

**THE CANADIAN ALLIANCE OF REGULATORY BODIES FOR
TRADITIONAL CHINESE MEDICINE PRACTITIONERS
AND ACUPUNCTURISTS**

**BLUEPRINT FOR
THE PAN-CANADIAN CLINICAL CASE-STUDY
EXAMINATIONS FOR TRADITIONAL CHINESE
MEDICINE PRACTITIONERS, ACUPUNCTURISTS
AND HERBALISTS**

June 2013

TABLE OF CONTENTS

PREFACE	1
INTRODUCTION.....	2
Contextual Background.....	2
DEVELOPING OCCUPATIONAL COMPETENCIES	4
I. The Framework/Approach.....	4
II. The Process	4
III. Situating Occupational Competencies Assessed	5
ASSUMPTIONS	6
TECHNICAL SPECIFICATIONS.....	7
I. Structural Variables	7
a) Percentage of Examination Questions by Practice Areas	7
b) Examination Length, Format and Presentation.....	9
c) Percentage of Examination Questions by Category of Cognitive Ability	11
d) Scoring of Clinical Case-study Responses	12
II. Contextual Variables	14
a) Patient Demographics and Lifespan	14
b) TCM Illnesses.....	14
c) Practice Environment	14
LIST OF SUGGESTED REFERENCES	15
CONCLUSION	21
BIBLIOGRAPHY	22
APPENDIX A: Participants.....	23
APPENDIX B: Entry-Level Occupational Competencies	24
APPENDIX C: List of TCM Illnesses.....	33

PREFACE

The Canadian Alliance of Regulatory Bodies for Traditional Chinese Medicine Practitioners and Acupuncturists (CARB-TCMPA) is the national organization of provincial and territorial regulatory bodies that govern and monitor the practice of Traditional Chinese Medicine (TCM) Practitioners,¹ TCM Acupuncturists and/or TCM Herbalists.

The Pan-Canadian Clinical Case-study Examinations described in this *Blueprint* document are criterion-referenced assessments based on the occupational competencies that entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists must have to practise safely, effectively and ethically. These occupational competencies are outlined in the *Entry-Level Occupational Competencies for the Practice of Traditional Chinese Medicine in Canada*. These competencies are grouped into nine (9) practice areas: (1) Interpersonal Skills; (2) Professionalism; (3) Practice Management; (4) Traditional Chinese Medicine Foundations; (5) Fundamentals of Biomedicine; (6) Diagnostics and Treatment; (7) Acupuncture Techniques; (8) Herbal Dispensary Management; and (9) Safety. A full list of these occupational competencies by the nine practice areas is provided in Appendix B.

This *Blueprint* document has two major components: (1) the content domain (practice areas) to be measured and (2) explicit guidelines on how this content is to be measured. The content domain consists of the measurable competencies expected of entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists. The specific guidelines are expressed in terms of structural and contextual variables. The *Blueprint* also includes a list of suggested references for these national examinations.

CARB-TCMPA thanks all who contributed to the creation of this *Blueprint* document. In particular, CARB-TCMPA gratefully acknowledges the Government of Canada's Foreign Credential Recognition Program for funding this project. Additional appreciation is extended to the regulatory authorities and the members of the Blueprint Development Committee who collaborated with Assessment Strategies Inc. to produce this document (see Appendix A).

¹ Traditional Chinese Medicine (TCM) Practitioner is a restricted title that comprises the dual usage of acupuncture and herbology in the scope of practice.

INTRODUCTION

Contextual Background

The Canadian Alliance of Regulatory Bodies for Traditional Chinese Medicine Practitioners and Acupuncturists (CARB-TCMPA) is the national organization of provincial and territorial regulatory bodies that govern and monitor the practice of Traditional Chinese Medicine and Acupuncture. The current members of the CARB-TCMPA comprise of the following:

- College of Traditional Chinese Medicine Practitioners and Acupuncturists of British Columbia (CTCMA-BC);
- College and Association of Acupuncturists of Alberta (CAAA);
- Ordre des Acupuncteurs du Québec (OAQ);
- Transitional Council of the College of Traditional Chinese Medicine Practitioners and Acupuncturists of Ontario (TC-CTCMPAO); and
- College of Traditional Chinese Medicine Practitioners and Acupuncturists of Newfoundland and Labrador (CTCMPANL).

Each of these regulatory bodies is established by provincial/territorial law with a mandate to protect the public's right to safe, competent and ethical services offered by registered Doctors of Traditional Chinese Medicine (Dr. TCM), TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists who are members of the regulatory bodies.

The objectives of CARB-TCMPA are:

- To serve as the collective voice of the provincial and territorial regulatory bodies of TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists;
- To work collaboratively on common issues that impact on the regulation, safe and quality practices, education and training of TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists;
- To develop, implement and maintain programs of national interest;
- To develop mechanisms and programs to facilitate mobility of TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists in Canada; and
- To work with national and international agencies, where appropriate.

Since 2008, members of CARB-TCMPA have been working collaboratively on establishing common standards for the registration of qualified TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists. In May 2010, it completed the *Entry-Level Competencies for the Practice of Traditional Chinese Medicine in Canada* (Appendix B) and in July 2010, the *Pan-Canadian Standards for Traditional Chinese Medicine Practitioners and Acupuncturists: User Guide*. The framework and process used to develop these occupational competencies are outlined in the **Developing Occupational Competencies** section.

CARB-TCMPA, in consultation with its examinations provider, Assessment Strategies Inc., presents this *Blueprint* document with the purpose and intent of facilitating the development of reliable and valid examinations to assess fairly, in a consistent and transparent manner, the candidates applying for registration to practise as TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists in Canada.

