greater the analgesic effect and the stimulus need not be to classical acupuncture points and need not be given by a needle. Electrical stimulation of of the surface of the skin near an acupuncture point or over a tender area promotes a comparable analgesia.

In the TCM clinical encounter, the patient is the ‘root’ ben and the TCM practitioner is the
Chapter 6  Recognising Qi

'leaves and branches' mo, while the yao, Qi, acu-tracts, blood xue, Five inner and Six hollow organs are the material embodiments of life sheng.

The de Qi, zhen gan (needle sensation), stimulation/response (gan ying), Qi transformations and the acu-tracts are all the 'live' practical exemplifications of the clinical encounter between the TCM body, TCM practitioner and the body of yao. These are the expressions, the symphony, the shared culture, the jazz music which come out 'live' from this encounter.

Practical Mechanism of Paul's Case

Returning to the exemplary case of patient 'Paul' in Chapter 3, which involved the use of acupuncture and moxibustion in dealing with the clinical pattern of severe diarrhoea, how do we account for the practical mechanism upon which acupuncture 'worked' in this specific case? As far as I can remember, Paul did not have a 'typical' de Qi 'response' ying to my acupuncture treatment 'stimulation' gan. Instead, his 'response' was very atypical. He did not have any 'threadlike' projected sensation during or after the treatment. Neither did he experience any needling stimulation sensation like an ache, distension, numbness or radiating feeling. After the acupuncture/moxibustion treatment, Paul 'responded' to the acupuncture 'stimulation' by feeling very good. In addition, the diarrhoea stopped on the same day as the acupuncture treatment. More importantly, he 'responded' by sleeping continuously the whole afternoon of the acupuncture treatment until the following day. This response demonstrated that the transporting function yun hua of the large intestine system as well as the transforming function Qi hua of the spleen organ system had been restored through the 'stimulation' gan of the acupoints GV20, PC5 and LI4 (which dispels dampness), needling and moxa of acupoints St36 and the application of moxibustion on acupoints St25. The
treatment method proposed, \textit{lun zhi}, proved to be appropriate to the clinical pattern diagnosed i.e. \textit{bian zheng}.

Lu Shou Kang and others, when discussing the various indicators of the phenomenon of the arrival of the Qi in acupuncture in their book \textit{One Hundred Techniques of Acupuncture} (1988), pointed out that not everyone may have the experience of \textit{suan, ma, zhang or tong}. However, after acupuncture treatment, the symptoms of the illness may have a turn for the better or disappear. They refer to this phenomenon as 'recessive arrival of the Qi' \textit{yin xing Qi zhi}. Hence they concluded that one of the main indicators of \textit{de Qi} is the alleviation of the signs and symptoms of the disease or clinical pattern.  

From the foregoing, we can see that a 'live' practical mechanism of acupuncture involves the stimulation/response between the corporate body of TCM practitioner, the body of the acupuncture needle and the TCM body of the patient.

A 'Live' Practical Mechanism of Acupuncture

A practical description of how acupuncture works comes from the coming together of the three agential figures which assume life in a TCM assemblage: a pedagogically well-trained TCM practitioner who administers the acupuncture treatment; the uneasy but aware TCM body of the patient with its body of Qi, acupuncture channels and acupuncture points; and the 'body of \textit{yao}' or acupuncture remedial tools - needles, body charts, figurines, moxa sticks, low-voltage electrical acupuncture stimulators, cups, and \textit{yao} materia medica applied externally over acupuncture points and acu-tracts.
Chapter 6 Recognising Qi

Acupuncture and Qi Transformations 氣化

The acupoints, the xue 穴 stomata, nodes, acupuncture points shu xue 脈穴, are the sites on the patient’s body where the acupuncture needle and the Qi meet. In the Chinese language, acupoints or acupuncture points are referred to as xue 穴. The Chinese Medical Dictionary defines xue as the ‘sites of convergence which connect’ jiao hui xian jie chu the acupuncture channels jing luo, muscles ji, bones gu as well as visceral and hollow organs zang fu (Xie Guan 1988, Vol. 1 p. 948). In ancient times, acupuncture points were referred to as Qi xue or the site where the Qi converges and connects. The Chinese medical dictionary says that there are about 400 such sites in the body which acupuncturists zhen jiu jia ‘rely upon to treat a hundred illnesses’ pin ci yi zhi bai bing. The acupoints are like the stomata along the culms and stems of the bamboo tree, through which the sun’s energy and the reserve minerals from the roots of the plant converge and connect to generate nutrition, keeping the plant alive, healthy and free from ‘illnesses’.

Through the hand techniques of needling by the acupuncturist (the corporate body of TCM practitioner) on the acupoint which he has selected on the TCM body, the needle (the body of yao or remedial tool) and the Qi meet, and the ‘action of the needle’ xing zhen ensues which brings about the ‘action of the Qi’ xing Qi and a train of TCM body Qi transformations 氣化. As the Qi moves through the action of the tip of the acupuncture needle placed in the acupoint, the spirit shen, which roams in and out of the acupoint ‘on the patient’s body, ‘responds’ ying 應 to the ‘stimulus’ gan 感 and the
patient perceives the movement of the Qi or the ‘arrival of the Qi’ or de Qi 得氣.

One of the earliest accounts of this phenomenon of ‘arrival of the Qi’ in the course of stimulus/response or gan ying between the acupuncture needle, acupuncturist and the patient was made during the Han Dynasty. Hua Tuo (AD 140-208), who lived in the time of that dynasty, and who historians refer to as the pioneer of ancient Chinese-style surgery, was also an excellent acupuncture practitioner. The *History of the Three Kingdoms (San Guo Zhi)* gives a brief account of Hua Tuo’s life, including a passage showing his skills in acupuncture.

When acupuncture is required, he only used one or two acupuncture sites. When placing the acupuncture needle, he would tell the patient: ‘When acupuncture is given, there will be a resonating response at a certain site. When the needle has reached the spot and there is a stimulus/response *gan ying* 感應, tell me’. The patient says: ‘*Yi dao* 已到 (It has come!).’ The acupuncture needle is quickly removed and the illness correspondingly is cured.

According to Wang Xue Tai, one of China’s contemporary TCM scholar/practitioners, the term ‘de Qi’ first appeared in the Neijing. More specifically it was first used in the volume on ‘Plain Questions’ in Chapter 27: ‘The Parting and Coming Together of the Zhen and the Xie’ *Li He Zhen Xie Lun*. The quote from this chapter is as follows.

吸則內針，無令氣忤，靜以久留，無令邪布，吸則轉針，

以 得氣 為故：候呼引針，呼應乃去，大氣皆去， 故明日寫

When getting the needle in, inhale. The Qi will then start moving.
Do not let it move in the wrong direction. Calm the heart, leave the needles for a while to bring out the Xie 銖. Do not allow the Xie to spread out to all directions. Inhale and then turn the needle to bring about the arrival of the Qi which will replace the old Qi. As one exhales start pulling out the needle. As one reaches the end of the exhalation take out the needle. This will bring out all the accumulated Qi under the tip of the needle. This is the method of bringing out the Xie. Hence it is mandated that this be ‘portrayed’ or depicted xie 銖. 10

The Neijing, written during the period of the Warring States (475-221 BC), gives a very vivid description of the phenomena of De Qi. Below we find The Yellow Emperor Huang Di and his minister Qi Bo discussing this phenomenon. Responding to the Yellow Emperor’s query about the ‘fundamentals of classical acupuncture,’ the Minister Qi Bo replied:

To begin with the first, there are a total of nine needles and the principles of their method. The principles of using these fine needles are easy to express but difficult to master. Ordinary skills of acupuncture maintain the physical body; high skills maintain the spirit, use spirit to reveal the spirit and the guest at the door. Without careful observation of the disease, how can there be an understanding of its origin? Ordinary techniques guard the gates; high techniques control the moving power. The moving power is inseparable from its space. The moving power, at the centre of this space, is clear, quiet and subtle. Its coming cannot be hurried; its going cannot be chased. 11

The sections or junctions of the body consists of 365 meetings or acupuncture points. With a knowledge of its importance, each word cannot have a result. Without
knowledge of its importance, we thoroughly scatter the flow. Those which are called sections refer to the place where the spirit qi and its flowing movement, out and in, is unhindered by the skin, flesh, muscle or bones.

Look at the patient's colour. Observe the eyes. Know how the qi disperses and returns. Each has its own form. Listen to the patient's movement and stillness. Know his balance and imbalance. The right hand is used to hold and push the needle while the left hand assists and controls. When the qi is reached, then withdraw. 12

The key to acupuncture is first of all to harness the spirit 11 One cannot depend strictly upon the appearance of the patient. One must emphasise the profound reading of the channels, blood and qi in order to properly administer treatment... In therapy, one's every movement must be in concert; acupuncture should be smooth and even; the mind should be calm, the heart at ease. Observe the travelling of the qi with acupuncture to determine the best time to remove the needles. The arrival of the qi, although not visible to the eye, is as if a flock of birds has converged. When the qi is leaving, it is as if all the birds in a flock have scattered simultaneously. You cannot find a trace of them. Thus, when acupuncturing, if the qi has not arrived one should retain the needle as if one has drawn a bow 14. As soon as the qi has arrived in the proper proportion, quickly remove the needle as if the arrow is being released (by the ji, the 'trigger') 15 16

In acupuncture, when the qi is reached, do not ask the measure, but needle until the qi is reached. Once reached do not repeat. In acupuncture each needle has its function. Each has its distinct shape. Each has that which it governs.
These make the methods of acupuncture. Only when the qi is reached, will acupuncture be effective. This effect it is said, is as if the winds blow away the clouds and clear the azure sky. These all are the Dao of acupuncture. 17

In needling, one must needle the Qi acupoint and not the flesh and the nodes. When the Qi acupoints are needled properly one feels as if the acupuncture needle is swimming through a laneway... 18

Dou Han Qing, a Yuan Dynasty TCM practitioner scholar, illustrated in rich poetic language in his book Ode to the Standard of Mystery (Biao You Fu 1311) the dynamics of the Qi vis-à-vis the acupuncture needle. In this literary form Dou pictures the Qi ‘response’ ying, from the point of view of the body of the TCM practitioner or the acupuncturist, as being similar to ‘getting a bite on a fish line’. It also describes the ‘response’ when the Qi has not come or when it is coming fast or slowly. Below is a poetic extract on the arrival of the Qi, featured in the book Annotations of Acupuncture Poetic Prose (1987) Zhen Jiu Ge Fu Jiao Shi by Shi tu Sheng 19

先详多少之宜.  Xian xiang duo shao zhi yi,  
次察应至之气.  Ci cha ying zhi zhi chi.  
轻滑滞而未来.  qing hua man er wei lal,  
沉涩滞而至.  chen se jin er yi zhi.  
即至也.  ji zhi ye,  
量寒热而留疾.  liang han re er liu ji;  
未至者  wei zhi zhe,  
据虚实而候气.  ju xu shi er hou qi.  
气之至也.  qi zhi zhi ye,
Chapter 6 Recognising Qi

如鱼吞钩饵之浮沉

气未至也。

如网处幽堂之深邃。

气速至而故速。

气迟而不治。

观夫九针之法。

毫针最微。

七星可应。

众穴主持。

First we detail what is appropriate,

Then investigate the response ying of the Qi

Light, slippery and slow means it has not arrived

Sinking, hard-going and tight means it has arrived.

When it has arrived,

Calculate hot and cold and leave (the needles) to deal with the illness.

When the Qi has not arrived,

Depending upon a deficient or excess condition, observe the Qi.

When the Qi has arrived,

It is similar to getting a bite on a fish line.

When the Qi has not arrived,

It is like being in the depths of an idle, dim and vacant room.

When the Qi arrives quickly, the effects will be quick.

When the Qi is tardy, it will not be harnessed effectively.

Observing the methods of the Nine Needles,

The Fine-hair needle is the most profound.

It resonates with the the seven Stars.

The multitude of acupoints ‘host’ it.
Another Yuan dynasty book, entitled *Uncommon Ways of Benefiting Life* (1308) *Ji Sheng Ba Cui*, by Du Si Jing, describes the 'response' from the acupuncture patients as a 'sensation (suan) rising slowly from the hand like a thread,' while the *gan* 'stimulus' from the acupuncturist involves asking the subject to 'cough' as the needle is inserted and manipulated in specific ways. Part of the patient's 'response' is also to breathe in three times as the needling is performed and to take a deep breath as the needle is withdrawn. I am quoting here from an English version of a passage from the book translated by Lu Guei Zhen and Joseph Needham: *Celestial Lancet* (pp. 192-193):

Ask the subject to cough, then insert the needle at Ho-ku (IG4) on both sides to a depth of 5 fen (tenths of an inch, and the inch in Yuan times was 3.07 cm. as against our 2.54) and turn it counter-clockwise while the patient inhales three times, then clockwise again for three deep breathes. Repeat the counter-clockwise turning only this time for five inhalations, and the contrary one again in the same way. Then the patient will feel the sensation (suan) rising slowly from the hands up to the shoulders like a thread. Finally ask the patient to take one more deep breath, and withdraw the needle.

In his book *Compendium of Acupuncture and Moxibustion* (1601), Yang Ji Zhou also describes the phenomenon of the arrival of the Qi.

If the Qi does not rise, there is a feel of lightness and sluggishness on the needle and there is no pain. It is similar to needling a piece of bean curd. After the needle is inserted, one should wait. When the Spirit Qi has arrived, there is a feel of tightness and hard-going on the needle. One should according to the methodology execute the needling in accordance with the deficient or excess (clinical pattern).
The Most Comprehensive Description of the ‘De Qi

The most comprehensive descriptive rendition of the arrival of the Qi was made by a Chinese woman biomedical practitioner and former Communist guerilla fighter, Doctor Zhu Lian, who learned her acupuncture skills from veteran TCM practitioners in Northwest China in the middle forties. Doctor Zhu Lian wrote the book New Acupuncture (Xin Zhen Jiu Xue) in 1950 on the basis of lecture materials she used while running acupuncture classes for Chinese biomedical personnel in the guerilla zones in Yenan, Mao’s guerilla base centre during the Japanese occupation of north China. After 1949 Doctor Zhu Lian became the deputy head of the TCM Research Academy in Beijing. She died in 1978. Her book is one of the early attempts at ‘integrating’ TCM with biomedicine’. Doctor Zhu ‘translates’ the arrival of the Qi as zhen gan: ‘acupuncture sensation’ or ‘needling stimulation’.

Acupuncture Sensation  Zhen Gan  刺感

Based upon clinical experience, in an initial summary, acupuncture sensations or de Qi can be be be analysed into 13 different shades and types.

1. Suan gan  酸 Sensation ‘Itchy’

This sensation is not a suan tong  酸痛 (ache) sensation, but rather a pleasant one.

The patient receiving acupuncture treatment feels that, at the deeper section of the region of the acu-point, there is an ‘itchy’ sensation. This sensation can remain local or can diffuse to the surrounding area. At this point, the patient may seem to be lost in thought but in reality s/he is feeling this sensation. When the doctor asks the patient what s/he is feeling, s/he will say suan suan de hen shu fu .

2. Ma gan 麻 Sensation ‘Tingling’

This a ma su su (tingling) sensation, like the sensation one feels on the leg after sitting in one position over a period of time. However, it is not as heavy
as that nor is it like a feeling of numbness _ma mu bu ren_. This type of sensation can occur locally where the acupuncture needle is inserted, or it may diffuse and radiate to surrounding areas or towards a much wider area like a tingling sensation on the whole of the leg or the arm, when acu-points along the arm or the leg are needled.

3. Tong gan Sensation ‘Pain’

Most of this type of sensation occurs locally. Some occurs on a wider sphere. Its occurrence is mainly due to the needling of very sensitive areas of the body, like the acupoints on the upper and middle lips and fingers, tip of the toes etc. Or it can be due to inappropriate manual needling technique of the practitioner. However, sometimes it is necessary to generate the sensation of pain to deal with certain conditions. For example, in cases of fainting _yun jue_, shock _xiu ke_, aphasia _shi yu_ (disorder of the CNS leading to loss of speech), sometimes it is necessary to use vigorous, rapid and intense acupuncture manual techniques on acu-points along the area of the lips, like _ren zhong, dui dian and cheng jiang_, acu-points along the fingers such as _shi xuan, he gu_ and _lao gong_, as well as acu-points along the foot like _shi jing, kun lun_ and _yong quan_. Under these conditions, when the patient can say the word ‘pain’ _tong zi_, then it is good news. Generally, it is good to avoid causing pain sensations when doing acupuncture.

However, when one does not consider the difference between different disease conditions, man, women, and young and old patients, and emphasises rapid needling, saying that ‘the deeper the better’ and the ‘more pain the better,’ this is not appropriate. Using just this method of acupuncture manual technique can reduce patients to tears and sweating (especially those who have a weak constitution). One patient states: ‘At that time I was so much in pain that I do not really know whether I was in tears or sweating profusely. Since then I avoid having acupuncture.’ One doctor regretfully told us that, one day in the countryside, he gave acupuncture to an old man for stomach pains. The old man was to come back the following day. However, after three days he had not returned. The doctor then went to the old man’s residence to ask about him. The old man said that he has already recovered from the condition and did not need acupuncture anymore. Seeing that the doctor was very sincere in his work, the old man expressed his inner thoughts. He told the doctor that on the day he received acupuncture it was very
painful, and he therefore decided not to see him again.