The Pan-Canadian Clinical Case-study Examinations to be developed will use the same standards and processes to ensure safe, effective and ethical practice to evaluate both internationally-trained candidates and Canadian-trained candidates. **These national examinations are also meant to ensure quality standards and facilitate labour mobility across provinces.**

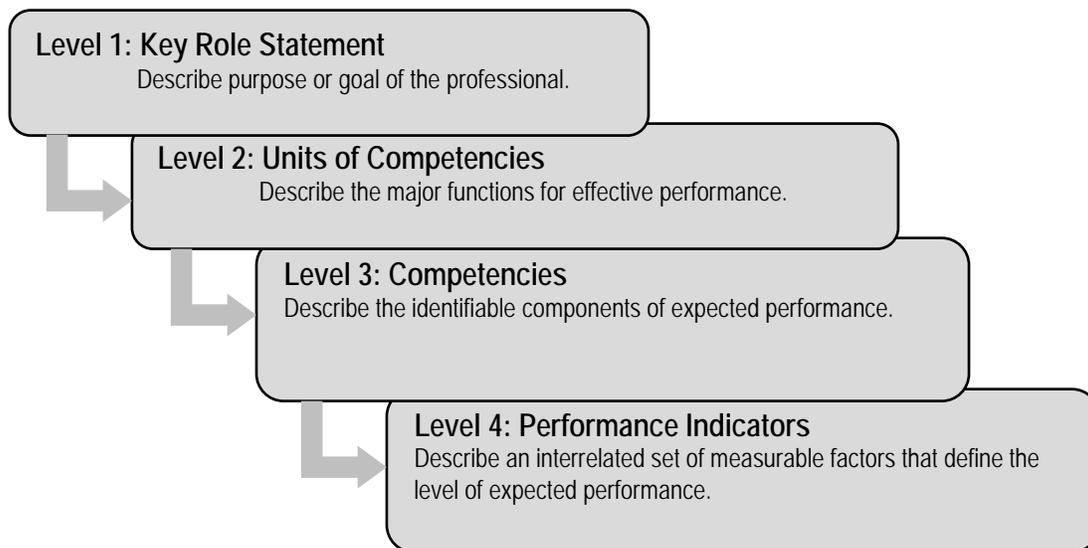
DEVELOPING OCCUPATIONAL COMPETENCIES

I. The Framework/Approach

There are several common approaches for the development of competency frameworks based on tasks, functional analysis or descriptions of roles (Raymond and Neustel, 2006). Each has its place in describing competence. What is most important in any competency framework is the completeness and accuracy of the description it provides.

The *Entry-Level Occupational Competencies for the Practice of Traditional Chinese Medicine in Canada* (Appendix B) is based on a functional analysis methodology. The functional analysis approach is an integrated method to competency development whereby competence is inferred from performance and the context sensitivity of diverse practice is recognized. The description of the area of competency is required to be relevant to the patient and clinical context and should move from a general to more specific delineation of the expected performance of a competent professional. Figure 1 presents how the varying levels of the framework are interrelated and described.

Figure 1: Levels of a functional analysis competency framework



II. The Process

The development process involved the identification of defined competencies by an interprovincial committee of experienced TCM Practitioners, Acupuncturists and educators. The committee utilized source documents from various countries describing TCM and acupuncture education and practice, as well as the expertise of its members. This was followed by surveys of practitioners in British Columbia, Alberta, Ontario, Quebec and Newfoundland & Labrador, to determine the extent to which the proposed competencies were deemed by practitioners to be important, frequently-used and appropriate as entry-level requirements.

The occupational competencies, provided in Appendix B, have been approved by the regulatory authority in each jurisdiction. They are intended to identify the knowledge, skills and abilities in which entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists should be able to coordinate and apply, in order to provide safe, effective and ethical practice.

III. Situating Occupational Competencies Assessed

Figure 2 situates the competencies that form the basis of the Pan-Canadian Clinical Case-study Examinations within the full complement of competencies for traditional Chinese medicine, acupuncture and/or herbology practice. The outer circle represents the competencies that are expected of TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists in general and may include competencies to be demonstrated by fully experienced professionals in the practice. The middle circle represents the competencies that the TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists at the entry-level are required to possess by regulatory authorities in order to practise safely, effectively and ethically. The inner circle represents the competencies assessed by the Pan-Canadian Clinical Case-study Examinations. Thus, the Pan-Canadian Clinical Case-study Examinations, described in this *Blueprint* document, focus on competencies that are measurable on written examinations using clinical case-study format as described in the **Technical Specifications** section.

Figure 2: Competencies assessed by the Pan-Canadian Clinical Case-study Examinations



ASSUMPTIONS

The following are the assumptions on which the Pan-Canadian Clinical Case-study Examinations are based and have been derived from the *Entry-Level Occupational Competencies for the Practice of Traditional Chinese Medicine in Canada* and other sources as provided in the bibliography.

1. Traditional Chinese Medicine (TCM) is a comprehensive body of knowledge that applies TCM theories to diagnose, treat and prevent illness using a variety of TCM methods/modalities.
2. The entry-level occupational competencies build and expand upon the developments required by traditional use, scientific advancements and social and legislative influence.
3. The entry-level occupational competencies are the foundation for all TCM professional practice and apply across diverse practice settings and patient populations.
4. TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists provide health-care services relating to health promotion and maintenance, illness, injury, prevention, rehabilitative care, curative and supportive care, and palliative and end-of-life care.
5. TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists may work in consultation/collaboration with other health-care providers to provide safe, high-quality patient-centred health-care services.
6. The competencies examined in the Pan-Canadian Clinical Case-study Examinations are directed toward the professional practice of entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists in Canada.
7. Entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists will practise in a manner consistent with their provincial/territorial regulatory body's professional practice standards, codes of ethics and scope of practice. They will also practice in compliance with applicable provincial/territorial and federal law and legislation.
8. The Pan-Canadian Clinical Case-study Examinations described in this *Blueprint* are not constrained by jurisdictional variations in scope of practice.
9. The implementation of the registration examinations will be determined by the individual provincial regulatory bodies. Successful completion of the Pan-Canadian Clinical Case-study Examinations does not constitute an automatic registration to practise.