4. *Zhang gan* ‘胀 Sensation ‘Distension’

This type of sensation normally does not occur when superficial needling is applied. It only occurs during deep needling. The patient will feel as if the fine filiform acupuncture needle is as thick as one of his fingers, and makes the surrounding muscles feel swollen and turgid. This sensation may occur locally on the acupoints or the surrounding area. A slight feeling of distension does not feel uncomfortable. However, unlike the sensation of *suan* and *ma*, which is quite comfortable, *chong* (heavy) and *zhang* are not comfortable. At this point, the practitioner has to leave the acupuncture needles in place and not move it, then when the feeling of distension disappears he must begin twirling the acupuncture needle. Slight distension sensations in most cases occur after the *suan* sensation, or both sensations occur simultaneously. Hence the patient will excitedly say: 'Suan suan del Zhang zhang de.' This translates as: 'It is so suan and so swollen!'.

5. *Yang gan* Sensation ‘Itch’

This is not a common sensation felt by the majority of people receiving acupuncture. Usually, when the acupuncture is inserted slowly on the surface of the skin, a sensation of *yang* or ‘itch’ is felt. The sensation is not uncomfortable and sometimes it can be pleasant.

6. *Liang gan* Sensation ‘Cool’

This sensation is not like the generation of a cold sensation; rather it is like applying essential balm (*qing liang yao*) on the skin, and one feels ‘cool and dry’ from a gentle breeze touching the skin. When one feels the liang sensation one will say *sou sou de* 嗡嗡的. This type of sensation may be generated through a superficial needling of the skin. In some cases, it can occur on a localised area where the acupuncture needle is being inserted. Sometimes the sensation can occur on a wider area, including the
whole breadth of an extremity. When a patient has high fever and is receiving acupuncture treatment, the fever comes down slowly and gradually after the needle is inserted, and one may feel as feel one’s whole body has been covered with essential balm.

7. Re gan Sensation ‘Hot’
This sensation is not equivalent to having a fever, but instead is a comfortable re hu hu sensation, which is a ‘warm’ feeling as in ‘one’s hand feels warm’ or being ‘warm-hearted’. This sensation may occur on superficial needling, or in the locale where needling is being administered; or it may spread to the surrounding area and even through the whole extremity. When one feels cold and is having acupuncture, the result will be a a comfortable re hu hu sensation.

8. Zhua Jin gan Sensation ‘Sensation of being firmly grasped’
This sensation is similar to that of a muscle segment of the hand being gripped, which is not an unpleasant sensation. The time it occurs is not long. It occurs in deep needling. It can be felt in the location being needled, or in areas not being needled; it may occur in both areas. When the acu-points on the abdomen are being needled, this sensation may be felt just under the tip of the acupuncture needle. When needling other acu-points, this sensation may occur at a distal area from the acu-point being needled. For example, when needling Zu san li St 36 one may feel a sensation of being firmly grasped over the top part of the foot. Or when needling Jian jing on the shoulder, one may feel a a muscular gripping sensation on the corresponding wrist.

9. Ya zhong gan Sensation ‘Heavy Pressure’
This sensation is neither a sensation of zhong nor zhang. It is similar to feeling a heavy pressure coming down from a heavy object. This can be generated from both a superficial and deep acupuncture needling. This sensation often occurs close to the area where the needle is being placed. It can also occur at a distal point and does not last long.
10. Shu Song gan Sensation ‘Easy and Relaxed’
This is a very relaxing and light sensation. After the needle is inserted, one cannot feel where the needle is placed. One just feels shu shu fu fuqing qing song song (very easy and very relaxed) either one leg or one arm or the whole body.

11. Chu Dian Yang gan Sensation ‘Electric’
This sensation is similar to that of touching a live electric wire. This can occur in deep needling, mainly along the four extremities and more so on the lower ones. It projects to a linear phenomenon. Strong electric sensation from acupuncture stimulus can make the leg or arm jump. Of course this sensation is not comfortable. However, there is also a very slight electric sensation which is not uncomfortable. The sensation is similar to that generated from the slow plucking of the strings of a Moon Guitar [four stringed instrument with a full moon-shaped box], i.e. slowly plucking the strings of the guitar one after the other. Some acupuncture patients even long for this type of sensation. The only problem is that some doctors could not grasp this technique easily. Once the needle twirls very strongly, then a strong electric sensation can be felt by the patient.

12. Xian Tiao Qian Che yang gan Sensation ‘Linear Pulling’
This type of sensation is of the comfortable sort. It can be generated both from superficial and deep needling (more from deep needling). Insert the needle slowly on the superficial part of the skin. Generally, this sensation does not occur in the locale where the needle is inserted. Distal from the point of needle insertion the sensation unfolds, similar to the pulling of a very fine thread. It has no fixed pattern. Sometimes it is like the shape of a thread, sometimes that of a net. Sometimes it is here or at times it can be over there. For example, when needling S36, this sensation may occur around the knee joint or along the top of the foot; or it may come out of the calf of the leg or pelvic region or even at the abdominal area. The ‘linear pulling’ sensation which occurs when deep needling is performed is dissimilar to those felt when applying superficial needling. The first one follows a definite pattern which occurs where nerve fibers are distributed. When needling
S36, for example, the thready sensation emerges from the point where the needle is placed and runs down towards the outer ankle and sometimes onto the small toe. When the needle gets deeper, the thready sensation starts from the tip of the needle, going down towards the top of the foot and then towards the big toe. Sometimes this sensation goes up to the outer side of the thigh. Sometimes, when we needle S36, the needle is inserted in three layers or levels. Every time the needle goes into one layer those sensations occur.

13. Xian Tiao Xu Xu Bo Dong Sensation ‘Linear Wave’
This is another pleasant sensation generated from acupuncture. It occurs in deep needling. This sensation occurs where the needle is or in surrounding areas. As the acupuncture needle is twirled, a linear threadlike sensation is generated, which radiates, comes and goes, rising up and down in an undulatory wavelike motion. Within this linear sensation, the wavy sensation can come once in a while and move downwards, but not continuously. There can be more than one of these linear sensations. For example, when needling Huan tiao acu-point, the sensation can first occur where the needle is or around the rectum area. The sensation can then occur deeply, radiates after that down the inner side of the thigh and outer side of the leg to the foot.

The De Qi, The Acupuncture Stimulation/Response and the Acu-tracts

Yang Yong Xuan 杨永璇 (1901-1981), a veteran Chinese TCM practitioner and renowned acupuncturists from Shanghai, and the former deputy director of the Acupuncture Education Department of the Shanghai TCM College, when writing about his long years of acupuncture practice, equated the notion of the de Qi with the concept of the gan ying 感应 stimulation/response. And through the interaction between the body of the TCM practitioner, the body of the acupuncture needles, and the TCM body, he pictures and brings to life the
motion of the Qi along the twelve regular acu-tracts of the TCM body.

Acupuncture therapy generates a certain stimulation/response *gan ying*
i.e. *de Qi* 得气. Generally speaking, every TCM doctor can bring this about.

However, in clinical acupuncture, when the ‘Qi is made to arrive at the site of the illness’ *Qi zhi bing suo*, the therapeutic efficacy generally can be very good. Teacher Yang thinks that the extent of the projection of the stimulus/response from acupuncture is determined by the nature *xing* and capacity *neng* of the acupuncture point stimulated, and the [nature and capacity of the] acupuncture channel threadlike projection *jing luo xian*.

Yin acu-tracts have Yin acu-tract threadlike projections, while
Yang acu-tracks have Yang acu-tract threadlike projections. However, this is not absolute. When acupuncture is being used, and the direction of the tip of the needle [i.e. going towards or away from the body] is changed, then the direction of the threadlike projections can also change.

The three Yin acu-tracts along the arm ‘walk’ *zou* from the chest towards the hands. The (stimulation *gan*) of acupoints *Nei Guan* 内关 and *Shao Hai* 少海 can ‘dispel heat and calm the spirit’ *qingre anshen*, and the needling stimulation *zhen gan* moves downwards. However, when we have to ‘expand the chest’ and put the Qi in order *kuan xiong li qi*, we can apply the manual needling technique of ‘promoting the flow of the Qi’ *cui Qi shou fa*.

When this is done, the patient can feel the *suan* sensation projecting towards the elbow and the results can be very efficacious.

The [stimulation of] the acupoints *Chí ze* 尺泽 and *Lie que* 列缺 can regulate the functions of the lungs and thus benefit the Qi *tiaoz fei li Qi*. From both acupoints the needle stimulus can flow and spread downwards. However, when using the acupoint *Lie Que* to treat illness affecting the neck and shoulders the needle stimulation can spread upwards.
The stimulus/response of the Three Hand Yang acu-tracts ‘walks’ from the fingers of hands towards the head. The stimulation of the acupoint Hegu 合谷 can move upwards and disperse. If correct manual technique is applied over this acupoint, the sensation can spread from this point towards the acupoints Jianyu 肩隅 on the shoulder and even up to the neck and head. When the acupoint Qu Chi 曲池 ‘walks’ zou and is not focused upon, the needling stimulation can move upwards. When using this acupoint to treat cases of loss of strength on the arm, the acupuncture needling sensation can move downwards.

The (stimulation/response) of Three Yang acu-tracts of the Foot ‘walks’ from the head towards the foot. Hence in most cases, the stimulation/response flows from the top of the body descending downwards. The acupoint Zu San li 足三里 can ‘harmonise the Stomach and stop pain while tonifying the Qi he wei zhitong jian bu Qi. The needling stimulation can descend to the second toe.

However, in treating cases of appendicitis Lan Wei Yan, the needling stimulation can be made to move upwards to the groin. The acupoint Wei Zhong 委中 can ‘drain heat to the benefit the dampness’ qingre lishi, and stop pain zhitong.

The stimulation-response gan ying can spread from the back of the knee, moving downwards to the heel. The acupoint Yang Ling Quan 阳陵泉 can ‘relieve spasm and wind zhen jing xi feng and stop pain. The acupuncture stimulation moves and descends along the side of the leg.

From the foot up towards abdomen and chest. Stimulating the acupoints Xing Jian 行间 and Tai Xi 太溪, and the acupuncture stimulation can project from the foot upwards. When treating cases of pain on the sole of the foot, with the acupoint Tai Xi being needled, the needling stimulation can move downwards. Special mention is to be made of the acupoint San Yin Jiao 三阴交. When needling this acupoint, the needling stimulation can project towards the groin area.
Chapter 6: Recognising Qi

Needham’s Encounter With the Qi

In 1972, Joseph Needham, a British scientist and a prolific scholar of Chinese culture and civilisation went to China and personally investigated the phenomena of *de Qi* by allowing his body to be the subject of stimulus/response from the acupuncture needle at the hands of a Chinese acupuncturist named Li Da Li in the city of Chengdu in Southwest China. Being an irreductionist scientist and scholar who is also proficient and knowledgeable in the language of ‘Chinese science,’ Needham gave a very ‘objective/subjective’ and ‘holistic’ account of his clinical experience/encounter with acupuncture. I am reproducing here a segment of the book *Celestial Lancets*, which documents this ‘technoscientific experiment’ which Needham initiated and participated in.

Another approach to the nature of the acu-points is the study of the subjective sensations reported by those on whom acupuncture is performed. From time immemorial it has been customary in Chinese medicine to take note of what the patient says that he or she experiences, and according to universal consent the acupuncture procedure will do no good if none of the sensations makes its appearance. A positive result is termed *te chhi* (obtaining the *chhi*) or *chen kan* (needle stimulation). The typical responses are four in number: suan 蘇, *ma 麻, chang 楓* and *chung 重*. The last three of these are easily explained.

*Ma* is essentially a feeling of numbness, *chang* is one of distension, extension or fullness, rather as if the the part concerned were oedematous or puffy. *Chang* is simply a feeling of heaviness. *Suan* implying ‘sour’ is the most difficult to describe, but it can be thought of as an ache, something like a feeling of muscular fatigue or overstrain such as experienced after slightly excessive exercise in walking, climbing, or playing athletic games. Presumably, a few thousand muscle cells might be destroyed or injured as in the common experience of having a ‘strained a muscle’. One has to distinguish also between
a quick primary response, which may be registered immediately, and a later secondary or prolonged response. Thus suan is likely to come on after ma has been felt, while chung is likely to ensue after a ma or chang.

We are grateful to Dr. Li Ta-Li of Chengtu for carrying out some acupuncture experimentally on one of us (J.N.) in 1972. The Tsu-san-Li point (V 36) was used, one that has been widely employed in acupuncture analgesia. I felt no pain or other sensation on insertion, but then a curious feeling of numbness came on, as if running downward along the bones as far as the upper surface of the foot from the acu-point on the front of the leg below the knee. Manual manipulation of the needle reinforced the sensation from time to time. On changing the needle insertion so that it pointed upwards (hsieh sec immediately below) the feeling went up above the knee and was again reinforced by twiddling. When the needle was removed and I stood up, the leg felt as if slightly overstrained by exercise, and one did not want to put one's weight on it. There was still a definite ache (suan) an hour afterwards and it spread to the gastrocnemius muscles behind. On the following morning, the ache persisted, and could be intensified by flexing and extending the foot, but by midday it was gone. Thus ma had been followed by suan. (footnote c).

(Lu GZ. & Needham J., Celestial Lancet, 1980, pp. 192-3.)

The Shen Effect and the Placebo Effect

'The key to acupuncture is the harnessing of the spirit.'

Su Wen, 'The Preservation of Health,' Chapter 25

'As for acupuncture methodology, it must be rooted in the spirit.'

Ling Shu, 'Of Nine Needles and Twelve Source Points,' Chapter 1

The ‘spirit’ or shen 神 is housed in the heart-root of the living bamboo tree. In Taoist meditational practices, the shen or spirit is seen as having two manifestations: shi shen 识神 (‘cognitive spirit’ or ‘ordinary consciousness’) and yuan shen 元神 (‘primordial spirit or
‘spiritual consciousness’). *Shi shen* refers to human perception, senses, thoughts, feelings etc. which are acquired after birth, while *yuan shen* is seen as existing before one’s birth or before heaven *xian tian*, being effaced postnatally by cognitive spirit and thereby becoming invisible. It is believed that, through meditational practice like inner alchemical meditation *lian nei dan*, Qigong or training of the Qi, this primordial spirit may be gradually recovered and manifested, leading to the compounding of what the American Taoist scholar Chang Chung-Yuan refers to as the ‘inner elixir’ of immortality. 26

According to the Taoist scholar Pei Zhen, the function of *shi shen* is to respond to things and events *ying shi*, while *yuan shen* ‘establishes the roots’ *jian ben*. He argues, furthermore, that *shi shen* is the ‘contemplating spirit’ *si lu shen* i.e. his/her daily thinking process, while *yuan shen* is a state of *xu jing xin shen* ‘empty and still heart-spirit,’ which is devoid of thought and contemplation *wusi wulu*. He says that *shi shen* is a ‘dynamic state,’ while *yuan shen* is a ‘state of stillness,’ 27 and that in Taoist alchemical meditation the process of ‘compounding the spirit to return to nothingness or void’ (*lian shen fu xu* or *lian shen huan xu*) is similar to ‘compounding’ *xiu lian* the *shi shen* or cognitive spirit to enhance its gradual return to the primordial spirit. This is a return to the *ultimatelessness* or *wu ji*.

The practitioner who administers acupuncture treatment to a patient harnesses his/her own spirit by keeping it still and calm, while harnessing the cognitive spirit of the patient by patiently explaining to the patient the nature and process of acupuncture treatment. By doing this, the practitioner lightens the psychological burden of the patient, alleviates his/her fear of the needle and dispels their worries about their illness. In this way, the patient becomes tranquil, returning to his/her roots or ‘breeding and growth or primordial spirit,’ and quietly accepts the acupuncture treatment. 28 The *Neijing* explains in more concrete terms how the
harnessing of the patient's spirit is accomplished, saying that 'the practitioner, after harnessing his/her spirit, must look up to the patient's eyes and harness the latter's spirit. In this way the Qi can move easily'. Zhang Jing Yue argues that 'the eyes are the opening of the spirit. If one wants to harness the patient's spirit, one must look up to the patient's eyes, and harness his/her essence-spirit jing shen 精神, preventing it from scattering and dispersing. In this way, the Qi can be managed by the spirit and the acu-tracts can move easily'.

In many ways, we can say that the harnessing of the spirit may also be referred to as 'the shen effect' in the clinical encounter between the TCM patient. The yao and the TCM practitioner in acupuncture healing practice can be translated into the notion of interactive 'pleasing' (between the patient, the practitioner, and the acupuncture needle), known as the 'placebo effect' in the clinical encounter between biomedical, complementary and alternative health practitioners and their patients in Western civilisation. Doctor Wolfe Segal, an honorary Fellow in Biochemistry at the University of Western Australia, gives a very good illustration of the placebo effect in his paper 'Naturopathy, Homeopathy and Herbalism,' published in 1987.