TECHNICAL SPECIFICATIONS

I. Structural Variables

Structural variables include characteristics of the examination that determine its general design and appearance: weighting (percentage) of the occupational competencies by practice areas; format, question presentation and length of the exam; and taxonomy levels of cognitive ability upon which the exam cases focus. These specifications describe the important features of the national examinations described in this document and provide essential guidelines for how the occupational competencies will be measured using clinical case-study situations requiring open-ended candidate responses.

a) Percentage of Examination Questions by Practice Areas

The following tables provide the weighting (percentage) of occupational competencies by the nine (9) practice areas:

- 1) Interpersonal Skills
- 2) Professionalism
- 3) Practice Management
- 4) Traditional Chinese Medicine Foundations
- 5) Fundamentals of Biomedicine
- 6) Diagnostics and Treatment
- 7) Acupuncture Techniques
- 8) Herbal Dispensary Management
- 9) Safety

The numbering and sequencing of the occupational competencies provided in the second column correspond to the *Entry-Level Occupational Competencies for the Practice of Traditional Chinese Medicine in Canada* (Appendix B). It should be recognized that the competency statements vary in scope, with some representing global activities and others more discrete and specific to TCM actions. Examination questions will be developed based on these competency statements and be weighted in the examinations according to the following tables provided on the next pages.

- Table 1a: Weighting of Occupational Competencies by Practice Areas for the Pan-Canadian Clinical Case-study Examination for TCM Practitioners
- Table 1b: Weighting of Occupational Competencies by Practice Areas for the Pan-Canadian Clinical Case-study Examination for TCM Acupuncturists
- Table 1c: Weighting of Occupational Competencies by Practice Areas for the Pan-Canadian Clinical Case-study Examination for TCM Herbalists

Table 1a: Weighting of Occupational Competencies by Practice Areas for the Pan-Canadian Clinical Case-study Examination for TCM Practitioners

The Practice Areas	Numbering and Sequence of Occupational Competencies	Percentage
1. Interpersonal Skills	1.1, 1.2, 1.3	2 - 4%
2. Professionalism	2.1, 2.2, 2.3, 2.4	2 - 4%
3. Practice Management	3.1, 3.2	2 - 4%
4. Traditional Chinese Medicine Foundations	4.1, 4.2, 4.3, 4.4, 4.5	25 - 30%
5. Fundamentals of Biomedicine	5.1, 5.2, 5.3	7 - 10%
6. Diagnostics and Treatment	6.1, 6.2, 6.3, 6.4, 6.5, 6.6, 6.7, 6.8	27 - 32%
7. Acupuncture Techniques	7.1, 7.2, 7.3, 7.4, 7.5	3 - 6%
8. Herbal Dispensary Management	8.1, 8.2	7 - 10%
9. Safety	9.1, 9.2, 9.3, 9.4	7 - 10%

Table 1b: Weighting of Occupational Competencies by Practice Areas for the Pan-Canadian Clinical Case-study Examination for TCM Acupuncturists

The Practice Areas	Competency Codes	Percentage
1. Interpersonal Skills	1.1, 1.2, 1.3	3 - 5%
2. Professionalism	2.1, 2.2, 2.3, 2.4a,b, c, e	3 - 5%
3. Practice Management	3.1, 3.2	3 - 5%
4. Traditional Chinese Medicine Foundations (Acupuncture)	4.1, 4.2	23 - 28%
5. Fundamentals of Biomedicine	5.1, 5.2, 5.3	10 - 12%
6. Diagnostics and Treatment	6.1, 6.2, 6.3, 6.4a-e, 6.5, 6.7, 6.8	32 - 35%
7. Acupuncture Techniques	7.1, 7.2, 7.3, 7.4, 7.5	5 - 7%
8. Herbal Dispensary Management	Not Applicable	N/A
9. Safety	9.1a, 9.2, 9.3b-f, 9.4	8 -10%

Table 1c: Weighting of Occupational Competencies by Practice Areas for the Pan-Canadian Clinical Case-study Examination for TCM Herbalists

The Practice Areas	Competency Codes	Percentage
1. Interpersonal Skills	1.1, 1.2, 1.3	3 - 5%
2. Professionalism	2.1, 2.2, 2.3, 2.4a,b,d,e	3 - 5%
3. Practice Management	3.1, 3.2	3 - 5%
4. Traditional Chinese Medicine Foundations (Herbology)	4.1, 4.3, 4.4, 4.5	23 - 25%
5. Fundamentals of Biomedicine	5.1, 5.2, 5.3	10 - 12%
6. Diagnostics and Treatment	6.1, 6.2, 6.3, 6.4a-c, 6.4f-g, 6.6, 6.7, 6.8	32 - 35%
7. Acupuncture Techniques	Not Applicable	N/A
8. Herbal Dispensary Management	8.1, 8.2	10 - 12%
9. Safety	9.1b, 9.2, 9.3a-c, 9.4	5 - 7%

b) Examination Length, Format and Presentation

Length of examinations: As with the Pan-Canadian Written Examinations, there will be three Clinical Case-study Examination papers.

- **The Pan-Canadian Clinical Case-study Examination for TCM Practitioners.** The cases will assess foundations, diagnosis - TCM illness and syndrome differentiation, four inspections, etiology and pathogenesis, treatment principles, acupuncture treatment, herbal therapy and biomedical diagnosis and treatment considerations. [3 Hours]
- **The Pan-Canadian Clinical Case-study Examination for TCM Acupuncturists.** The cases will assess foundations, diagnosis -TCM illness and syndrome differentiation, four inspections, etiology and pathogenesis, treatment principles, acupuncture treatment, and biomedical diagnosis and treatment considerations. [2 Hours]
- **The Pan-Canadian Clinical Case-study Examination for TCM Herbalists.** The cases will assess foundations, diagnosis -TCM illness and syndrome differentiation, four inspections, etiology and pathogenesis, treatment principles, herbal therapy, and biomedical diagnosis, and treatment considerations and behavioral situations. [2 Hours]

Format: The Pan-Canadian Clinical Case-study Examinations will consist of 6 to 8 clinical case-study situations requiring open-ended candidate responses. For each case, the following presenting conditions may be provided:

- General patient information such as age, gender, occupation and marital status
- Main/Chief complaint (example, ability to quote clients own words)

- Patient medical history including previous illness, history of present illness, medications, supplements and allergies, surgical procedures, etc.
- Past medical history including medications, supplements and allergies
- Family medical history related to the current conditions
- Personal history such as lifestyle, diet, exercise, environmental factors
- Symptoms described by patient
- Information collected by practitioner to assess the patient

Each of the clinical case-study situations requiring open-ended candidate responses will be assessed based on the following six skill and knowledge areas: a) diagnosis - TCM illness and syndrome differentiation, b) etiology and pathogenesis, c) treatment principles, d) acupuncture treatment, e) herbal therapy and, f) biomedical diagnosis and treatment considerations.