The placebo effect is a very important healing factor in both alternative and orthodox medicine. The word 'placebo' is derived from the Latin 'I shall please' and refers to therapy that is accepted with confidence and conviction that it is appropriate and will be effective. Obviously, the placebo effect will be reinforced if both patient and practitioner share this confidence in the therapy - whether it be the medication, vitamin supplementation, manipulation, massage or other therapies of either alternative or orthodox practitioners.
This 'shen-effect' or 'placebo effect,' which transpires during the clinical encounter between the practitioner and the patient, is best illustrated in an ancient Chinese fable written during the third or fourth century BC.

**Doctor and Patient**

Dr. Ju was a famous physician of the state of Qin. He had cut a tumour for Emperor Xuanwang and healed haemorrhoids for Emperor Huiwang.

A certain Mr Zhang who was afflicted with a sore back asked the physician to treat it.

'I will not regard it as my back any longer. Do whatever you think fit with it!' he said.

Given a free hand, the physician cured his patient in no time.

There is no doubt that Doctor Ju was well versed in his craft, but the fact that Zheng put himself entirely in the doctor's hand also accounts for his prompt recovery. 31
Endnotes

1 Bo Yan Kui's, *Yi fang fa hui* [Elaboration of TCM Formulae], Liaoning kexue jishu chubanshe, Liaoning, 1984, p. 494


4 The Spiritual Axis volume of the Neijing states that "the acupuncture points are where the spirit Qi roams in and out". J.O'Connor J. et al. (trans.) (1981), op.cit., p. 401


6 The characters *gan ying* in this segment did not appear in the original

7 Song Shu Gong (Ed.), *Yi Gu Wen Zhu Yi Ti Jie* [Classical Chinese Medical Literature Annotations and Explanatory Notes], Zhongyi guji chubanshe, Beijing, 1986, p. 21. This is an English translation from the original text from the *History of the Three Kingdoms*, and refers to the annotations and translation into contemporary text *jin yi* by the current annotators and editors.

8 Wang Xue Tai, *Zhong Guo Zhen Jiu Da Quan* [Complete Works of Chinese Acupuncture and Moxibustion, Vol.1], Henan kexue jishu chubanshe, Henan, 1988, p. 514

9 *Zhen* 真 means 'real', 'correct', and can also mean the 'truth'. However, in this passage, *zhen* refers to *zheng zheng* 正 which means 'upright', 'balanced', 'straight' etc. The word *zheng* in TCM is used together with another word *jue* which means the opposite of *zheng* i.e. 'bad', 'evil', 'unbalanced' etc. When the word *Qi* is added to both terms, *zheng Qi* refers to that 'energy' or life in the living body which wards off all factors which can cause illnesses or imbalance, while *jue Qi* refers to all the negative energy or 'life' which causes disease, illness, imbalance to the living body.

10 This is an English translation of the above passage, with annotations by Gao Shi Zong, a TCM scholar of the Qing Dynasty. Gao S.Z. (Dynasty), *Huang Di Neijing Su Wen Zhi Jie* [Annotations of The Yellow Emperor's Classic of Medicine (Plain Questions)], Kexue jishu wenxian chubanshe, Beijing, 1980 edition, p. 190.

11 This is an English translation of segments of the second volume of the *Neijing*: *Ling Shu* 鈞衛. This volume sometimes is also referred to as the *Zhen Jing* 針經, which translates into English as 'Acupuncture Classics'. I am using the English translation of the book by Wu Jing-Nuan (trans.), *Ling Shu or The Spiritual Pivot*, Washington, The Taoist Centre, 1993, p. 1.

12 Ibid. p. 4

13 This is my English translation of the original section of Chapter 25 of the *Su Wen* volume of the *Neijing* - 凡刺之真，必先治神, (Nanjing TCM College Medical Classic Teaching/Research Group (1981), op.cit., p. 212). This segment was translated as follows by Maoshing Ni: 'The key to acupuncture is first of all to concentrate and focus'. (Maoshing Ni, The *Yellow Emperor's Classic of Medicine: A New Translation of the Neijing Suwen With Commentary*, Boston, Shambala, 1995, p. 102). Maoshing Ni must have translated into English the modern Mandarin version of the classical Chinese version of this segment. The above quote is 'translated' into modern Mandarin as 凡用针的关键。先集中思想 (Nanjing TCM College Medical Classic Teaching/Research Group (1981), op.cit., p. 213); this can be translated into English as 'The key to acupuncture is first of all to concentrate and focus'. The 'Spirit' or Shen 神 has been reduced to a 'mental faculty'

14 This should be translated as 'crossbow'. The original Chinese word is *mu* 箭, which is the the script for 'crossbow'.

15 The original Chinese word used was *fa ji*, which means 'to pull the trigger'.

16 Maoshing Ni (1995), op.cit., p. 102)
Chapter 6 Recognising Qi

17 Wu Jin-Nuan (trans. (1993), op.cit., p. 3

18 Hebei Medical Academy (1984), op.cit., p. 117-118

The book *Jing Luo Shi Jiang* (1981) [Ten Lectures on the Acu-tracts], published by the Commercial Press in Hongkong with an anonymous author, explained this passage from the *Ling Shu* by saying that when the acupoint is properly needled, one feels as if there is a channel running underneath the point of the acupuncture needle. This ‘channel’ *rong dao* can be understood as the phenomenon of propagated sensation when the acupoint is needled. This sensation can also be generated by the application of moxibustion, traditional Chinese massage and Qi training exercises. (Ten Lectures on the Acu-tract Compiling Group, *Jing Luo Shi Jiang* [Ten Lectures on the Acu-tracts], Shangwun yinshu guan, Hongkong, p. 4.)


20 In dealing with ‘hot’ clinical patterns, use superficial needling and then quickly take out the needle to get the Qi to escape *xue zhi*. In dealing with ‘cold’ clinical patterns, use deep needling, leaving the needle for a while to ‘warm’ it (referring to a ‘deficient’ *xu* condition or illness).

21 The word used here is *zui wei* 最微. *Wei* can also mean ‘minute’.

22 Among the nine ancient needles, the fair-hair needle resonates with the seven stars. Humans have seven openings (two eyes, two nostrils, two ears and one mouth) which are located high above the head. Heaven also has seven stars located high above the sky. The *Neijing* contends that the the number ‘nine’ or *jiu* 九, in the Chinese language is the ‘odd number’ for both heaven and earth, which begins with number one *yi* and ends with number nine *jiu*.


24 I am using A.C. Graham’s translation of *li* as ‘put in order’ (as a verb). Angus Charles Graham (1958), op.cit., p. 3

25 Yang Yi Fang et al. (1984), *Yang Yong Xuan Zhongyi Zhenjiu Jing yan* [TCM and Acupuncture Experiential Selected Works Of of Yang Yong Xuan], Shanghai kexue jishu chubanshe, Shanghai, p. 16. (This is a translation of most of the segment under the topic ‘Putting the stress upon the conduction of acupuncture stimulation, Qi is made to arrive at the site of the illness’.)

26 Chang Chung-yuan (1963), op.cit. p. 165

27 Pei Zhen, *Zhongguo daqia da zhili* [The great wisdom of Taoist practitioners in China], Beijing tiyu xuexuanshi zhi, Beijing, 1993, pp. 71-73


A recent patient saw me recently because his TCM practitioner in Wodonga passed away. I met this practitioner many years back when I was involved in meetings of the National TCM Liaison Committee. He comes from the Chinese city of Tianjin. According to this former patient of his the Chinese practitioner always tells him when he comes to see him “not to worry!” so he referred to him as “Mr. Not to worry”.


However, ‘placebo’ is also a Latin word used as a traditional name “for the vespers of the office for the dead” as in the phrase *placebo Domino* which means “please be the lord” (ibid. p.1119), or in the complete Latin phrase *Placebo Domino in region vivorum* which in English is “I shall please the Lord in the land of the living.” (Hoad T.F. (Ed.). (1996). *Oxford Concise Dictionary of English Etymology*. Oxford. Oxford University Press. p. 355


BIBLIOGRAPHY  (English Language Materials)

AAP, ‘Crackdown on herbal cures,’ The Australian, 4 January 1994

Abbots, J., ‘Plural Medicine - Orthodox and heterodox medicine in Western and colonial countries during the 19th and 20th centuries,’ Wellcome History, No. 9, 1999


Ackermnecht, Erwin, A Short History of Medicine, Baltimore, John Hopkins University Press, 1982


Allinson, Robert E., Understanding the Chinese Mind, Hongkong, Oxford University Press, 1989

Archer, John, Bad Medicine: Is the Healthcare System letting you down? How Safe is Modern Medicine, Sydney, Simon & Schuster, 1995

Arnold, Ken, Bendigo: A History of Bottles and Stonewares 1852-1930, Ballarat, Northern Offset Printing, 1975

Austen, G., ‘Our Cursed Weeds May provide a Harvest of Cures,’ The Age, 10 February 1988

Ms Smyth, <EMAIL ADDRESS> ‘Background and Information: Re Southern Chinese Collection for October 2000,’ private email message to Rey Tiquia

*Ballarat Evening Post*, 28/10/1874, p.


Becker, Robert O. *The Body Electric: Electromagnetism and the Foundation of Life*, New York, Quill, 1985


Bell, M., ‘A perky approach to herbal medicine,’ *Herald Sun*, 5 April 1990


Bensoussan, Alan et al., *Towards a Safer Choice: The Practice of Traditional Chinese Medicine in Australia*, University of Western Sydney, 1996


Bentley, Bruce, “Cupping as a Therapeutic Technology” (M.A., La Trobe University, 1996)


Blair, John, ‘The Chinese Specifics For Diphtheria,’ in *Australian Medical Journal*, 7 October 1874


Botten, C., July 28, ‘Cry babies get the treatment,’ *The Age*, 28 July 1986


Cant, Sarah & Sharma, Ursula (eds.), *Complementary and Alternative Medicines: Knowledge in*


Chan, Pedro, Wonders of Chinese Acupuncture, Alhambra (California), Borden Publishing Company, 1973


Chao, Y’uan-ling, “Medicine and Society in Late Imperial China: A Study of Physicians in Suzhou” (PhD diss., University of California, 1995).

Chen, Ronald, The History and Methods of Physical Diagnosis in Classical Chinese Medicine, New York, Vantage Press, 1969

Cheng Man Ch’ing, Cheng Tzu’s Thirteen Treatises on T’ai Chi Ch’uan, trans. Benjamin Peng, Jeng Lo and Martin Inn, Berkeley, North Atlantic Books, 1985


Chinese Cochrane Center,
<http://www.chinacochrane.org/cochrane_english/cochrane_center.htm>

Chinese Medicine Registration Act 2000 (Vic) s.3


Clavey, Steven, Fluid Physiology and Pathology in Traditional Chinese Medicine, Melbourne, Churchill Livingstone, 1995


Collier K., ‘Tips of the Tongue,’ Herald Sun, 6 April 1996

Committee for the publication of the Selected Works of Mao Tse-Tung, Selected Works of Mao Tse-Tung, Vol. 1, Peking, Foreign Languages Press, 1967

Copleston, Frederick, Religion and the One: Philosophies East and West, London, Continuum, 1982

Coulter, Harris L., The Controlled Clinical Trial , Washington DC, Project Cure, 1991

Cronin, Kathryn, Colonial Casualties: Chinese In Early Victoria, Singapore, Melbourne University Press, 1982


Crouzet, Y. et al., Bamboos, Italy, Evergreen, 1998

Crozier R.C., Traditional Medicine in Modern China, Cambridge, Harvard University Press, 1968


DeFrancis, John (ed.), *ABC Chinese-English Dictionary (Alphabetically Based Computerized)*, Honolulu, University of Hawaii Press, 1996


Elman, Benjamin A. & Woodside Alexander, *Education and Society in Late Imperial China 1600-1900*, Berkeley, University of California Press, 1994


Feng Yu-lan, *Chuang-Tzu*, Beijing Foreign Languages Press, 1989


Fitzgerald J. <t.lee@latrobe.edu.au>, 'Proposed Chinese Heritage of Federation Volume' (Chinese Heritage of Federation Volume Style Sheet), private email message to Rey Tiquia, 2 June 2002


Giffney, B., ‘Minister Praises Chinese Medicine,’ *Medical Observer*, 12 April 1996,

Gillison, Joan, *Colonial Doctor and His Town*, Melbourne, Cypress Books, 1974


Gray, D., ‘Herbalists Raided After Steroid Found in Pills,’ The Sunday Age, 14 August 1994

Grubin, D. (director) & A. Markowitz, D. Grubin (producers), The Mystery of the Ch'i, (video recording): David Grubin Productions Inc. & Public Affairs Television Inc., USA, 1993


Hagger, J.T., Colonial Medicine, Adelaide, Rigby, 1979

Hancock, P. et al., The Body, Culture and Society: An Introduction, Buckingham, Open University Press, 2000


Hansen, K., ‘Traditional remedies control tip,’ Herald Sun, 7 October 1996

Hanson, Marta, Epidemics, Epidemiology, and Cosmological Criticism at the end of the Ming Dynasty, East Asian Studies, <http://www.admin.ias.edu/eas/hanson%20paper.htm>, 30 January 2001

Haraway, Donna J., Modest_Witness@Second_Millennium.Femaleman_Meets_OncoMouse Feminism and Technoscientific, New York, Routledge, 1997


Hedges A.C., Bottles and Bottle Collecting, Cromwell House U.K., Shire Publication Ltd., 1975


Hillier, S.M. and Jewell, J.A., Health Care and Traditional Medicine in China, 1800-1982,
London, Routledge, 1983


Jacobs, Struan, *Theories of Science*, Geelong, Deakin University, 1991


Kerr, Cathy, <chimed@ccat.sas.upenn.edu>, ‘Re: acupuncture and problem of placebo,’ private email to Rey Tiquia, 7 February 2000


Larriera, A., ‘Herbal Remedy Gave Man a Taste of Death,’ *Sydney Morning Herald*, 1 January 1994

Larriera, A., ‘Brew under review,’ *Sydney Morning Herald*, 1 January 1994


Latour, Bruno, We Have Never Been Modern, Porter, Catherine (trans.), New York, Harvester Wheatsheaf, 1991


Lei, Sean, 'From Changshan to a New Anti-Malarial Drug: Re-networking Chinese Drugs and Excluding Traditional Doctors', Social Studies of Science, 29. 3 (June 1999), 323-58


Lin, Patrick, A Speedy Elementary Course: 500 Basic Chinese Characters, Sinolingua Press, 1996


‘Local Topics,’ *Australian Medical Journal*, February 1872


Macgregor, Paul (ed.), *Histories of the Chinese in Australasia and the South Pacific*, Melbourne,
Museum of Chinese Australian History, 1995


Mandarin Characters of Endangered Species Used in Herbal Medicines  (undated Australian Federal Government internal manual)


Maoshing Ni (trans.), The Yellow Emperor's Classic of Medicine: A New Translation of the Neijing Suwen with Commentary, Boston, Shambala, 1995

Marks, Harry M., The Progress of Experiment Science and Therapeutic Reform in the United States (1900-1990), Cambridge, Cambridge University Press, 1997

Martin, B., 'Flu attack: Could this be the year of the major outbreak,' The Bulletin With Newsweek, 25 June 1996, pp. 16-18

May, Cathie, Topsawyers: The Chinese in Cairns 1870-1920, Cairns, James Cook University, 1996


McDonald, I., 'The last Wave Medical Practice Must Respond To Cultural Change,' in Arena Magazine, October-November issue, 1998


Medical Society of Victoria, 'Special Meeting to express an opinion upon the recent application of a Chinaman to be placed upon the Medical Register of Victoria,' Australian Medical Journal, 1875 (June 16th)


Mol, Annemarie & Berg, Marc, 'Principle and Practices of Medicine: The Co-existence of

Mole, Peter, Acupuncture Energy Balancing For Body, Mind and Spirit, Brisbane, Element, 1997


Nanjing College of Traditional Chinese Medicine, Essentials of Traditional Chinese Paediatrics, Beijing, Foreign Languages Press, 1990


Niida, Noboru, A Study of Chinese Legal History: Criminal Law (An English Resume) (in Japanese), Tokyo, Tokyo University Printing, Tokyo, 1959

Ning, Ana Margarida, "Regulating Health Professions and Chinese Medicine in Ontario" (M.A., York University, 1993).


O’Connor, John et al. (trans.), Acupuncture: A Comprehensive Text Shanghai College of Traditional Chinese Medicine, Chicago, Eastland, 1981


Pharmaceutical Chemist Bill 1925 (Victoria)


Ragg, Mark, ‘Take Two Herbs and Call in the Morning,’ *The Bulletin With Newsweek*, 23 August 1886


*Royal Botanic Gardens Melbourne Master Plan*, South Yarra, 1997

Royal Children Hospital International (RCHI), *Seminar On Traditional Chinese Medicine*, (video recording), Melbourne, Australia


Shou Yi Bai (ed.), *An Outline History of China*, Beijing, Foreign Languages Press, 1982

Sivin, Nathan, “Why Didn’t Chinese Have Bodies?,” *Chinese Studies Association of Australasia (CSAA) Newsletter* (The University of New South Wales), November 18, 1999

Skewes, Matthew, “The Path to Legitimation of Acupuncture in Australia” (M.A., University of Melbourne, 1999).

Smith, D., ‘Healing hands,’ *Sydney Morning Herald*, 22 February 1994


TeLaRS,’Citation Style for Political Science Students’,University of Melbourne, Melbourne, 15

Tiquia, Rey, Melbourne, 2004


Tiquia, Rey, “Connecting Traditional Chinese Medicine and Western Scientific Medicine” (MSc., University of Melbourne, 1996).


Tiquia Rey, ‘Chinese Herbal Medicine Human Clinical Trials (bibliographic notes ‘) (100 clinical trials on Chinese herbal medicine hand searched, compiled and translated from five Chinese language TCM journals covering a period of 10 years from 1986-1996), Melbourne, 1995-96


SUBMISSIONS TO THE CHINESE MEDICINE REGISTRATION BOARD (CMRB) OF VICTORIA, AUSTRALIA


Tiquia, Rey, ”Regulating Chinese Materia Medica in Australia-The Yin and Yang of Yao, Du, Poisons and Drugs.” (41 pages). September 15, 2004

Conference Papers

Tiquia, Rey, ‘Daoist Natural Bodies’ (paper presented at Daoism and the Contemporary World: An International Conference on Daoist Studies, Boston University, 6 June 2003)

Tiquia, Rey, ‘Making a “Translating Knowledge Space” between Traditional Chinese Medicine and Western Laboratory-based Medicine’ (presented at the traditional Chinese medicine seminar organized by the Royal Children’s Hospital International, Ella Latham Lecture Theatre, Royal Children’s Hospital, Melbourne, 20 July 2000)

Tiquia, Rey, “Bottling” an Australian Medical Tradition: Traditional Chinese Medicine during the Australian Federation’ (presented at the Chinese Heritage of Australian Federation Conference, Museum of Chinese Australian History, organized by La Trobe University, the Chinese Museum and the Shanghai East China Normal University, Melbourne, 2 July 2000)

Tiquia, Rey, ‘Doing Difference Together In a New Globalized TCM World’ (paper presented at the Eu Yan Sang Public Forum on TCM commemorating the 120th Anniversary of the company, Orchard Hotel, Singapore, 14 November 1999)

Tiquia, Rey, ‘Regulation of Practitioners - The Victorian Model for Traditional Chinese Medicine’ (presented at the Workshop on Choosing Your Medicines: Making Informed Decisions about Complementary and Non-Prescription Therapies, Cambridge Park Inn). The workshop was organized by the Consumer Health Forum, Sydney, 13 November 1998

Tiquia, Rey, ‘Evaluating Traditional Chinese Medicine Practice in Australia: The
Diphtheria Controversy c. 1870' (presented at the Conference on Plural Medicine - Orthodox and Heterodox Medicine in Western and Colonial Countries during the 19th and 20th Centuries, University of Southampton). The conference was organized by the Society for the Social History of Medicine (SSHM), Southampton, 15-16 September 1998.


Tiquia, Rey, ‘Traditional Chinese Medicine As Local Practice’ (presented in Mandarin before the TCM Basic Theory and Clinical Practice Academic Exchange Conference In Commemoration of the 40th Anniversary of the Foundation of the Beijing TCM College, Beijing TCM University, Beijing, 8 August 1996)


Tiquia, Rey, ‘The Practice of Traditional Chinese Medicine and Science as Local Knowledge’ (presented at the Annual Research Conference, Faculty of Human Development, Victoria University of Technology, Melbourne, 19 November 1993).


Tiquia, Rey, ‘Bile Used Effectively on Burns,’ The Australian, 3 December 1990

Tiquia, Rey, ‘Research Confirms Ancient Remedy,’ The Australian, 25 June 1990

Tiquia, Rey, ‘Studies Reveal Point of Acupuncture,’ The Australian, 17 September 1990

Tiquia, Rey, ‘Manchurian Ginseng on Verge of Extinction,’ The Age, 24 April 1989

Tiquia, Rey, ‘Missing the Point on Acupuncture,’ The Age, 19 December 1988

Tiquia, Rey, ‘Sounds From Within,’ The Age, 29 August 1988

Tiquia, Rey, ‘Chinese Way to Restore the Body’s Harmony,’ *The Age*, 22 December 1987

Tiquia, Rey, ‘Sounds Travel Along Sheep Meridian,’ *The Age*, 22 June 1987

Tiquia, Rey, ‘A Case for Acupuncture over General Anaesthesia in Caesarean Section,’ *The Age*, 22 April 1987

Tiquia, Rey, ‘A New Role For Motherly Leeches,’ *The Age*, 3 November 1986

Tiquia, Rey, ‘Qi - The Energy of Life,’ *Australian Well-Being*, 21 October 1886, pp. 102-106

Tiquia, Rey, ‘Food Therapy,’ *Australian Well-Being*, December 1985, pp. 32-35

Tiquia, Rey, ‘Living In Harmony,’ *Australian Well-Being*, January 1985, pp. 31-35

Tiquia, Rey, ‘Chinese Medicinal Herbs,’ *Australian Well-Being*, June 1985, pp. 31-34

Tiquia, Rey, ‘Acupuncture and the Auto-Immune system,’ *Australian Well-Being*, May 1984, pp. 73-77

**LETTERS TO EDITOR**

Tiquia, Rey, ‘Revival’s good for the blood,’ *MX*, 16 March 2001

Tiquia, Rey, ‘Time For Tranquility Over Chinese Medicine,’ *The Age*, 10 April 2000

Tiquia, Rey, ‘Letter on Qigong,’ ‘Your Turn,’ *Good Weekend*, 28 August 1999

Tiquia, Rey, ‘Uncomplementary,’ *The Age*, 23 May 1999

Tiquia, Rey, ‘Make Medicare Truly Universal,’ *The Age*, 13 January 1998


Tiquia, Rey, ‘Oh, my poor aching head!’ *The Age*, 11 February 1998

Tiquia, Rey, ‘Two faces of science,’ *The Australian*, 10 November 1997
Tiquia, Rey, ‘As Confucius says, “Right on Mr Curly!”’, *The Age*, 13 August 1996

Tiquia, Rey, ‘Plenty of evidence on children’s acupuncture,’ *The Australian*, 16 December 1993

Tiquia, Rey, ‘Bear caged for a week in bile surgery,’ *The Age*, 27 July 1993

Tiquia, Rey, ‘Backing traditional Chinese medicine,’ *The Age*, 25 March 1993

Tiquia, Rey, ‘Harness wealth of health systems,’ *The Australian*, 4 April 1993

Tiquia, Rey, ‘Toxins in a Chinese context,’ *The Australian*, 4 February 1993

Tiquia, Rey, ‘Food toxins can be harnessed,’ *The Australian*, 23 January 1993

Tiquia, Rey, ‘Chinese medicine should be registered and rebateable,’ *The Age*, 21 May 1992

Tiquia, Rey, ‘Traditional acupuncturists needled,’ *The Australian*, 4 December 1991

Tiquia, Rey, ‘Shabby picture of Chinese medicine,’ *The Age*, 22 November 1991

Tiquia, Rey, ‘Acupuncture ban only affected Chinese nobility,’ *Sunday Age*, 6 October 1991

Tiquia, Rey, ‘Medicine: ban the dogmatists,’ *The Age*, 15 September 1991


Tiquia, Rey, ‘Cane toad chemicals have medicinal value,’ *The Age*, 20 March 1990

Tiquia, Rey, ‘Report fuels the myth,’ *The Sun*, 16 November 1988

Tiquia, Rey, ‘MSG is a problem only when overcooked,’ *The Age*, 27 June 1987

Tiquia, Rey, ‘Royal Jelly is not placebo,’ *The Age*, 2 September 1987

Tiquia, Rey, ‘Fiery time ahead for the tiger,’ *The Herald*, 3 March 1986

Tiquia, Rey, ‘No quick path to acupuncture skill,’ *The Herald*, 13 February 1986

Tiquia, Rey, ‘Pill-pushing on the way out,’ *The Herald*, 28 January 1986

Tiquia, Rey, ‘Acupuncture works,’ *The Age*, 16 December 1985
Tiquia, Rey, ‘Coin therapy for pain, not exorcism,’ *The Sun*, 7 November 1985

Tiquia, Rey, ‘Beat the flu,’ *The Age*, 24 July 1985

**E-mail Discussion List Postings**

Tiquia R., ‘Treatment for urinary tract infections,’ <h-sci-medtech@h-net.msu.edu>, 14 July 2002

Tiquia, R., ‘Acupressure,’ <chineseherbacademy@yahoogroups.com>, 1 August 2002

Tiquia, R., ‘Help request with infantile seizure,’ <chineseherbacademy@yahoogroups.com>, 8 August 2002

Tiquia, R., ‘Secrets of Chinese Medicine - in the “doing”’, <chineseherbacademy@yahoogroups.com>, 11 August 2002

Tiquia, R., ‘Wu Shi Er Bing Fang,’ <ishm@creighton.edu>, 14 August 2002

Tiquia, R., ‘Integrating Western with Chinese medicine diagnosis,’ <chineseherbacademy@yahoogroups.com>, 21 August 2002

Tiquia, R., ‘Clinical menopause questions - clinical evaluation of menopause,’ <chineseherbacademy@yahoogroups.com>, 18 August 2002

Tiquia R., ‘Meridians and electricity - separate but related existence,’ <chineseherbacademy@yahoogroups.com>, 19 August 2002

Tiquia, R., ‘Integrating Western with Chinese medicine diagnosis,’ <chineseherbacademy@yahoogroups.com>, 21 August 2002

Tiquia, R., ‘Dissection, anatomy and the body,’ <chineseherbacademy@yahoogroups.com>, 22 August 2002

Tiquia, R., ‘Kuhn 1 & Kuhn 2,’ <chineseherbacademy@yahoogroups.com>, 24 August 2002

Tiquia, R., ‘8-principles, Hep C & clinical patterns,’ <chineseherbacademy.yahoogroups.com>, 27 August 2002

Tiquia, R., ‘Ch 1 Masters Thesis,’ <chineseherbacademy@yahoogroups.com>, 27 August 2002
Tiquia, R., ‘Lifestyle vaccination against meningococcal infection,’
<chineseherbacademy@yahoogroups.com>, 30 August 2002

Tiquia, R., ‘Sparrow Pecking pulse,’ <chineseherbacademy@yahoogroups.com>, 30 August 2002

Tiquia, R., ‘Contra-indicated points during pregnancy,’
<chineseherbacademy@yahoogroups.com>, 31 August 2002

Tiquia, R., ‘Key terms,’ <chineseherbacademy@yahoogroups.com>, 2 September 2002

Tiquia, R., ‘Key terms,’ <chineseherbacademy@yahoogroups.com>, 2 September 2002

Tiquia, R., ‘Key terms,’ <chineseherbacademy@yahoogroups.com>, 2 September 2002

Tiquia, R., ‘Contra-indicated points during pregnancy,’
<chineseherbacademy@yahoogroups.com>, 3 September 2002

Tiquia, R., ‘TCM Logic, Values, Ethics,’ <chineseherbacademy@yahoogroups.com>, 4 September 2002

Tiquia, R., ‘Medical Ecumenicalism,’ <chineseherbacademy@yahoogroups.com>, 5 September 2002

Tiquia, R., ‘Their doctor asks...synergy,’ <chineseherbacademy.yahoogroups.com>, 11 September 2002

Tiquia, R., ‘Doctor Ing Hay,’ <chineseherbacademy@yahoogroups.com>, 3 October 2002

Tiquia, R., ‘Energy works,’ <chineseherbacademy@yahoogroups.com>, 9 March 2000

Tiquia, R., ‘Energy work,’ <chineseherbacademy@yahoogroups.com>, 10 March 2003

Tiquia, R., ‘SARS origins & prevention,’ <chineseherbacademy@yahoogroups.com>, 2 April 2003

Tiquia, R., ‘Theory-laboratory-to-clinical translation,’
<chineseherbacademy@yahoogroups.com>, 3 April 2003

Tiquia, R., ‘Qi,’ <chineseherbacademy@yahoogroups.com>, 9 April 2003
Tiquia, R., ‘SARS treatment with Chinese Medicine,’
<chineseherbacademy@yahoogroups.com>, 10 April 2003

Tiquia, R., FWD: ‘Now Zheng Qi/Xie Qi Zheng - Xie Qi,’
<chineseherbacademy@yahoogroups.com>, 11 April 2003

Tiquia, R., ‘SARS: First patients treated with Chinese Medicine,’
<chineseherbacademy@yahoogroups.com>, 12 April 2003

Tiquia, R., ‘SARS: CM herbal treatments,’ <chineseherbacademy@yahoogroups.com>,
<chimed@ccat.sas.upenn.edu>, 16 April 2003

Tiquia, R., ‘Support Zheng & dispel Xie,’ <chineseherbacademy@yahoogroups.com>, 17 April 2003

Tiquia, R., ‘Hongkong CM doctors,’ <chineseherbacademy@yahoogroups.com>,
<chimed@ccat.sas.upenn.edu>, 23 April 2003

Tiquia, R., ‘SARS: Wen Bing prevention /treatment,’
<chineseherbacademy@yahoogroups.com>, 25 April 2003

Tiquia, R., ‘SARS : Acupuncture,’ <chineseherbacademy@yahoogroups.com>,
<chimed@ccat.sas.upenn.edu>, 11 April 2003

Tiquia, R., ‘Xing Zheng Ping,’ <chineseherbacademy@yahoogroups.com>, 28 April 2003

Tiquia, R., ‘SARS patient centred approach,’ <chineseherbacademy@yahoogroups.com>,
<chimed@ccat.sas.upenn.edu>, 28 April 2003

Tiquia, R., ‘Volker Sheid - bian zheng lun zhi,’ <chineseherbacademy@yahoogroups.com>, 30 April 2003

Tiquia, R., ‘Volker Sheid / bian zheng lun zhi,’ <chineseherbacademy@yahoogroups.com>, 2 May 2003

Tiquia, R., ‘Plurality,’ <chineseherbacademy@yahoogroups.com>, 4 May 2003

Tiquia, R., ‘Harmonizing the paradigms,’ <chineseherbacademy@yahoogroups.com>, 7 May 2003

Tiquia, R., ‘SARS: Warm Pestilential Qi, atypical pneumonia,’
Tiquia, R., ‘SARS: Summing up,’ <chineseherbacademy@yahoo groups.com>,
<chimed@ccat.sas.upenn.edu>, 8 May 2003

Tiquia, R., ‘SARS In harmony but different,’ <chineseherbacademy@yahoo groups.com>,
<chimed@ccat.sas.upenn.edu>, 11 May 2003

Tiquia, R., ‘SARS: Summing up,’ <chineseherbacademy@yahoo groups.com>, 16 May 2003

Tiquia, R., ‘SARS: Bian Zheng Lun Zhi,’ <chineseherbacademy@yahoo groups.com>,
<chimed@ccat.sas.upenn.edu>, <traditional_chinese_medicine@yahoo groups.com>, 22 May 2003

Tiquia, R., ‘New paradigm of research,’ <chineseherbacademy@yahoo groups.com>, 14
November 2003

Tiquia, R., ‘New paradigm of research,’ <chineseherbacademy@yahoo groups.com>, 14
November 2003

Tiquia, R., ‘Dangerous views,’ <chineseherbacademy@yahoo groups.com>, 16 November 2003

Tiquia, R., ‘Paradigm of local knowledge,’ <chineseherbacademy@yahoo groups.com>, 18
November 2003

Tiquia, R., ‘Knowledge needed for APv CHM,’ <chineseherbacademy@yahoo groups.com>, 19
November 2003

Tiquia, R., ‘Knowledge needed for APv CHM,’ <chineseherbacademy@yahoo groups.com>, 20
November 2003

Tiquia, R., ‘Herbal injectables,’ <chineseherbacademy@yahoo groups.com>, 20 November 2003

Tiquia, R., ‘Herbal injectables,’ <chineseherbacademy@yahoo groups.com>, 21 November 2003

Tiquia, R., ‘Teaching texts,’ <chimed@ccat.sas.upenn.edu>, 23 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 27 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 28 November 2003
Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 29 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 29 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 29 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 30 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 30 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 30 November 2003

Tiquia, R., ‘Teaching issues,’ <chimed@ccat.sas.upenn.edu>, 1 December 2003

Tiquia, R., ‘Cartesian split,’ <chinesemedicine-network@tulku.mandala-designs.com>, 6 December 2003

Tiquia, R., ‘Australian CMRB Submission,’ <chinesemedicine-network@tulku.mandala-designs.com>, 7 December 2003

Tiquia, R., ‘Orientation,’ <chinesemedicine-network@tulku.mandala-designs.com>, 11 December 2003

Tiquia, R., ‘Fernando On Alon: theory and clinical practice,’ <chinesemedicine-network@tulku.mandala-designs.com>, 12 December 2003

Tiquia, R., ‘Original conceptions,’ <chinesemedicine-network@tulku.mandala-designs.com>, 13 December 2003

Tiquia, R., ‘Wind heat epidemic,’ <chineseherbacademy@yahoogroups.com>, 21 December 2003