Each of these six skill and knowledge areas are described below:

- Diagnosis: TCM illness and syndrome differentiation** - Candidates will be responsible for the formulation of TCM diagnosis based on the understanding of four inspections, etiology, pathology, and syndrome differentiation. Diagnosis includes the name of TCM illness, syndrome differentiation and reasons for diagnosis. *Questions may refer to, but are not limited to competencies outlined in 4, 6.2, 6.3*
- Etiology and pathogenesis (reason for diagnosis)** - Candidates will be responsible for explaining the pathogenic factors involved in development of the chief complaint and the pathogenic process producing the symptoms. In some cases explanation of the primary and secondary causes may be required. *Questions may refer to, but are not limited to competencies outlined in 4, 6.3*
- Treatment Principles** - Candidates will be expected to outline appropriate TCM principles of treatment (*zhi ze*) based on the diagnosis. This should serve as a guideline for treatment selection and rationale. *Questions may refer to, but are not limited to competencies outlined in 4, 6.4a*
- Acupuncture Treatment** - Candidates will be responsible for applying the fundamentals of acupuncture in developing the treatment plan. *Questions may refer to, but are not limited to competencies outlined in 6.4, 6.5, 6.8, 7, 9*
- Herbal Therapy**- Candidates will be responsible for applying the fundamentals of TCM in developing an herbal treatment plan. *Questions may refer to, but are not limited to competencies outlined in 4.3, 4.4, 6.4, 6.6, 6.7, 8, 9.1, 9.3*
- Related **biomedical diagnosis and treatment considerations and other behavioral situations** - Candidates will be responsible for identifying possible biomedical and other concerns, and outline appropriate clinical management. *Questions may refer to, but are not limited to competencies outlined in 1, 2, 3, 5.1, 5.2, 5.3, 9.3*

c) Percentage of Examination Questions by Category of Cognitive Ability

To ensure that the competencies are measured at different areas of cognitive ability, each question on the Pan-Canadian Clinical Case-study Examinations will be classified into one of three categories: knowledge, comprehension/application or analysis and interpretation.²

Table 2: Percentage of Scoring by the Category of Cognitive Ability

Categories of Cognitive Ability	Weighting of Scores
Knowledge	10-15%
Comprehension and Application	40-45%
Analysis and Interpretation	45-50%

Knowledge

The category focuses on performances that involve remembering information. It combines the ability to recall previously learned material with the ability to understand its meaning. It includes such cognitive abilities as knowing and understanding definitions, facts, concepts and principles (e.g., the ability to identify the principles of treatment).

Comprehension and Application

This category refers to the ability to apply knowledge and learning to new or practical situations. It reflects the ability of entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists to apply rules, methods, principles and theories in different scenarios (e.g., the ability to describe the treatment method for illness).

Analysis and Interpretation

This category focuses on performances that involve analyzing and interpreting information. It includes the ability of entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists to judge the relevance of data, to deal with abstractions and to use clinical reasoning and inquiry to solve problems (e.g., the ability to formulate and justify a treatment plan). Entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists should be able to identify cause-and-effect relationships, distinguish between relevant and irrelevant data, formulate valid conclusions and make judgments concerning the needs of patients.

Table 3 presents examples of performance indicators and common verbs that may be used as a guide when the examination questions based on cognitive abilities are constructed. These are examples and do not represent an exhaustive list.

² Classification system modified from Bloom, 1956.

Table 3: Examples of Descriptors and Common Verbs That May Be Used to Construct Examination Questions by Categories of Cognitive Ability

Cognitive Categories	Descriptors	Verbs for Use in Test Questions	
Knowledge	<ul style="list-style-type: none"> ▪ Recognizes or recalls ▪ Knows terms ▪ Knows methods and procedures ▪ Knows basic facts 	Defines Describes Identifies Labels	Matches Names Selects States
Comprehension and Application	<ul style="list-style-type: none"> ▪ Understands facts and principles ▪ Interprets verbal material ▪ Translates verbal material ▪ Applies concepts and principles to new situations ▪ Solves problems ▪ Applies laws and theories ▪ Constructs charts and graphs ▪ Correctly uses a method or procedure 	Converts Estimates Explains Generalizes Changes Computes Operates	Predicts Produces Relates Summarizes Infers Shows Solves
Analysis and Interpretation	<ul style="list-style-type: none"> ▪ Evaluates relevancy of data ▪ Recognizes assumptions ▪ Judges the adequacy from which conclusions are drawn ▪ Judges the value of findings ▪ Integrates from different areas ▪ Proposes a plan of action ▪ Formulates an approach by classifying events or objects 	Differentiates Relates Breaks down Categorizes Creates Compares Designs	Contrasts Explains Justifies Diagnoses Relates Concludes

d) Scoring of Clinical Case-study Responses

Depending the components of the questions, candidate response will be scored on a scale ranging from 0 (inaccurate response) to 4 marks (complete and accurate response). Partial marks may be awarded, where applicable, for accurate but incomplete responses. The scoring of the response will be aligned to the difficulty of the questions as well as the stated expected competencies as described in Table 4 below.

Table 4: Aligning the Level of Difficulty and Expected Performances

Maximum Marks	Level of difficulty and expected performances
4 marks	These will questions with higher level of difficulty requiring some explanation in a few sentences or multiple answers; these questions may require using knowledge and skills from two or more topics (e., formulating a prescription).
2-3 marks	These will be questions with medium difficulty requiring identification of general principles (e.g., point selection within given theory, principle treatment, syndrome differentiation, important symptoms, naming classic formula.
1 mark	These will be questions relatively easy (low difficulty) requiring 1-2 word responses where one answer possible (i.e., TCM illness, depth of insertion).

Generally, no marks are deducted for incorrect spelling (unless knowledge of the exact terminology is explicitly being tested). Also, in cases where there is more than one way to express the correct response, alternate wording of the correct response is deemed acceptable. The scoring key may include examples of acceptable alternate wording, usually in brackets alongside the correct response element. This helps guide the markers in determining the equivalency of terms or in interpreting the scoring key for situations in which a potential for misinterpretation exists. All candidate responses will be scored by experienced and trained subject matter experts (e.g., TCM practitioners, acupuncturists, herbalists, educators) using the chain-marking system. That is, once the candidates' test books are received, they will be photocopied and then collated according to the marking session guidelines. First, candidates' responses to each of the questions are independently hand scored by two subject matter experts and second, any discrepancies between the two scores are discussed to ensure that all candidates' responses are fairly and objectively scored.

II. Contextual Variables

Contextual variables qualify the content domain by identifying the contexts in which the examination questions will be set. They include patient demographics and lifespan, TCM illnesses and practice environment.

a) Patient Demographics and Lifespan

The Pan-Canadian Clinical Case-study Examinations may include questions pertaining to individuals, families and groups such as populations and communities.

The Pan-Canadian Clinical Case-study Examinations will include questions related to lifespan, from preconception through to advanced age, including end of life. Questions will reflect health situations relevant to the different phases of life.

b) TCM Illnesses

The Pan-Canadian Clinical Case-study Examinations will include questions pertaining to the TCM illnesses, including but not limited to the following.

- Internal Medicine (Nei Ke)
- External Medicine (Wai Ke)
- Obstetrics and Gynecology (Fu Ke)
- Pediatrics (Er Ke)
- Orthopedics and Traumatology (Gu Shang Ke)

Appendix D provides the list of TCM illnesses. These classifications are derived from historical literature and are not meant to correspond to traditional classifications of biomedicine.

c) Practice Environment

The practice environment for the TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists can be any setting or circumstance within the scope of practice defined by provincial and territorial legislation and regulation. For the purposes of the Pan-Canadian Clinical Case-study Examinations, the practice environment will be specified only where it is required in order to provide guidance to the candidate in responding to the examination question.

LIST OF SUGGESTED REFERENCES

The Blueprint Development and the Examination Committees suggest that the following references, although not exhaustive, may be helpful to the examination committee for the development of questions and to candidates in preparation for the registration examination. The examination committee and candidates are also encouraged to consult other relevant and authoritative references. For convenience the suggested references have been grouped into five categories.

- 1) Foundations/Diagnosis
- 2) Clinical Practice/Treatment
- 3) Acupuncture
- 4) Herbology/Formulas
- 5) Biomedicine and Other Related Areas (e.g., by-laws, safety)

1. Foundations/Diagnosis

Kirschbaum, B. (2000). *Atlas of Chinese tongue diagnosis*. Seattle, WA: Eastland Press. (ISBN: 0-939616-3-5)

Liu, Z. W., & Liu, L. (2009). *Essentials of Chinese medicine* (Volumes 1, 2, 3). Beijing University of Chinese Medicine and School of Chinese Medicine, Baptist University, Hong Kong: Springer.

Maciocia, G. (1987). *Foundations of Chinese medicine*. Edinburgh, UK: Churchill Livingstone, Roberts Stevenson House. (ISBN: 0-443-03980-1)

Maciocia, G. (1999). *Tongue diagnosis in Chinese medicine* (Revised ed.). Washington, DC: Eastland Press. (ISBN: 978-0939616190)

Maciocia, G. (2004). *Diagnosis in Chinese medicine-A comprehensive guide*. Churchill Livingstone. (ISBN: 0-443-06448-2)

Maciocia, G. (2005). *The foundations of Chinese medicine: A comprehensive text for acupuncturists and herbalists* (2nd ed.). Philadelphia: Elsevier Churchill Livingstone.

Maoshing, N. (2002). *The yellow emperor's classic of medicine* (A new Translation of the Neijing Suwen). Boston: Shambhala Publications Inc.

Shanghai College of Traditional Chinese Medicine. *Coloured diapositives of tongue diagnosis in Traditional Chinese Medicine* (2nd ed.). Author.

Wang, B. (2000). *Yellow Emperor's cannon: Internal medicine*. China Science and Technology Press. (ISBN 7-5046-2231-1)

- Wang, G. (2002). *Diagnostics of traditional Chinese medicine*. Shanghai University of TCM.
- Wiseman, N. (1996). *English Chinese/Chinese English Dictionary of Chinese Medicine*. Human Science & Technology Press.
- World Health Organization. (2007). *International standard terminologies on traditional medicine in the Western Pacific Region*. Author.
- Wu, C. (2009). *Basic theory of traditional Chinese medicine*. Shanghai University of TCM.
- Zang, E. J. *Treatise of febrile diseases caused by cold (Shang Han Lun)*. New World Press. ISBN: 9787801878496
- Zhonging, Z. (1996). *Treatise of febrile diseases caused by cold (Shang Han Lun)*. New World Press.
- Zhen, L. S. (1985). *Pulse diagnosis*. Translated by Hoc Ku Huynh. Brookline, MA: Paradigm Publications. (ISBN: 0-912111-06-2)

2. Clinical Practice/Treatment

- Cen, Z. B. (1984). *TCM Traumatology*. Shanghai Science and Technique Press. (ISBN 7-5323-0313-6)
- Shanghai University of Traditional Chinese Medicine. (2003). *Internal medicine of traditional Chinese medicine*. Shanghai University of TCM.
- Maciocia, G. (1998). *Obstetrics & gynecology in Chinese medicine*. New York: Churchill Livingstone.
- Maciocia, G. (2007). *The practice of Chinese medicine: Treatment of diseases with acupuncture and Chinese herbs* (2nd ed.). Churchill Livingstone.
- MacLean, W., & Lyttleton, J. (2000). *Clinical handbook of internal medicine* (Vol. 1 & 2). Sydney, Australia: University of Western Sydney.
- Yanfu, Z. (2002). *Pediatrics of traditional Chinese medicine*. Shanghai University of TCM.
- Prichford, P. (2002). *Healing with whole food: Asian tradition and modern nutrition* (3rd ed.). North Atlantic Books.
- Li, S. (2002). *Surgery of traditional Chinese medicine*. Shanghai University of TCM.
- Huang, G. (2003). *Traumatology & orthopedics of traditional Chinese medicine*. Shanghai University of TCM.