Tiquia, R., (22 December 2003), Re: wind heat epidemic, Chineseherbacademy [Online], Available, E-mail:chineseherbacademy@yahoogroups.com

Tiquia, R., ‘Case histories,’ <traditional_chinese_medicine@yahoogroups.com>, 28 December 2003

Tiquia, R., ‘Original conceptions - now beyond cognition,’ <chinesemedicine-network@tulku.mandala-designs.com>, 4 January 2004

Tiquia, R., ‘Jim Ramholz,’ <chineseherbacademy@yahoogroups.com>, 26 January 2004
Tiquia, Rey & Verran, Helen, ‘Chrysanthemum Tea party in the Making? Standards and Criteria in the Practice of Traditional Chinese Medicine in Australia,’ (paper presented before the Australasian Association of History Philosophy and Social Studies of Science (AAHPSSS) annual conference, University of New South Wales, Sydney, 8 July 1995)


Townsend, Peter, Practitioner’s Manual for Commonly Used Chinese Herb Formulas, Surry Hills, NSW, Chinaherb Company, 1992

Tuy, M., ‘Menopause Herb Remedy in Doubt,’ The Age, 15 July 2001

Turnbull, David, Masons, Tricksters and Cartographers, Australia, Harwood, 2000

Turnbull, David, Mapping the World in the Mind: An Investigation of the Unwritten Knowledge of the Micronesian Navigators, Geelong, Deakin University, 1991


Turnbull, David, Technoscience Worlds, Geelong, Deakin University, 1991


Unschuld, Paul U., Medical Ethics in Imperial China, Berkeley, University of California Press, 1979


Verran, Helen, 'Transferring strategies of land management: The knowledge practices of indigenous landowners and environmental scientists,' Dept. of History and Philosophy of Science, University of Melbourne

Verran, Helen, 'Contemporary Aboriginal Life and some Foundations in Reasoning,' Department of History and Philosophy of Science, University of Melbourne, 1995

Verran, Helen Watson, 'Science and Other Indigenous Knowledge Production Systems,' paper presented before the 4 S/EASST joint meeting in Gothenberg, 12-15 August 1992

Veith, Ilza, The Yellow Emperor's Classic of Internal Medicine, Berkeley, University of California Press, 1972

Victorian Health and Community Services, Tender Brief No. 335: Research into the Practice of Traditional Chinese Medicine in Victoria, Public Health Branch Publication, 25 October 1995

Victoria, Parliamentary Debate, Legislative Council, 28 October 1925, 1905 (Dr. Argyle, Chief Secretary

Victoria, Parliamentary Debate, Legislative Council, 8 July 1925, 29 (Petition)

Victoria, Parliamentary Debates, Parliament, 16th October 1878, 1497 (J. Orr, Opposition)


Wang, Simon & Liu, Julius, Qigong for Health & Longevity: The Ancient Chinese Art of Relaxation/Meditation/Physical Fitness, Tustin CA, The Est Health Development Group, 1994

Wang Xi Jing e .al., Celebrated Chinese Historical Figures, Beijing, Morning Glory Publishers, 1989
Wanling Zhang, "Herbs and Needles: Traditional Chinese Medicine Practice in Victoria"  
(Master of Health Sciences, La Trobe University, 1995)


Warne G.L., <warne@cryptic.rch.unimelb.edu.au>, ‘RCHI Traditional Chinese Medicine Seminar,’ private email message to Rey Tiquia, 20 July 2000


Willis, Evan, Medical Dominance: The division of labour in Australian health care, Sydney, George Allen and Unwin, 1983

WHO Information Fact Sheet N134, September 1996


Wong Eva (trans.), Cultivating the Energy of Life by Liu Hua Yang, Boston, Shambhala, 1998


Wong, K. Chimin et al., History of Chinese Medicine, Taipei, Southern Materials Center Inc., 1977

Woodruff, P., ‘Changing Patterns of Disease in a New Colony,’ in Reflections on Medical History and Health in Australia: Third National Conference on Medical History and Health in Australia, Melbourne University Press, 1986

Working party on Acupuncture, ‘Acupuncture,’ A Report to the National Health and Medical Research Council [NH&MRC], Canberra, Australian Government Publishing Service


Wu, John C.H. (trans), Lao Tzu/ Tao Teh Ching, New York, St. John’s University Press, 1961

Xie Zhu Fan et al., Dictionary of Traditional Chinese Medicine, Hongkong, The Commercial Press, 1984

Yang, Jwing-Ming, The Root of Chinese Qigong Secrets for Health, Longevity & Enlightenment, Jamaica Plain, Massachusetts, YMAA Publication Center, 1997
Yang, Jwing-Ming, Shaolin White Crane Martial Power and Qigong, Jamaica Plain, Massachusetts, YMAA Publication Center, 1996

Yee Quock Ping, The Medical Board of Victoria, 1875, 1, VLR 112

Yin B.Y. & Roshenow, Modern Chinese Characters, Beijing, Sinolingua, 1994


Zhang Zhong Jing, Treatise on Febrile Diseases Caused by Cold (Shanghan Lun), Luo Xiwen, (trans.), Beijing, New World Press, 1986

Bibliography (Chinese Language Materials)

Bamboo Forest Temple Buddhist Monk (Qing), *Ning kun mijji* [A calm lady’s secret book]. This book is part of the library collection of the Yang Cheng Guang tongji yaowan dian. It was reprinted from a wooden print plate of 1876 (the second year of the reign of Guan Xu). This was originally part of T.S. Goon’s private library and is currently part of my private collection.

Beijing TCM College, *Wu guan ke jiangyi, shiyong* [Teaching materials on the discipline of the eye, ear, nose, throat, on trial], Beijing TCM College, 1972

Beijing TCM College (compiled by the Bone Setting Dept. of the Dong Zhi Men Hospital), *Gukexue (gong jiaoxue yu cankao shiyong* [Study on bone setting techniques (provided for teaching and reference use)], Beijing TCM College, Beijing, 1976

Beijing TCM College, *Zheng cheng ren ti xue, shiyong jiaocai* [A Study of the normal human body, teaching materials on trial], Beijing TCM College, Beijing, 1973

Beijing TCM College, *Bing li xue, shi yong jiangyi* [Study of pathology, teaching materials on trial], Beijing TCM College, 1974

Beijing TCM College, *Yixue weishengwu xue yu jisheng chong xue* [Microbiology and parasitology], Beijing TCM College, 1974

Beijing TCM College, *Yaoli xue, shiyong jiangyi* [Pharmacology, teaching materials on trial], Beijing TCM College, 1974

Beijing TCM College, *Guwen jiangyi, shiyong ben* [Teaching materials on classical Chinese, teaching materials on trial], Beijing TCM College, 1974

Beijing TCM College, *Waixue jiangyi, shiyong jiaocai* [Teaching materials on the study of surgery, teaching materials on trial], Beijing TCM College, 1975

Beijing TCM College, *Nei er ke jiangyi, shi yong* [Teaching materials on internal medicine and paediatrics, on trial], Beijing TCM College, Beijing, 1975

Beijing TCM College, *Waixue jiangyi (shiyong jiaocai)* [Teaching materials on the TCM discipline of external medicine (teaching materials on trial)], Beijing TCM College, 1975

Beijing TCM College, *Waixue shixi zhidao* [A manual guide to fieldwork practice in surgery], Beijing TCM College, Beijing, 1975
Beijing TCM College, *Zhongyixue xuandu* [Selected readings on classical TCM], Beijing TCM College, Beijing, no publication date

Beijing TCM College, *Zhongyao fangji xue* [Chinese materia medica and formula preparations], Beijing TCM College, no publication date

(The above Beijing TCM College Chinese textbooks were a major part of the teaching materials provided to our TCM class 1975 in China.)

Beijing TCM College Materia Medica Department, *Zhongyao zhiji huibian* [Compilation of materia medica preparations], Renmin weisheng chubanshe, Beijing, 1983

Beijing TCM College Materia Medica Teaching and Research Group, *Yixue sanzijing baihua jie* [Ancient three characters poems in medicine: an explication in the vernacular], Renmin weisheng chubanshe, Beijing, 1982

Beijing TCM College Dong Zhi Men Hospital, *Liu Shou Shan zhenggu jingyan* [Liu Shou Shan's experience in bone setting], Renmin weisheng chubanshe, Beijing, 1985

Bo Yan Kui, *Yi fang fazhi* [Elaboration of TCM Formulae 医方发指], Liaoning kexue jishu chubanshe, Liaoning, 1984

Bureau of Peaceful Benevolent Dispensary (Sung), *Taiping huimin heji jufang* [Materia Medica Prescriptions of the Peaceful Benevolent Dispensary], Liu Jing Yuan (proof-reading and punctuation), Renmin weisheng chubanshe, Beijing, 1985 edition of Yuan dynasty version

Cang Xiao He, *Ziran kexue shi jianbian* [A concise edition of the history of natural science], Beijing chubanshe, Beijing, 1988

Cao Chun Lin, *Zhongyao zhiji huibian* [Compilation of Chinese materia medica preparations], Renmin weisheng chubanshe, Beijing, 1983

Cao Xi Liang, *Zhongguo jianshen shu* [The Chinese technique of making the body healthy], Shanxi kexue jishu chubanshe, Xi an, 1983

Cao Xi Zhen, *Wai shang zhongyi anmo liaoza* [TCM massage therapy for external injuries], Xianggang taiping shuju, Hongkong, 1976

Cen Ze Bo, *Zhongyi shangkexue (gong zhongyi zhuanye yong)* [TCM study of trauma (for use of the TCM profession)], Shanghai kexue jishu chubanshe, Shanghai, 1985

Chai Lu Xian, ‘Lun Shuo Bu,’ [Volume On Explications], *Zhong Guo Yi Yao Hui Hai* [A Sea of Convergence on Chinese Medicine, Vol. 16,1941], Beijing shi zhongguo shudian, Beijing, 1985

Chao Yuan Fang (Sui 610 AD), *Zhu Bing yuan hou lun* [Treatise on the origins of the clinical patterns of all diseases], Renmin weisheng chubanshe, Beijing, 1984 edition of a Qing version

Chao Yuan Fang, *Zhu Bing yuan hou lun jiao shi* [Treatise on the origins of the clinical patterns of all diseases, proof-read and explications], Nanjing TCM College, proof-reading and explications, Renmin weisheng chubanshe, Beijing, 1985

Chen Ding San, Jiang Er Sun (ed.), *Yixue Tanyuan* [Exploring the Origins of Medicine], Sichuan kexue jishu chubanshe, Sichuan, 1985

Chen Gu Ying, *Laozi zhu yi ji pingjia* [Laozi: annotation, translation and evaluation], Zhonghu shuju, Beijing, 1984

Chen Gu Ying, *Zhongguo zhexue shi* [History of Chinese philosophy, Vols. 1-4], Renmin weisheng chubanshe, Shenyang, 1979

Chen Ren Shan, *Yaowu chuchan bian* [Differentiating materia medica from the place they are produced], Printing department of the Guangdong zhongyi yao zhuannen xueyuan, Guangdong, 1930. This book was originally part of S.T. Goon’s private library. It is now part of my private book collection.


Chen Xin Wang et al., *Han ying chengyu zhanyu chang yong ciyu hui bian* [ A collection of Chinese idioms, proverbs, and phrases with English translations], Zhishi chubanshe, Beijing, 1984

Chen Xu Yuan, *Yixue shi zai yi* [The reality of medicine is in the ‘yi’ (jing)], Lin Lang Hui (proof-reading and annotation), Fujian kexue jishu chubanshe, Fujian, 1993 edition of Qing version

Chen Xue Lou, *Zhongguo Yi Yao Shuyu shiyi* [An Explication of TCM terminology], Tongji daxue chubanshe, Shanghai, 1993
Chen Ying Ning, Daojiao yu yangsheng [Taoism and nurturing life], Hua wen chubanshe, Beijing, 1993

Chen Ze Lin et al., She zhen yanjiu [A research on the tongue diagnosis], Shanghai kexue jishu chubanshe, Shanghai, 1986

Cheng Guo Peng (Qing), Yixue xin wu [A new understanding of medicine], Kexue jishu wenxian chubanshe, Beijing, 1992 edition of Qing 1732 version

Cheng Guo Peng (Qing 1732), Yixue xin wu (fu Hua Tuo wai ke shi fa) [A new understanding of medicine (attached is Hua Tuo's ten methodologies on external medicine), Shanghai hui wen tang (printed from stone plates), year xin hai (1911). This book originally was part of the private collection of T.S. Goon. It is now part of my private collection.

Cheng Jue Tang, Zhongyi houke jingyi [Essentials of the TCM Discipline of the Throat], Xue yuan chubanshe, Beijing, 1993

Cheng Xing Xuan (Qing 1829), Yi Shu [Medical discourse], Anhui kexue jishu chubanshe, Anhui, 1983 edition of Qing 1829 version

Cheng Yi Shan, Zhongguo gudai yuanqi xueshuo [China’s ancient doctrine of the primary Qi], Hubei renmin chubanshe, Hubei, 1986

Cheng You Ren, Shanghan lun chan shi [Elucidation of the treatise on febrile diseases], Shanxi kexue jishu chubanshe, Shanxi, 1984

Cheng Zhao Huan, Shanghan xinwu [Understanding the treatise on febrile diseases], Xueyuan chubanshe, Beijing, 1989

China State TCM Administrative Bureau Chinese Materia medica Information Centre, Zhiwuyao youxiao chengfen shouce [A Manual on the Active Ingredients of Plant Materia Medica], Renmin weisheng chubanshe, Beijing, 1986

China Veterinary Association, Zhongguo shouyi zhengjiuxue [China study of veterinary acupuncture], Nongye chubanshe, Beijing, 1984
Chinese-English Dictionary Writing and Compiling Group of the English Department of the Beijing Foreign Languages Institute, *Han Ying Cidian* [Chinese-English Dictionary], Shangwu yinshu guan, Beijing, 1979

Chinese-English Medical Dictionary Compiling Group, *Han ying yixue da cidian* [Chinese-English Medical Dictionary], Shangwu yinshu guan, Hongkong, 1988


Chinese Yao Information Center of the of the PRC State Medical Bureau, *Zhiwu yao you xiao chenfeng shouce* [A manual of plant materia medica active constituents], Renmin weisheng chubanshe, Beijing, 1986

Ci Hai Editorial and Compiling Committee, *Ci hai lishi fences zhongguo gudai shi* [Ci hai, volume on history, ancient Chinese history], Shanghai cishu chubanshe, Shanghai, 1981

Ci Hai Editorial and Compiling Committee, *Ci hai shengwu fence* [Ci hai, volume on biology], Shanghai cishu chubanshe, Shanghai, 1981

Ci Hai Editorial and Compiling Committee, *Ci hai yishu fence* [Ci hai, volume on art and culture], Shanghai cishu chubanshe, Shanghai, 1981

Ci Hai Editorial and Compiling Committee, *Ci hai yiyao weisheng fence* [Ci hai, volume on medicine, materia medica and hygiene], Shanghai cishu chubanshe, Shanghai, 1981

Ci Hai Editorial and Compiling Committee, *Ci hai li shi fen ce (Zhongguo gudai shi)*, [Ci hai, volume on ancient Chinese history], Shanghai cishu chubanshe, Shanghai, 1984

Ci Hai Editorial and Compiling Committee, *Ci hai yuci fen ce* (Shang, Xia Ce) [Ci hai, volume on words and phrases, Vols. 1-2], Shanghai cishu chubanshe, Shanghai, 1977


Compiling Group of the National Corpus of Chinese Materia Medica, *Quan guo zhongcaoyao huibian* [National Corpus of Chinese Materia Medica], Renmin weisheng chubanshe, Beijing,
1976

Compiling Group of the National Middle level Hygiene School Teaching Materials on Trial, *Gudian yizhu xuan* [Selections of classical medical texts], Liaoning renmin chubanshe, Shenyang, 1979


Compiling Group of the *English-Chinese Biomedical Dictionary*, *Ying han yixue cihui* [English-Chinese biomedical dictionary], Renmin weisheng chubanshe, Beijing, 1979

Compiling and Writing Group of the Sun Yat Sen Medical Academy, *Zhongyi fangji xuanjiang* [Selected lectures on TCM Formula preparations], Guangdong keji chubanshe, Guangdong, 1981

Compiling Group of the Xinhua Dictionary, *Xinhua zidian* [New China Chinese language dictionary], Shangwu yinshuguan, Hongkong, 1997

Dan Po Yuan Yin (Japanese, 1826), *Zhongguo yiji kao* [An examination of Chinese Medical Texts], Renmin weisheng chubanshe, Beijing, 1983

Deng Ming Lu, *Zhongguo dongwu yao* [Animal-based materia medica in China], Jilin renmin chubanshe, Jilin, 1981

Deng Tie Tao et al., *Zhongyi zhenduoxue* [TCM Diagnostics], Renmin weisheng chubanshe, Beijing, 1987

Deng Tie Tao, *Xueshuo tantao yu lin zheng* [Exploring the doctrine and clinical patterning], Guangdong keji chubanshe, Guangdong, 1981