- Wang, X. (2003). *Life cultivation and rehabilitation of traditional Chinese medicine*. Shanghai University of TCM.
- Yue, W., et al. (2002). *Internal medicine of TCM*. Shanghai University of TCM. (ISBN 7-81010-660-0)
- Zuo, Y. (2002). *Gynecology of TCM*. Shanghai University of TCM.

3. Acupuncture

- Auteroche, B. et al. (1992). *Acupuncture & moxibustion: A guide to clinical practice*. Churchill Livingstone.
- Bensky, D., & O'Connor, J. (1996). *Acupuncture: A comprehensive text*. Shanghai College of Traditional Medicine. Seattle, WA: Eastland Press.
- Cheng, X. (Ed). (2005). *Chinese acupuncture and moxibustion* (2nd ed.). Beijing: Foreign Languages Press.
- Cheng, X. (Ed). (2010). *Chinese acupuncture and moxibustion* (3rd ed.). Beijing: Foreign Languages Press.
- Chirali, L. Z. (2007). *Traditional Chinese medicine cupping therapy* (2nd ed.). Churchill Livingstone.
- Deadman, P., Baker, K. et al. (1998). *A manual of acupuncture*. Washington, DC: Eastland Press. (ISBN: 0951054678)
- Deadman, P., Mazin, A.-K., & Baker, K. (2001). *A manual of acupuncture*. East Sussex, England: Journal of Chinese Medicine.
- Deadman, P., Mazin, A.-K., & Baker, K. (2007). *A manual of acupuncture*. East Sussex, England: Journal of Chinese Medicine.
- Li, Z. (2002). *Chinese acupuncture and moxibustion*. Shanghai University of TCM.
- Li, Z. (2002). *Chinese Tuina (massage)*. Shanghai University of TCM.
- Mao-Liang, Q., & Shan-chen, Z. et al. (1993). *Chinese acupuncture and moxibustion*. Longman Singapore Publishers Ltd.
- Mao-Liang, Q., & Shan-chen, Z. (2004). *Chinese acupuncture and moxibustion*. Longman Singapore Publishers Ltd.

- Nielsen, A. (1995 – Updated 2012). *Guasha-A traditional technique for modern practice*. Churchill Livingstone.
- World Health Organization. (1991). *Proposed standard international acupuncture nomenclature*. Author.
- Xinnong, C. (Chief Ed.). (1999). *Chinese acupuncture and moxibustion*. (Revised ed.). Foreign Language Press Beijing. (ISBN: 7-119-01758-6)
- Xinnong, C. (Chief Ed.). (2005). *Chinese acupuncture and moxibustion* (2nd ed.) Foreign Language Press Beijing. (ISBN: 7-119-01758-6)
- Xinnong, C. (Chief Ed.). (2010). *Chinese acupuncture and moxibustion* (3rd ed.) Foreign Language Press Beijing.
- Zhang, E. (1990). *Chinese acupuncture and moxibustion*. Shanghai College of Traditional Chinese Medicine.

4. Herbology/Formulas

- Bensky, D. et al. (2009). *Chinese herbal formulas and strategies* (2nd ed.). Eastland Press.
- Bensky, D. et al. *Practical traditional Chinese medicine & pharmacology*. Medicinal Herbs by Chinese Herbal Medicine Materia Medica.
- Bensky, D., Clavey, S., Stoger, E., & Gamble, A. (2004). *Chinese herbal medicine materia medica* (3rd ed.). Seattle, WA: Eastland Press.
- Bensky, D., & Gamble, A. (2005). *Chinese herbal medicine materia medica* (Revised ed.). Eastland Press. (ISBN 0-939616-15-7)
- Bensky, D., & Gamble, A. (1991). *Chinese herbal medicine: Formulas & strategies*. Eastland Press. (ISBN 0-939616-10-6)
- Chen, J. K., & Chen, T. T. (2008). *Chinese herbal formulas and applications*. City of Industry, CA: Art of Medicine Press, Inc.
- Chen, J. K., Chen, T. T., & Crampton, L. (2004). *Chinese medical herbology & pharmacology*.
- Fan, Q. (2003). *Science of prescriptions*. Shanghai University of TCM.
- Fratkin, J. P. (2001). *Chinese herbal patent medicines: The clinical desk reference*. Boulder, CO: Shya Publications.
- Jilin, L. (1995). *Chinese dietary therapy*. Churchill Livingstone.

- Ming, O. (1993). *Chinese English manual of commonly used prescriptions in traditional Chinese medicine*. Guangdong Science and Technology Publishing House.
- Ming, O. (2002). *Chinese English manual of commonly used herbs in traditional Chinese medicine*. Guangdong Science and Technology Publishing House.
- The Pharmacopoeia Commission of the Ministry of Health of the People's Republic of China. (2005). *Pharmacopoeia of the Peoples' Republic of China I*. Volume 1, 2, 3.
- Scheid, V., Bensky, B., Ellis, A., & Barolet, R. (2009). *Chinese herbal medicine: Formulas and strategies* (2nd ed.). Seattle, WA: Eastland Press.
- Tang, D. (Ed.). (2003). *Science of Chinese Materia Medica*. Shanghai University of TCM.
- Sperber, G., & Flaws, B. (2007). *Integrated pharmacology combining modern pharmacology with Chinese medicine*. Boulder, CO: Blue Poppy Press.
- Yang, Y. (2009). *Chinese herbal medicines. Comparisons and characteristics* (2nd ed.). Churchill Livingstone.