Deng Wen Jun et al., *Tong zheng lun* [On the clinical pattern of pain symptoms], Huanan ligong daxue chubanshe, Guangzhou, 1988


Ding Zhen Yan, *Zhongguo zhexue shi jiaocheng* [A study course on the history of Chinese philosophy], Huadong shifan daxue chubanshe, Suzhou, 1989
Dictionary Editorial Board of the Linguistic Research Office of the China Social Science Academy, *Xiandai hanyu cidian* [Dictionary of the Modern Chinese Language], Shangwu Yinsuhuan, Beijing, 1979

Ding Xin Bai et al., *Dao de jing yu Qigong* [The Dao de Jing and Qigong], Anhui kexue jishu chubanshe, Hefei, 1996

Dong Jian Hua, *Zhongguo xiandai ming zhongyi yi an jinghua* [Quintessence of medical case records of famous TCM practitioners in modern China Vol.1-3], Beijing chubanshe, Beijing, 1992

Dong Lai, *Renshi zhongguo zi* [Recognizing Chinese characters], Xinfeng wenhua shiye gongsi, Hongkong, no publication date

Duan Yi Shan et al., *Yi gu wen, gong zhongyi zhongyao zhenju zhuanye yong* [Medical classical Chinese language, provided for use by TCM, materia medica and acupuncture professions], Shanghai kexue jishu chubanshe, Shanghai, 1985

Ear Acupoint Diagnostic Technique Compiling Committee, *Er xue zhenduan xue* [A Study of ear acupoint diagnostic technique], Renmin weisheng chubanshe, Beijing, 1992


Fang Shi Ming, *Zhongguo lishi jinian biao* [A table of yearly records of Chinese history], Shanghai cishu chubanshe, Shanghai, 1982

Fang Wen Xian et al., *Zhongyi rumen bidu gefue* [TCM Required Primer on formulas rendered in rhyming poem], Zhongguo zhongyi yao chubanshe, Beijing, 1996


Fang Yao Zhong, *Bianzheng lunzhi yanjiu qijiang* [Seven lectures on the study of tailoring treatments in accordance with the differentiated clinical pattern], Renmin weisheng chubanshe, Beijing, 1979

Fang Yao Zhong et al, *Wen bing hui jiang* [A collection of lectures on warm febrile diseases], Renmin weisheng chubanshe, Beijing, 1986
Fang Yao Zhong, *Huangdi nei jing suwen yun Qi qijiang jie* [Seven Explanatory lectures on the motion of the Qi in the volume on plain questions of the Yellow Emperor's canons on internal medicine], Renmin weisheng chubanshe, Beijing, 1984

Feng You Lan, *Zhongguo zhexue jianshi* [A short history of Chinese philosophy, trans. Tu You Guang], Beijing daxue chubanshe, Beijing,

Feng You Lan, *Zhongguo zhexue shi* [History of Chinese philosophy, Vols. 1 & 2 ], Zhonghua shuju, Beijing, 1984

Gao Shi Zong (Qing), *Huang Di suwen zhi jie* [Direct explication of the Yellow Emperor's plain questions], notations by Yu Tian Xing, Kexue jishu wenxian chubanshe, Beijing, 1980 edition of the Qing version


Gao S.Z., *Huang Di Neijing Su Wen Zhi Jie* [Annotations of The Yellow Emperor's Classic of Medicine (Plain Questions)], Kexue jishu wenxian chubanshe, Beijing, 1980 edition of 1695 Qing Dynasty version


Guo Ai Chun, *Huangdi nei jing cidian* [The Yellow Emperor Inner Classic Dictionary ], Tianjin kexue jishu chubanshe, Tianjin, 1991

Guo Ai Chun, *Zhongguo lishi nian biao* [A chronological table of the history of Chinese medicine], Heilongjiang renmin chubanshe, Haerbin, 1984

Guo Ai Chun, *Huangdi nei jing suwen jiao zhu yu shi* [The Yellow Emperor's plain questions from the Inner Canons, proof-read, annotated, translated (into the vernacular) and explained], Tianjin kexue jishu chubanshe, Tianjin, 1981

Guo Yuan, *Shiyong zhong xi jiehe fuchanke zheng zhi* [Practical clinical pattern diagnosis and treatment in gynaecology and obstetrics using integrated Chinese and Western medicine], Shanxi renmin chubanshe, Shanxi, 1984

Hao Jin Kai *Zhenjiu jingwai qixue tupu* [Collected illustrations of unusual acupoints outside of the regular acupuncture acu-tracts], Shanxi renmin chubanshe, Shanxi, 1979

Hao Qin, *Long hu dan dao* [The Tao of the Dragon-tiger inner immortality pill], Sichuan renmin chubanshe, Chengdu, 1994

Hebei Medical School, *Ling Shu Jing Jiao Shi* [Spiritual Pivot Proof-read/Elucidated Version, Vols. 1-2], Renmin weisheng chubanshe, Beijing, 1984

He Xin (Dr. Benjamin Hobson, Qing), *Fu ying xin shuo* [Treatise on midwifery and diseases of children], Jiangsu Shanghai renji yiguan, Shanghai. This text was printed in Chinese from new wood blocks cut on the 8th year of the reign of Xian Feng (1858). This was originally part of T.S. Goon’s private library and is currently part of my private collection.

Historical Literature Research Department of the China TCM Research Academy, *Zhongguo Renwu Cidian* [A Dictionary of TCM Personages], Shanghai cishu chubanshe, 1988

Hong Cai Xiang (1999, 15 November), ‘Auzhou zhongyishi xingyi jiuren le feitu pin chushi, zongguo nian zhongyi, aozhou xingyi’ [Australian TCM Practitioner finds happiness in practising medicine and helping people; born in the Philippines; studied in China and practices in Australia], *Lianhe wanbao* [United Evening News, Singapore], 15 November 1999, (Singapore Chinese language newspaper)


Huang Fu Mi (259 AD), *Zhenjiu jia yi jing jiao shi* [A classic on the ABC of acupuncture (with proof-reading and annotation, Vols. I-II), Shandong TCM College (proof-reading and annotation), Renmin weisheng chubanshe, Beijing, 1979 edition of 250 AD version

Huang Li Zhen, *Ba bai zhong gudian wenxue zhuzuo jieshao* [An introduction to 800 selections from Chinese classical literature], Zhongzhou shuhua she, Henan, 1982

Huang Xing Yuan, *Zhongyi neike jizheng zhengzhi* [TCM internal medicine clinical pattern diagnosis and treatment of acute emergency cases], Renmin weisheng chubanshe, Beijing, 1985
Hu Jing Jun, Zhongguo gudai wenhua shiyong shouce [A practical manual on ancient Chinese culture], Hunan weiyi chubanshe, Changsha, 1992

Hu Bo Hu et al., Xian dai zhenjiushi shouce [A manual for the modern acupuncturist], Beijing chubanshe, Beijing, 1995

Hu Si Hui (Yuan), Yin shan zheng yao [The importance of balance in diet], Li Chun Fang (translation and annotations), Zhongguo shangye chubanshe, Beijing, 1988 edition of Yuan version


H. Y. Zhang, ‘Categories of China’s Materia Medica Resources,’ Zhongguo zhongyao zazhi [Journal of Chinese Materia Medica 中國中藥雜誌], 7(20), 1995

Ji Zhong Pu, Zhong Xi Yi jiehe yanjiu silu yu fangfa [The thinking and methodology involved in the integration of TCM and Western biomedicine], Shanghai kexue jishu chubanshe, Shanghai, 1985

Jia De Dao, Zhongguo yixue shilue [An Outline History of Medicine in China 中國醫學史], Shanxi renmin chubanshe, Shanxi, 1979

Jia Wei Cheng, San bai zhong yiji lu [A Record of 300 Medical Classics], Heilongjiang kexue jishu chubanshe, Haerbin, 1982

Jiang Bi Da, Wenyuan changyong cidian [Dictionary of commonly used classical Chinese words and expressions], Nanhai chuban gongsi, Beijing, 1991

Jiang Guan (Ming 1552), Ming yi lei an [Classified medical records of famous physicians], Renmin weisheng chubanshe, Beijing, 1983 edition of Ming version

Jiangsu New Medical Hospital, Zhongyao cidian [Dictionary of Chinese materia medica, Vols. 1–2], Shanghai renmin chubanshe, Shanghai, 1977

Jiao Guo Rui, Zhenjiu linchuang jingyuan jiyao [Essential collections of acupuncture clinical experience], Renmin weisheng chubanshe, Beijing, 1981
Jiao Shu De, *Yong Yao Xin de shi jiang* [Ten lectures on what I have learned in the use of Chinese materia medica], Renmin weisheng chubanshe, Beijing, 1978

J.H. Zhu, Zhongxi yaowu xianghu zuoyong [Mutual interaction between Chinese Yao and Western pharmaceutical drugs 中西药物相互作用], Renmin weisheng chubanshe, Beijing


J.L. Yang (ed.), *Xin Jiao Ben Han Shu Li Zhu Bing Fu Bian Er Zhong* [New annotated volumes of the Han Annals, Vol. 5], Ding Wen Book Company, Taiwan, 1980

Leng Fang Nan, *Zhongyi zhenghou bian zhi guifan* [Standard TCM clinical patterns and therapy], Renmin weisheng chubanshe, Beijing, 1993

Liang Nai Gui, *Yijia yu yiji* [Medical practitioners and medical texts], Renmin weisheng chubanshe, Beijing, 1983

Liang Qin Wu et al., *Zhongyao peiwu yingyong* [An applied method of combining materia medica], Neimenggu renmin chubanshe, Inner Mongolia, 1975

Liao Run Hong, *Mianxuetang zhentu jicheng* [Striving school of Acupuncture and Moxibustion collection 勉學堂針灸集成], Zhong guo zhongyi yao chubanshe, Beijing, 1998 edition of Qing edition of 1874

Li Chao (re-ordered the ancient text), *Zhongyi waizhifa jianbian (yuan ming li yue pian wen)* [[TCM external therapy: a simplified compilation (the original title of this ancient book was ‘Rhymed discourses in external therapy’)], Hubei renmin chubanshe, Hubei, 1977

Li Ding, *Jingluo xue (gong zhenjiu zhuanye yong)* [Study on the acupuncture (for the use of the acupuncture profession)], Shanghai kexue jishu chubanshe, Shanghai, 1984

Li Ding et al., *Jingluoxue (gong zhenjiu zhuanye yong)* [Study of the acu-tracts (for the use of the acupuncture profession)], Shanghai kexue jishu chubanshe, Shanghai, 1984

Li Gao (13 AD), *Pi wei lun zhu shi* [Treatise on the spleen and stomach (annotation and explication), Hunan TCM Materia Medica Research Academy (annotation and explication), Renmin weisheng chubanshe, Beijing 1976

Li Huan, *Kuangwu yao qian shuo* [An introduction to mineral materia medica], Shandong kexue
jishu chubanshe, Jinan, 1981

Li Jing Wei, Zhongyi renwu cidian [Dictionary of Chinese Medical Personages], Shanghai Cishu chubanshe, Shanghai, 1988

Li Le Yi, Hanzi yanbian wu bai li [Tracing the roots of the Chinese characters: 500 cases], Beijing yuyan xueyuan chubanshe, Beijing, 1993

Lin Zhao Gang & Yan Liang, Zhenjiu yixue shi [History of Acupuncture and Moxibustion Medicine 針灸醫學史], Zhongguo zhongyi yao chubanshe, Beijing, 1995

Li Sheng Shao et al. (compilers and editors) Jing luo quan shu, [The Complete Book On the Acu-tracts 経絡全書], Zhong guo gu ji chubanshe, Beijing, 1992. (This book is a collection of three volumes published during the Ming Dynasty: Shen Zi Lu & Yu Shi Zeng, Jing luo quan shu [The Complete Book on the acu-tracts 1576]; Zheng San Yi, Jing luo kao [Examining the acu-tracts] 1609]; and Zhai Liang, Jing luo hui bian [The Corpus on the acu-tracts, 1628].

Li Shi Zhen (Ming), Ben cao gang mu [The Great Systematic Materia Medica of 1596, Vols. 1-4 本草綱目], Renmin weisheng chubanshe Beijing, 1975 edition of the Ming version

Li Shi Zhen (Ming), Qi jing ba mai kao jiao zhu [An examination of the eight unusual acu-tracts (proof-reading and annotation)], Wang Luo Zhen et al., (proof-reading and annotation), Shanghai kexue jishu chubanshe, Shanghai, 1990

Li Shi Zhen, Changyong shu xue linchuang fahui [Extending clinically the efficacy of commonly used acupuncture points], Renmin weisheng chubanshe, Beijing, 1985

Li Ting (Ming 1575), Yixue rumen [A primer on medicine, Vols. 1-8]. These volumes were printed from newly engraved wood blocks during the Qing dynasty (1858, the year of Xian Feng). It was originally part of the private library of the Melbourne Chinese herbalist T.S. Goon. It is now part of my private collection.

Li Wen Liang et al., Qian jia miao fang [Excellent formulae from a thousand practitioners, Vols. I-II], Jiefangjun chubanshe, Beijing, 1982

Li Wen Rui, Shiyong zhenjiuxue [Practical study of acupuncture], Renmin weisheng chubanshe, Beijing, 1982

Li Zhao Hua, Chuanran bing zhengzhi cong xin [The clinical patterns and corresponding
treatments of infectious diseases from a new perspective], Hebei renmin chubanshe, Shi jia zhuang, 1981

Li Zhong Zi, Yizong bidu [Essential Reading For the Medical Fraternity], Zhongguo zhongyiyao chubanshe, Beijing, 1998 edition of 1637 version

Li Zong Zhi, Zhongguo lidai nianhao kao [A survey of the reign-titles of Imperial China], Zhonghua shuju, Beijing, 1995

Liao Pin Zheng, Zhongyi yake xue (gong zhongyi zhuanye yong) [TCM study on the eyes (for use of the TCM profession)], Shanghai kexue jishu chubanshe, Shanghai, 1986

Lin Gong Zheng, ‘Ming tang tu yuan liu kao’ [An examination of the origins and development of the illustration of the ‘bright hall’], Zhongguo zhongyi yao nianjian [Chinese medicine and materia medica yearbook], Zhongguo zhongyi yao chubanshe, Beijing, 1992

Lin gong Zheng, ‘Xiancun zuiaoz de renti jie pou tu’ [Earliest extant illustration of the dissection of the human body], Zhongguo zhongyi yao nianjian [Chinese medicine and materia medica yearbook], Zhongguo zhongyi yao chubanshe, Beijing, 1993

Liu Guan Jun, Xiandai zhenjiu yi an xuan [Modern acupuncture selected case studies], Renmin weisheng chubanshe, Beijing, 1985

Liu Guo Zhu, Zhongguo yixue shihua [A historical narrative on Chinese medicine], Beijing kexue jishu chubanshe, Beijing, 1994

Liu Han Yin, Shiyong zhenjiu da quan [A complete book on practical acupuncture], Beijing Chubanshe, Beijing, no publication date

Liu Hong Tao, Zhongguo Gudai Keji Shi [History of China’s Ancient Science and Technology] Nankai daxue chubanshe, Tianjin, 1991

Liu Ru Chen, Zhongyixue bianzhengfa gailun [A General Introduction to TCM Dialectics], Guangdong keji chubanshe, Guangdong, 1983

Liu Shou Shan, Zhongyao yanjiu wenxian zhaiyao 1820-1961 [A summary of Chinese materia medica research literature from 1820 to 1961], Kexue chubanshe, Beijing, 1975

Lu Bu Wei (Pre-Qin), Lu Shi qun qi shi zhu [Prince Lu’s Spring and Autumn Annals, with annotations and explications, Vols. 1-2], annotations and explications by Zhang Shuang Di et al.,
Jilin wenshi chubanshe, Jilin, 1986 edition of pre-Qin version

Lu Ji Tang, Jinggong yangsheng de li he fa [The principle and methodology of stillness, meditation and nurturing life], Shanghai fanyi chubanshe, Shanghai, 1986

Lu Shou Kang et al., Zhenci shoufa 100 zhong [One hundred manual techniques in acupuncture], Zhongguo yiyao keji chubanshe, Beijing, 1988

Luo Yuan Kai, Zhongyi fukexue (gong zhongyi zhuanye shiyong) [A study of TCM gynaecology (for the use of the acupuncture profession)], Shanghai kexue jishu chubanshe, Shanghai, 1986

Luo Zhen Yu, Kuaisu Ziwuliu zhu Zhenjiu Liaofoa, [Quick calculation of the ZI Wu Liu Zhu in acupuncture therapy], Shanxi kexue jishu chubanshe, Shanxi, 1993

Ma Bian Liang et al., Jianming zhongyi gu bingming cidian [Concise TCM ancient disease nomenclature], Henan kexue jishu chubanshe, Zhengzhou, 1989


Ma Ji Xing, ‘Fuyuan gu jiuzhen de chubu yanjiu’ [Initial Research Into the Replication of the Ancient Nine Needles], Zhenjiu lunwen zhaiyao xuanbian [Collection of abstracts on Acupuncture and Moxibustion], Zhongguo zhenjiu xuehui, Beijing, 1987