5. Biomedicine and Other Related Areas

- Beers, M. H. (Ed.). (2006). *The Merck manual of diagnosis and therapy* (18th ed.). Whitehouse Station, NJ: Merck Research Laboratories.
- Berkow, R. et al. (1992). *The Merck manual* (16th ed.). Merck & Co., Inc.
- Bickley, L. S. (2008). *Bates guide to physical examination and history taking* (10th ed.). Philadelphia: Lippincott Williams & Wilkins Publishers.
- Canadian Pharmacists Association. (2012). *Compendium of pharmaceuticals and specialties*. Ottawa: Author.
- Chaitow, L. (1997). *Palpations skills: Assessment and diagnosis through touch*. Churchill Livingstone.
- Chan, K., & Cheung, (2003). *Interactions between Chinese herbal medicinal products and orthodox drugs*. Taylor and Francis Group.
- Coulehan, J. L., & Block, M. R. (2001). *The medical interview: Mastering skills for clinical practice* (5th ed.). Philadelphia: F. A. Davis Company.
- Hoppenfeld, S. (1976). *Physical examinations of the spine extremities*. Prentice Hall.

- Lloyd, M., & Bor, R. (2004). *Communication skills for medicine*. Churchill Livingstone. (ISBN: 0-443-07411-9)
- National Acupuncture Foundation. (2004). *Clean needle technique manual for acupuncturists, guidelines and standards for a clean and safe clinical practice of acupuncture* (5th ed.). Author.
- National Acupuncture Foundation. (2009). *Clean needle technique manual for acupuncturists, guidelines and standards for a clean and safe clinical practice of acupuncture* (6th ed.). Translation by Caplin, CT: Author.
- Netter, F. (2010). *Atlas of human anatomy* (5th ed.). Ciba-Geigy Corporation.
- Sherwood, L. (2008). *Human physiology* (7th ed.). Brooks Cole.
- Tortora, G. J., Funke, B. R., & Case, C. L. (2011). *Microbiology: An introduction*. Benjamin Cummings.
- Tortora, G. J., & Neilsen, M. (2011). *Principles of human anatomy* (12th ed.). Mississauga, ON: Wiley.
- World Health Organization. (2007). *Guidelines for assessing quality of herbal medicines with reference to contaminants and residues*. Author.

CONCLUSION

The *Blueprint for the Pan-Canadian Clinical Case-study Examinations for Traditional Chinese Medicine Practitioners, Acupuncturists and Herbalists* is the product of a collaborative effort between the aforementioned regulatory authorities and the TCM Practitioners and TCM Acupuncturists that served as Blueprint Development Committee members. Their efforts have resulted in the assimilation of the competencies required for entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists into guidelines for how these competencies will be measured on national examinations using the multiple-choice format.

It is recognized that TCM, acupuncture and herbology practice will continue to evolve. As this occurs, this *Blueprint* document (i.e., the test development guidelines) will require revision to accurately reflect the scope of practice, roles and responsibilities of the entry-level TCM Practitioners, TCM Acupuncturists and/or TCM Herbalists. The guidelines for the national examinations provided in this document will be regularly reviewed and revised to ensure relevance to TCM and acupuncture practice, to respond to changes in the Canadian health-care environment, progress in evidence-based knowledge and changing Canadian demographics. CARB-TCMPA, in consultation with its examination provider, Assessment Strategies Inc., will ensure that such necessary revisions take place.

BIBLIOGRAPHY

- Bloom, B. S. (Ed.). (1956). *Taxonomy of educational objectives, handbook I: The cognitive domain*. New York: David McKay Company, Inc.
- Canadian Alliance of Regulatory Bodies for TCM Practitioners and Acupuncturists. (May 2010). *Entry-level occupational competencies for the practice of traditional Chinese medicine in Canada*.
- Canadian Alliance of Regulatory Bodies for TCM Practitioners and Acupuncturists. (July 2010). *Pan-Canadian standards for traditional Chinese medicine practitioners and acupuncturists: User guide*.
- College and Association of Acupuncturists of Alberta. (May 2012). *Provincial registration examination for acupuncturists in Alberta: 2012 candidate handbook*.
- College of Traditional Chinese Medicine Practitioners and Acupuncturists of British Columbia. (2012). *TCM competency examination in British Columbia – Part I acupuncture: Candidate handbook*.
- College of Traditional Chinese Medicine Practitioners and Acupuncturists of British Columbia. (2012). *TCM competency examination in British Columbia – Part II herbology: Candidate handbook*.
- Raymond, M. R., & Neustel, S. (2006). Determining the content of credentialing examinations. In S. M. Downing & T. M. Haladyna (Eds.), *Handbook of test development*. Mahwah, NJ: Lawrence Erlbaum Associates.

APPENDIX A: Participants

Organizations Participating in the Competency/Blueprint Development Project

- College of Traditional Chinese Medicine Practitioners and Acupuncturists of British Columbia
- College and Association of Acupuncturists of Alberta
- Ordre des Acupuncteurs du Québec
- Transitional Council of the College of Traditional Chinese Medicine Practitioners and Acupuncturists of Ontario
- College of Traditional Chinese Medicine Practitioners and Acupuncturists of Newfoundland and Labrador

Members of the Blueprint Development Committee

- Jeffrey Liu, British Columbia
- Harris Fisher, British Columbia
- Weijia Tan, British Columbia
- Don Fan, Alberta
- Peggy Yu, Alberta
- Joanne Pritchard-Sobhani, Ontario
- Terry Hui, Ontario
- James Fu, Ontario
- Ethne Munden, Newfoundland
- Raymond Bourret, Quebec

Staff and Consultants

- Charles Mayenga, ASI
- Carole Dazé, ASI
- Allan Mak, CTCMPAO

APPENDIX B: Entry-Level Occupational Competencies

The occupational competencies are grouped into the following practice areas.

1. Interpersonal Skills
2. Professionalism
3. Practice Management
4. Traditional Chinese Medicine Foundations
5. Fundamentals of Biomedicine
6. Diagnostics and Treatment
7. Acupuncture Techniques
8. Herbal Dispensary Management
9. Safety

Within each practice area, the occupational competencies are identified as:

- **Common:** applicable to both acupuncture and herbology;
- **Acupuncture:** unique to the practice of acupuncture; and
- **Herbology:** unique to the practice of herbology.