Materia Medica Research Unit of the TCM Research Academy, Zhong yao zhijii shouce [Manual for Preparing Materia Medica], Renmin weisheng chubanshe, Beijing, 1965

Ma Zhong Xue, Zhongguo Yixue zhenfa da quan [A complete collection of Chinese medicine’s examination methodology], Shandong kexue jishu chubanshe, Shandong, 1991

Melbourne News Reporter, ‘Zhongyishi zhenjiushi zhuce wenti zhishu shengfu weisheng tingzhang zhiqian lian bang weisheng buzhang biaoshi ge ren zhichi’ [Registration of TCM practitioners and acupuncturists: a jurisdiction of State Health Departments: Federal Health Minister expresses his opinion], Xing dao [Sing Tao Daily], 12 March 1993

Melbourne News Reporter, ‘Duo yuan hua yixue yantaohui Lundun zaokai Auzhou zongyi daibiao ti linchuang pingjia tizhi’ [Plural medicine conference convenes in London, the Australian representative proposes a system of clinical evaluation], Xing dao [Sing Tao Daily], Melbourne, 29 October 1999
Meng Shu Jiang et al., *Wen bing xue, gong zhongyi zhuanye shiyong* [The study of warm febrile diseases, provided for the use of the TCM profession], Shanghai kexue jishu chubanshe, Shanghai, 1985

Nan Huai Jin, *Baihua yijing* [Vernacularized Yijing], Yuelu shushe, Changsha, 1988

Nanjing Pharmacology College, *Yao Ji Xue* [Study on Yao Preparations], Renmin weisheng chubanshe, Beijing, 1978

Nanjing TCM College Medical Classic Teaching/Research Group, *Huangdi neijing suwen yishi* [Elucidation and translation of the Yellow Emperor's Classic on Internal Medicine, Plain Questions 皇帝內經素問譯釋], Shanghai kexue jishu chubanshe, Shanghai, 1981


Pei Zhen, *Zhongguo daojia da zhihui* [The great wisdom of Taoist practitioners in China], Beijing tiyu xueyuan chubanshe, Beijing, 1993

Qian Bo Wen et al., *Zhongguo shiliao xue* [A study of Chinese food therapy], Shanghai kexue jishu chubanshe, Shanghai, 1987

Qiang Yuan Ming, *Li Shi Zhen de yanjiu* 李時珍的研究 [A study on Li Shi Zhen], Guangdong kexue jishu chubanshe, Guangdong, 1984

Qiang Tao, special feature, 'Ta yi zhongyi wei xiren zaofu' [Using TCM he brings benefits to Westerners], *Hua sheng bao* [Voice of Overseas Chinese], Beijing, 4 August 1987

Qin Bo Wei, *Jian zhai yixue jianggao* [Medical Lectures from the Modest School], Shanghai kexue jishu chubanshe, Shanghai, 1964

Qin Yue Ren (Pre-Han), *Nanjing* [Classic of difficulties], Kexue jishu wenxian chubanshe, Beijing, 1996 edition of pre-Han version

Qinghua University Foreign Languages Department Compiling and Writing Group, *Ying han kexue jishu cidian* [An English-Chinese Dictionary of Science and Technology], Guoji gongyi chubanshe, Beijing, 1991

Qing Xi Tai, *Zhongguo Daojiao* [Taoism in China, Vol. 2], Zhishi chubanshe, Shanghai, 1994
Qing Yun Ge (Qing), Yixue zhai cui [Extracted essence from medicine], punctuation and proofreading by Peng Jing Shan, Shanghai kexue jishu chubanshe, Shanghai, 1983 edition of 1896 version

Ren Ji Yu, Zhongguo zhexue shi [History of Chinese philosophy, Vols. 1-4], Renmin chubanshe, Beijing, 1979

Ren Ji Yu, Zhongguo daojiao shi [History of Taoism in China], Shanghai renmin chubanshe, Shanghai, 1990

Ren Ying Qiu et al. (eds.), Neijing yanjiu lun cong [A collection of treatises on research on the Inner Cannons], Hubei renmin chubanshe, Hubei, 1982

Ren Ying Qiu, Ren Ying Qiu Lun Yiji [Ren Ying Qiu’s Collection of Medical Works], Renmin weisheng chubanshe, Beijing, 1984


Shanghai College of traditional Chinese medicine, zhen jiu xue [The study of acupuncture], Joint Publishing, Hongkong Co., 1977

Shanghai TCM College, Zhong caoyao xue [The study of Chinese materia medica], Shangwu yinshu guan, Hongkong 1983

Shanghai TCM College, Zhongyi tuina xue [TCM Study of Massage], Renmin Weisheng chubanshe, Beijing, 1985

Shanxi TCM College, Xiandai jingluo yanjiu wenxian congshu [A summary of research literature on modern acu-tracts], Renmin weisheng chubanshe, Beijing, 1980

Shang Zhi Jun, Lidai zhongyao wenxian jinghua [The Essence of Chinese Literature on Chinese Yao in Various Historical Epochs 歴代中嶽文献精華], Kexue jishu wenxian chubanshe, Beijing, 1989

Shen Shi Yu (Qing 1661), Yi Heng [Medical Balance], Shanghai shudian, 1985 edition of 1661 version
Shen Xiao Lung, *Zhongguo wenhua yuyanxue* [The linguistics of Chinese culture], Jilin jiaoyu chubanshe, Jilin, 1990

Shi Guang, *Gu dai liandanshu shuping* [Ancient technique of transmuting the pill of immortality with annotations and textual evaluations], Beijing shifan daxue chubanshe, Beijing, 1993

Shi Guan Qing et al., *Huangdi neijing suowen xuan zhu* [Yellow Emperor’s Classic on Internal Medicine: plain questions: selected annotations], Henan kexue jishu chubanshe, Henan, 1982

Shi Tu Sheng, *Zhen Jiu Ge Fu Jiao Shi* [Acupuncture poetic prose, with proof-reading and annotations], Shanxi kexue jishu chubanshe, Shanxi, 1987

Si Yuan Yi, *Zhongguo Yixue Shi* [History of Chinese Medicine], Renmin weisheng chubanshe, Beijing, 1984

Song Shu Gong (ed.), *Yi Gu Wen Zhu Yi Ti Jie* [Classical Chinese medical literature annotations and explanatory notes], Zhongyi guji chubanshe, Beijing, 1986

Su Pei Cheng, *Hanzi jianhua yu fantizi duizhao zidian* [Comparative dictionary of simplified and complex Chinese characters], Zhongxing chubanshe, Beijing

Sun Si Miao (Tang 652), *Bei ji qian jin yaofang* [Prescriptions worth a thousand gold coins for emergencies], Renmin weisheng chubanshe, Beijing, 1982 edition of 1849 version (in Japan)

Sun Si Miao (Tang), *Qianjin yufang quanshi* [Supplement to prescriptions worth a thousand gold coins, annotated], Qian Chao Chen (annotations and translation), Xueyuan chubanshe, Beijing, 1995 edition of the Tang version.

Ten Lectures on the Acu-tract Compiling Group, *Jing Luo Shi Jiang* [Ten Lectures on the Acu-tracts], Shangwu yinshu guan, Hongkong

Shi Zhong Xu, *Zhongguo yixue shi* [History of Chinese Medicine], Zhengzhong shuju, Taipei, 1984

Sun Zhen Huan et al., *Zhenjiu xinwu* [Acupuncture realizations], Renmin weisheng chubanshe, Beijing, 1986

Sun Zhi Hong (Ming 1629), *Jianming yi gou* [Concise medical target range], punctuation and proof-reading by Yu Ying Ao et al., Renmin weisheng chubanshe, Beijing, 1984 edition of 1629 version
Tang Ke Jing, *Gudai hanyu* [Classical Chinese Vols. I-II], Beijing chubanshe, Beijing, 1992

Tang Zong Hai, ‘Yi Jing Jing Yi’ [Essential meanings from the medical classic], Chai Lu Xian (compiler), *Zhongguo Yi Yao Hui Hai* [A sea of convergence on Chinese medicine, Vol. 8, 1941], Beijing shi zhongguo shudian, Beijing, 1985

Tang Zong Hai, *Xue zheng lun* [Treatise on blood-related clinical patterns], Jin Xiang Lan, (proof-reading and annotations), Zhongguo zhongyi yao chubanshe, Beijing, 1999

Tang Zong Hai, *Yixue jian meng* [Seeing the capacities of medicine], Gansu renmin chubanshe, Gansu, 1982 edition of 1890 (Qing) version.

TCM Research Academy, *Zhenjiu yanjiu jin zhan* [Progress in acupuncture research], Renmin weisheng chubanshe, Beijing, 1981

TCM Research Academy (TCM research students), *Zhongyi zhuanti jian zuo xuan* [Selection of lectures on TCM specialized topics, Vol. 1], Renmin weisheng chubanshe, 1981

TCM Research Academy, *Zhongyi mingci shuyu cidian* [Dictionary of TCM terminology], Shangwu Yinshu guan, Hongkong, 1975

TCM Research Academy (Materia medica Research Office), *Zhongyao zhiji shouce* [A Manual of materia medica preparations], Renmin weisheng chubanshe, Beijing, 1975

TCM Research Academy, Guang An Men Hospital, Acupuncture Department Office of the Plum Blossom Acupuncture Needle, *Meihua zhen liao fa* [Plum blossom acupuncture needle therapy], Renmin weisheng chubanshe, Beijing, 1980

TCM Research Academy, *Zhongyi zhengzhuan jianbie zhenduanshu* [A Study of TCM diagnostics: differentiation of symptoms], Renmin weisheng chubanshe, Beijing, 1985

TCM Research Academy of China, *Zhongyi zhengzhou jianbie zhenduanshu* [A study of TCM diagnostics: clinical pattern differentiation], Renmin weisheng chubanshe, Beijing, 1987

Tianjin TCM College, *Zhongguo fensheng yiji kao* [A Survey of ancient medical texts in China’s provinces, Vol. 1], Tianjin ke xue jishu chubanshe, Tianjin, 1984
Tianjin TCM College, *Zangfu jingluo xueshu* [The doctrine of the internal organs and acu-tracts], Tianjin kexue jishu chubanshe, Tianjin, 1998

Tiquia, Rey, ‘Zhongyi de quyxixing shijian’ [Chinese medicine as local practice], *Shanxi Zhongyi xueyuan xue bao* [Academic Journal of the Shanxi College of traditional Chinese medicine], Vol. 7, No. 3, 1997


Wang De Shen, *Guoji biaojun zhenjiu xueming jianshi* [A brief explanation of the international standard nomenclature of acupuncture and moxibustion (Chinese-English)], Gaodeng jiaoyu chubanshe, Beijing, 1992

Wang Fu Yun et al., *Shiyong zhongyaoxue cidian* [A practical Chinese-English dictionary of traditional Chinese materia medica], Hunan kexue jishu chubanshe, 1994


Wang Ji Li et al., *Shezhen yuanjian* [The source mirror for tongue diagnosis], Zhongguo yiyao keji chubanshe, Beijing, 1993

Wang Jing Xu et al. (compiler), *Michuan anno juezhao* [Secret unique massage skills transmitted from generation to generation], Beijing kexue jishu chubanshe, Beijing, 1992

Wang Kui Pu (compiler & translator), *Chuyang luzu gongli gongfa quanshi taiyi jinhua zongzhi jinyi* [Annotation of Master Liu Dong Bin’s (pure Yang) principles and methods of meditation, a modern translation of the methodology of the Tai yi’s Golden Flower], Waiwen chubanshe, Beijing, 1994

Wang Mi Qu, *Zhongyi xinli xue* [TCM psychology], Tianjin kexue jishu chubanshe, Tianjin, 1985

Wang Qing Ren, *Yi lin gai cuo* [Correction of medical errors], Qing Dynasty, 1853 (a thread-bound book kept in the Rare Books Collection of the Brownless Medical Library, University of Melbourne)

Wang Qing Ren (Qing Dynasty, 1853), *Yi lin gai cuo* [Correction of Medical Errors], proof-reading and annotations by Li Zhan Yong et al., Zhongguo zhongyi yao chubanshe, Beijing, 1998
Wang Ren An (Wang Ang), *Yifangjijie* [Collected explications of medical formulae], Shanghai weisheng chubanshe, Shanghai, 1957 edition of Qing 1682 version

Wang Shu He (3 AD), *Maijing jiao shi* [The Pulse classic (proof-read and annotated)], proof-reading and annotation by Fuzhou People’s Hospital, Renmin weisheng chubanshe, Beijing, 1984 edition of a version written in 3 AD

Wang Xiu Zhen et al., *Cixue liao fa* [Blood needling therapy], Anhui kexue jishu chubanshe, Anhui, 1986

Wang Xue Tai, *Zhong Guo Zhen Jiu Da Quan* [Complete Works of Chinese Acupuncture and Moxibustion, Vols. 1-II], Henan kexue jishu chubanshe, Henan, 1988

Wang Xue Tai, *Dangdai Zhongguo Zhenjiu Mingjia Yi an* [Medical case records of famous acupuncture doctors in contemporary China], Jilin kexue jishu chubanshe, Jilin, 1991

Wang Xue Tai, *Zhongguo zhenjiu daquan* [Complete works on Chinese acupuncture and moxibustion, Vols. I-II], Henan kexue jishu chubanshe, Henan, 1992

Wang Yu Ting et al., *Zhongyi jibing zhenghou cidian* [Dictionary on TCM diseases and clinical patterns], Renmin junyi chubanshe, Beijing, 1988

Wang Zhan Zhen, *Zhang Zhong Jing yao fa yanjiu* [A Study on Zhang Zhong Jing's use of materia medica], Kexue jishu wenxian chubanshe, Beijing, 1984

Wang Yu Yi, *Shangke zhenjiu zhiliaoxue* [Study of acupuncture therapy in cases of trauma], Sichuan kexue jishu chubanshe, Chengdu, 1992

Wei Chang Chun, “Zhui yu jiu ji, qi feng hou xue” [Retracing the old footprints, a message to future students], in *Ming liao zhongyi zhi lu* [The road taken by veteran well-known TCM practitioners], Shandong kexue jishu chubanshe, Shandong, 1983

Wei Yi Zong, *Zhongguo guke kejishu shi* [History of Chinese bone-setting technique], Shanghai kexue jishu wenxian chubanshe

Wei Zhi Xiu, *Xuming yi lei an* [Supplement to the classified medical records of well-known physicians], Renmin weisheng chubanshe, Beijing, 1984 edition of Qing version of 1770

Wu Bao Jie, *Zhongcaoyao yaolixue* [The pharmacological study of Chinese materia medica], Renmin weisheng chubanshe, 1983
Wu Kun (Ming annotator), Neijing suwen wu zhu [Inner classics: plain questions], annotated by Wu, proof-read and punctuated by the TCM Classical Literature Office of the Shandong Provincial TCM College, Shandong kexue jishu chubanshe, Jinan, 1984


Wu Ju Tong (Qing 1798), Wen bing tiao bian [Treatise on the clinical pattern differentiation and treatment of warm febrile diseases], Liang Xi Zhou (proof-reading), Shanghai wen rui lou, Shanghai, 10th year of Chinese Republic (1921). This book was originally part of T.S. Goon’s private collection. It is now part of my private collection.

Wu Pu (Wei), Sun Xing Yan & Sun Feng Yi (Qing), Shen nong ben cao jing [Shen Nong’s Cannon of Materia Medica], Renmin weisheng chubanshe, 1982

Wu Shi Ji, Liyue pian wen zhu shi ben [Rhymed discourses on external therapy, annotated version], Renmin weisheng chubanshe, Beijing, 1984 edition of Qing 1870 version

Wu Tang, Wu Ju Tong yi An [Wu Ju Tong’s case studies], proof-reading and annotation by Li Zong Yi et al., Zhongguo Zhongyi yao chubanshe, Beijing, 1998 edition of Qing version

Wu Yi Luo, Cheng Fang Qie Yong [Creating a formula which fits its use], Shanghai kexue jishu chubanshe, Shanghai, 1982 edition of a Qing Dynasty circa 1761 version.

Xi Shui Jiang, Zhenjiu jiufaxue (gong zhenjiu zhuanye shiyong) [Study of Moxibustion methods in acupuncture (for use by the acupuncture profession)], Shanghai kexue jishu chubanshe, 1986

Xia Yu Xiang, Tuina fa Zeng tu kaoshuo [Traditional Chinese massage with illustrations], Xiang gang yilin shuju, Hongkong, no publication date

Xiao Shao Qing, Zhongguo zhenjiu chufangxue [The study of combining acupuncture points into a formula in Chinese acupuncture], Ningxia renmin chubanshe, Ningxia, 1986

Xie Guang Hui, Chang Yong Hanzi tu jie [The composition of common Chinese characters: an illustrated account], Beijing, Peking University Press, 1998

Xie Hao Ran, ‘Fei jingluoxian zuzhi jiegou de guancha yanjiu,’ [Observation and research of the histological structure of the lung acu-tract], Zhongguo zhenjiu [Chinese Acupuncture and Moxibustion], No. 6, Beijing, 1988

Xu Hong yuan & Xu Zhao Xin, Changyong hanfang fangji tujie [Pictorial explication of commonly used Han formulae and formula preparations], Xin yiyao chubanshe, Taipei, 1984

Xu Zhen (Han Dynasty) Duan Yu (Qing Dynasty), Annotations on explications of the culture of Chinese characters 說文解字, Shanghai Ancient Literature Publishing House, 1981 edition

Xue Wen Zhong, Zhongguo yixue zhi zui [Where and when Chinese medicine was first], Zhongguo luyou chubanshe, Beijing, 1991

Xue Yu, Zhongguo yaoxue shiliao [Historical Materials on China's Studies on Yao 中國藥學史料], Renmin weisheng chubanshe, Beijing, 1984

Xu Jun (Korean, Ming 1610), Dong yi biao jian, wai xing pian [The precious mirror of Oriental medicine, chapter on the ‘external form’]. This is a thread-bound book which features one of the three chapters of the manuscript. It does not contain the place and time of publication. It was part of the personal collection of T.S. Goon and is now part of my private collection.

Xu Rong Zhai, Dushi, jiaoxue, yu linzheng [Reading, teaching and clinical patterning], Renmin weisheng chubanshe, Beijing, 1985

Xu Zhen (Han Dynasty) Duan Yu (Qing Dynasty), Shuo wen jie zi [Annotations on explications of the culture of Chinese characters 說文解字], Shanghai guji chubanshe, Shanghai, 1981 edition

Yang Dian Kui, Gu dai wenhua changshi [Common knowledge on ancient culture], Shandong jiyu chubanshe, Shandong, 1988

Yan Hong Chen et al., Nei nan jing xuan shi [Selections from the inner and difficult classics and their elucidations 內難經選釋], Jilin renmin chubanshe, Jilin, 1979

Yang Jia Shan et al., Shuxue xue (gong zhenjiu zhuanye yong) [Study on acupoints (for use by the acupuncture profession)], Shanghai kexue jishu chubanshe, Shanghai, 1985

Yang Jin Sen, Zangxiang yu jie pou [Inner organ imagery and anatomy], Shanghai shuju, Hongkong, 1990
Yang Ji Zhou (1601), *Zhenjiu da cheng jiaoshi* [The Great Compendium of Acupuncture and Moxibustion, proof-read and explicited], proof-reading and explications by Heilongjiang Motherland Medicine and Materia Medica Research Office, Renmin weisheng chubanshe, Beijing, 1987 edition of the 1601 version

Yang Ji Zhou, *Zhenjiu da cheng* [The great compendium of acupuncture and moxibustion 针灸大成], renmin weisheng chubanshe, Beijing, 1980 edition of 1601 version

Yang Li, *Zhongyi yun Qi xue* [TCM study on the motion of the Qi], Beijing kexue jishu chubanshe, Beijing, 1995

Yang Ming yuan, *Jianming zhenjixue* [A Concise Study of Acupuncture], Heilongjiang renmin chubanshe, Haerbin, 1981

Yang Shang Shan (annotator and editor, Sui), *Huang Di Neijing Tai Su* [Yellow Emperor’s Inner Classic - a great simplification], Renmin weisheng chubanshe, Beijing, 1983 edition of Sui dynasty version

Yang Si Shu, *Zhongyishi shouce* [A TCM practitioner manual], Beijing kexue jishu chubanshe, Beijing, 1986

Yang Wei Yi, ‘Zhongti xiyong yu zheng de dongwu moxing’ [With Chinese learning as the ‘substance,’ Western learning as ‘function’: and the animal model of TCM clinical patterns], *Beijing zhongyiyao daxue sishizhounian xiaoqing lunwen ji* [Thesis collection on the occasion of the 40th anniversary of the foundation of the Beijing TCM University], Xueyuan chubanshe, Beijing, 1996

Yang Yi Fang et.al. (1984), *Yang Yong Xuan Zhongyi Zhenjiu Jing yan* [TCM and Acupuncture Experiential Selected Works Of of Yang Yong Xuan], Shanghai kexue jishu chubanshe, Shanghai, 1984

Yang Yi Ya, *Zhong Guo Yi Xue Shi* [The History of TCM in China], Hebei kexue jishu chubanshe, Shi Jia Zhuang, 1996

Yang Yi Ya, *Yi gu wen* [Medical classical literature], Hebei kexue jishu chubanshe, Hebei, 1996

Yang Yi Ya, *Zhongyixue wenda* [TCM questions and answers, Vols. 1-2]], Renmin weisheng chubanshe, Beijing, 1985

Yang Zhang Sen e. al., *Zhenjiu zhiliaoxue* [Acupuncture therapeutics], Shanghai kexue jishu
chubanshe, Shanghai, 1985

Yan Jie et al., *De pei ban cao* [Combining materia medica], (annotation and proof-reading by Jiang Dian Hua et al., Zhongguo zhongyiyao chubanshe, Beijing, 1999 edition of Qing 1761 version

Yan Wen Mei, *Shiyong zhongyao cai se tu pu* [A practical collection of coloured photographs of Chinese materia medica], Renmin weisheng chubanshe, Beijing, 1992

Yan Zhen Guo et al., *Jing xue, duannian jiepou tu jie (tou jing, xiong bu)* [Diagrammatic explanation of acutact acupuncture points cross section anatomy (head neck and thoracic sections)], Shanghai kexue jishu chubanshe, Shanghai, 1990

Yao Lan, *Fen jing ben cao* [Materia Medica Classified into their Meridian Association] Wen xing chu ban shi ye you xian gong ci, Tai Zhong City, Taiwan, 2004 version of Qing 1840 edition

Ye Cha Shan (ed.), *Cai Ai Bian Yi* [Spiritual Moxibustion: A Supplementary Edition 萊艾編翼], unknown author (1711), Zhong yi guji chubanshe, Beijing, 1985 edition of Qing dynasty 1805 version

Yin Hui He, *Zhongyi neike xin lun* [New Perspectives in TCM internal medicine], Shanxi renmin chubanshe, Shanxi, 1983

Yin Nan Gen, *Wuxing xin lun*, Liaoning jiaoyu chubanshe, Shenyang, 1993


Yuan Shan Chun Ji (Japanese), *Qi da jian shen fa* [Seven great methods for health, Vols. 1-2], Lete tian xiu yang guan, Shanghai, 1917. These volumes were originally part of T.S. Goon's private library. They are now part of my private collection.


Yu Jia Yan (Qing), *Yu Jia Yan yixue san shu* [Yu Jia Yan’s three medical books], proof-reading, annotation and punctuation by Wan You Sheng et al., Jiangxi renmin chubanshe, Jiangxi, 1984 edition of 1917 version
Yu Pei Lan et al., *Shiyong zhongyi erke shouce* [Practical manual of TCM paediatrics], Hunan kexue jishu chubanshe, Changsha, 1980

Yu Shen Chu, *Zhongguo yixue jianshi* [An outline history of Chinese medicine], Fujian kexue jishu chubanshe, Fujian, 1993

Yu Zhen (Qing 1778), *Gu Jin Yi An* [Notations on medical case records in ancient times and today], proof-reading and punctuation by Lu Zhao Lin et al., Liaoning kexue jishu chubanshe, Shenyang, 1997 edition of Qing Dynasty 1778 version

Zeng Shi Xin, *Xinglin shi cui* [Picking the emerald greens in the forest of apricot trees], Guangdong kexue jishu chubanshe, Guangdong, 1983

Zhang Bo Yu et al., *Zhongyi neike xue, gong zhongyi, zhenjiu zhuanye* [TCM study of internal medicine, provided for use by TCM and acupuncture professions], Shanghai kexue jishu chubanshe, Shanghai, 1985

Zhang Deng Ben et al., *Neijing cidian* [Dictionary of the Inner Canons], Renmin weisheng chubanshe, Beijing 1990

Zhang Feng Run, *Zhongguo jiu liao xue* [Study of moxibustion in China], Renmin weisheng chubanshe, Beijing, 1989

Zhang H. et al., *Bu yang huan wu tang zhiliao guanxinbing de linchuang yanjiu ji qi zuoyong jizhi tantao* [Clinical study on the effects of Bu yang huan wu decoction on coronary heart disease], Zhongxi yi jiehe zazhi [Journal of integrated Western and Chinese medicine], 15(4), pp. 213-215

Zhang Han Chen, *Xiao er bing tuina liao fa* [Traditional Chinese massage for children’s illnesses], Wanye chubanshe, Hongkong, no publication date

Zhang H.Y. et al., *Wo guo de zhong yao ciyan zhonglei* [Categories of China’s Materia Medica Resources], *Zhongguo zhongyao zazhi* [Journal of Chinese Materia Medica 中國中藥雜誌], 7(20), 1995

Zhang Jia Qing et al., 'Zhong xi yi yanjiu zhong de dongwu bingli moxing' [The animal pathology model used in the integrated TCM and Western biomedical research], in *Zhong xiyi jiehe yanjiu silu yu fangfa* [The thinking and methodology in the study of integrating TCM and Western biomedicine], Shanghai kexue jishu chubanshe, Shanghai, 1985

Zhang Jian Guang, *San qian nian yi qing* [Pestilence over three thousand years], Jiangxi gaoxiao chubanshe, Nanchang, 1998
Zhang Jie Bin, *Lei jing* [Re-classified inner classics, Vols. 1 & 2], Renmin Weisheng chubanshe, Beijing, 1985 edition of a Ming Dynasty 1624 version

Zhang Jie Bin, *Jing Yue quan shu* [The complete works of Zhang Jie Bin, referred to as Jing Yue], proof reading by Zhao Li Xun, Renmin weisheng chubanshe, Beijing, 1994 edition of 1637 version

Zhang Jie Min et al., *Zhongguo fangshu dacidian* [A Dictionary of Chinese Occult techniques], Zhongshan daxue chubanshe, Guangdong, 1991

Zhang Jin Biao, *Zangxiang yanyi shiyong yi yi yanjiu* [Inner organ imagery and the performance of the ‘yi’ (jing), a practical study of medicine and the ‘yi’ (jing)], Liaoning kexue jishu chubanshe, Shenyang, 1992

Zhang Ren et al., *Zhenjiu yiwi yufang ji chuli* [Mishaps in acupuncture: prevention and management], Shanghai kexue jishu wenxian chubanshe, Shanghai, 1988

Zhang Shan Chen, *Neijing zhenjiu lei fang yu shi* [Re-classification, translation (into vernacular) and annotation of acupuncture entries in the Inner Canons], Shandong kexue jishu chubanshe, Shandong, 1980

Zhang Xi Chun, *Yixue zhong zhong canxilu* [Records of TCM and Western biomedicine in combination, Vols. 1-3], proof-reading and punctuation by Wang Yun Kai, Yang Yi Ya and Li Lin Zhi, Hebei kexue jishu chubanshe, Hebei, 1985 edition of 1918-1934 version

Zhang Xue Wen et al., *Shezhen tujian* [Examination photographs for tongue diagnosis], Shanxi kexue jishu chubanshe, Xian, 1984

Zhang Yin An & Ma Yuan Tai (Qing annotators), *Huangdi neijing suwen lingshu he bian* [The Yellow Emperor’s Inner Canons - plain questions and spiritual pivot joint compilation]. This manuscript was printed from the printing plate of the Beijing zhongxi yi xue yanjiu zong hui (Beijing TCM-Biomedicine Association) on the 10th year of the reign of Xuan Tong (1910). These two volume books were originally part of the private collection of T.S. Goon. They are now part of my private collection.

Zhang Yong Yan, *Jianming gu hanyu zidian* [Concise dictionary of classical Chinese characters], Sichuan renmin chubanshe, Sichuan, 1986

Zhang You Juan, *Zhongguo anmo daquan* [A comprehensive book on traditional Chinese massage], Tianjin daxue chubanshe, Tianjin, 1991

Zhang Zhong Jing, *Zhong Jing quan shu* [Zhong Jing’s complete works], Qian xiang tang shu ju, Shanghai, 1934. This book was originally part of T.S. Goon’s private collection. It is now part of my private collection.

Zhang Yuan Su (Jin), *Yixue qiyuan* [Origins of medicine], Ren Ying Qiu (proof-reading and punctuation), Renmin weisheng chubanshe, Beijing, 1986

Zhao En Jian et al., *Zhongyi zhenghou zhenduan zhiliaoxue* [TCM clinical pattern diagnostics and therapeutics], Tianjin kexue jishu chubanshe, Tianjin, 1987

Zhao En Jian, *Zhongyi maizhen xue* [The TCM discipline of pulse examination], Tianjin kexue jishu chubanshe, Tianjin, 1990

Zhao Fen, *Zhongyi jichu lilun xiangjie*, [A detailed elucidation of TCM foundation theory], Fujian kexue jishu chubanshe, Fujian, 1981

Zhao Jin Xiang, *Zhongguo hexiangzhuang qigong* [Chinese Soaring Crane Qigong], Beijing Chubanshe, Beijing, 1987

Zhao Jin Xiang, *Zhongguo zizai qigong* [Chinese carefree Qigong], Xianggang Shanghai shuju, Hongkong, 1988

Zhao Pu Shan, *Zhongguo gudai yixue* [Ancient Chinese medicine 中國古代醫學], Zhonghua shuju, Beijing, 1997

Zhao Ji An, *Zhenjiu yaojue yu anmo shifa* [Secret of acupuncture and the ten methods in traditional Chinese massage], Zhao Yu Qing et al. (composition zhengli), Zhongyi guji chubanshe, Beijing, 1987

Zhe Jiang TCM College, *Wen bing tiao bian hai hua jie* [ Treatise on the clinical pattern differentiation and treatment of warm febrile diseases, translated into the vernacular], Renmin weisheng chubanshe, Beijing, 1981 edition of *Wen bing tiao bian*, written by Wu Ju Tong in 1798

Zhejiang Provincial TCM Research Centre, *Wen yi lun ping zhu* [Treatise on pestilence: evaluation and annotations ], Renmin weisheng chubanshe, Beijing, 1985 edition of *Wen yi lun*, written by Wu You Xing in 1642

Zheng Han, *‘Chong Lou Yayao Xu Pian’* [Sequel to the Key to the Layered Tower], in Qiu Qing
Yuan (ed.), *Mi Ben Yixue Congshu*, [Collection of secret medical texts, Vol. 10], Shanghai Book Store, Shanghai, 1804

Zheng Kui Shan, *Zhenjiu ji jin* [Collection of acupuncture brocade], Gansu renmin chubanshe, Lanzhou, 1981


Zhen Zhi Ya, *Zhongguo yixue shi, gong zhongyi, zhongyao, zhenjiu zhuanye yong* [History of Chinese Medicine, provided for use by TCM, material medica and acupuncture profession 中国医学史], Shanghai kexue jishu chubanshe, Shanghai, 1985

Zhong Xi Yi, *Zhongyi wuzhen wuqui xiwei* [A close analysis of errors in diagnosis and treatment in TCM], Sichuan kexue jishu chubanshe, Chengdu, 1989


Zhong Feng Wu et al., *Huangdi neijing suwen yu shi* [The Yellow Emperor's Inner Canons - plain questions: a translation into the vernacular], Shandong kexue jishu chubanshe, Shandong, 1985

Zhou Ji Ming et al. (compilers), *Zhongguo wenhua zhishi jinghua* [Quintessence of Chinese cultural knowledge], Hubei renmin chubanshe, Hubei, 1989

Zhu Jian Hua, *Zhongxi Yaowu xianghu zuoyong* [Mutual interaction between Chinese materia medica and Western pharmaceutical drugs], Renmin weisheng chubanshe, Beijing, 1991

Zhou Mei Sheng & Zhou Shu Dong (eds.), *Jin Zhen Mei Hua Shi Chao* [A Copy of a verse on the plum blossom golden needle], Anhui kexue jishu chubanshe, An Hui, 1982

Zhu Lian, *Xin zhenjiu xue* [A new study of acupuncture], Guangxi renmin chubanshe, Guangxi, 1980

Zhu Ru Gong et al., *Zhenjiu Shuxue Tu Pu* [A Collection of illustrations on acupoints], Shanghai kexue jishu chubanshe, Shanghai, 1988

Zhu Ya Feng et.al., *Zhongyao zhongchengyao jiedu shouce p* [A Chinese Materia medica and pre-formulated materia medica detoxification manual], Renmin junyi chubanshe, Beijing, 1991
Zhuang Zhou, *Zhuangzi shi yi* [Zhuang Zi, explication and translation], explication and translations by Ou Yang Chao et al., Hubei renmin chubanshe, Hubei, 1986
Minerva Access is the Institutional Repository of The University of Melbourne

Author/s:
TIQUIA, REY CALINGO

Title:
Traditional Chinese Medicine as an Australian tradition of health care

Date:
2004

Citation:

Publication Status:
Unpublished

Persistent Link:
http://hdl.handle.net/11343/35983

File Description:
Traditional Chinese Medicine as an Australian tradition of health care

Terms and Conditions:
Terms and Conditions: Copyright in works deposited in Minerva Access is retained by the copyright owner. The work may not be altered without permission from the copyright owner. Readers may only download, print and save electronic copies of whole works for their own personal non-commercial use. Any use that exceeds these limits requires permission from the copyright owner. Attribution is essential when quoting or paraphrasing from these works.