Occupational Competencies		Common	Acupuncture	Herbology
1. Interpersonal Skills				
1.1	Utilize professional communication.			
a	Speak effectively, using appropriate terminology.	✓		
b	Write effectively, using appropriate terminology.	✓		
c	Comprehend written information.	✓		
d	Comprehend information presented orally.	✓		
e	Ensure effectiveness of communication.	✓		
f	Communicate with professional integrity.	✓		
g	Respond to non-verbal communication.	✓		
h	Respond to sources of interpersonal conflict.	✓		
1.2	Develop and maintain effective interprofessional relationships.			
a	Work cooperatively in an interdisciplinary health-care setting.	✓		
b	Develop productive working relationships.	✓		
1.3	Develop and maintain effective relationships with patients.			
a	Show respect toward patients as individuals.	✓		
b	Exhibit compassion toward patients.	✓		
c	Maintain practitioner/patient boundaries.	✓		

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
d	Facilitate honest, reciprocal communication.	✓		
e	Encourage patient to take responsibility for his/her health.	✓		
2. Professionalism				
2.1	Comply with legal requirements.			
a	Apply to practice current, relevant federal and provincial/territorial legislation.	✓		
b	Apply to practice current requirements of regulatory body.	✓		
c	Apply to practice current, relevant requirements of municipal and other local authorities.	✓		
2.2	Practice in a manner that accords patient dignity and reflects patient rights.			
a	Ensure that patient is aware of treatment plan, its benefits and risks.	✓		
b	Ensure ongoing, informed consent.	✓		
c	Respect patient rights to privacy and confidentiality.	✓		
d	Terminate course of treatment when appropriate.	✓		
2.3	Maintain practitioner self-care.			
a	Maintain personal health and wellness in the context of professional practice.	✓		
b	Exhibit professional deportment.	✓		
2.4	Practice with professional integrity.			
a	Practice within limits of expertise.	✓		
b	Modify practice to enhance effectiveness.	✓		
c	Exhibit professional behaviour.	✓		
d	Remain current with developments in acupuncture practice.		✓	
e	Remain current with developments in TCM herbology practice.			✓
3. Practice Management				
3.1	Maintain patient records.			
a	Ensure complete and accurate records.	✓		
b	Ensure security and integrity of records.	✓		
3.2	Utilize effective business strategies			
a	Ensure sound financial management.	✓		

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
b	Employ ethical business practices.	✓		
c	Establish office procedures and supervise staff accordingly.	✓		
4. Traditional Chinese Medicine Foundations				
4.1	Apply fundamental knowledge of the following Traditional Chinese Medicine principles in diagnosis and treatment.			
a	<i>yin yang</i>	✓		
b	<i>wu xing</i> (five elements)	✓		
c	<i>zang xiang</i> (organ theories)	✓		
d	<i>jing-luo & shu xue</i> (channels, collaterals and acupuncture points)	✓		
e	<i>qi, xue, jin ye, jing & shen</i> (<i>qi</i> , blood, body fluid, essence, spirit)	✓		
f	<i>ti zhi</i> (constitution)	✓		
g	<i>bing yin</i> (etiology)	✓		
h	<i>bing ji</i> (pathogenesis)	✓		
i	<i>yu fang</i> (prevention)	✓		
j	<i>zhi ze</i> (principles of treatment)	✓		
k	<i>yang sheng</i> (health preservation)	✓		
4.2	Apply fundamentals of acupuncture in diagnosis and treatment.			
a	Characterize the following points:			
	i <i>jing xue</i> (points of the 14 channels)		✓	
	ii <i>jing wai qi xue</i> (extra points)		✓	
b	Apply knowledge of the following special groupings of points, in treatment planning:			
	i <i>wu shu xue</i> (five transporting points)		✓	
	ii <i>yuan xue</i> (source points)		✓	
	iii <i>luo xue</i> (connecting points)		✓	
	iv <i>xi xue</i> (cleft points)		✓	
	v <i>bei shu xue</i> (back <i>shu</i> points)		✓	
	vi <i>mu xue</i> (front/ <i>mu</i> points)		✓	
	vii <i>xia he xue</i> (lower sea points)		✓	
	viii <i>ba mai jiao hui xue</i> (eight confluent points)		✓	

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
ix	<i>ba hui xue</i> (eight meeting [influential] points)		✓	
x	<i>zi mu xue</i> (mother/child points)		✓	
xi	<i>jiao hui xue</i> (channel crossing points)		✓	
xii	<i>a shi xue</i> (<i>ah shi</i> points)		✓	
xiii	ear and scalp acupuncture		✓	
c	Select points for assessment.		✓	
d	Select points or areas for therapy.		✓	
e	Select stimulation techniques.		✓	
f	Apply knowledge of precautions and contraindications for application of stimulation techniques.		✓	
g	Apply knowledge of:			
i	<i>tui na/an mo</i> (acupressure)		✓	
ii	<i>qi gong/tai ji</i>		✓	
iii	<i>gua sha</i>		✓	
4.3	Apply knowledge of the following properties and functions of TCM herbs in treatment planning:			
a	<i>si qi</i> (four properties)			✓
b	<i>wu wei</i> (five flavours)			✓
c	<i>sheng jiang fu chen</i> (ascending, descending, floating, sinking)			✓
d	<i>gui jing</i> (channel tropism)			✓
e	actions			✓
f	indications			✓
g	toxicity			✓
h	<i>pao zhi</i> (processing of herbs)			✓
4.4	Apply knowledge of herbal formulating strategies, with reference to:			
a	composition of formula			✓
b	modification of formula			✓
c	functions & classifications			✓
d	combinations & compatibility			✓

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
e	dosage form & methods of administration			✓
f	dosage			✓
g	potential adverse effects			✓
h	contraindications & precautions			✓
4.5	Apply knowledge of the following herb interactions in treatment planning:			
a	herb – drug interactions			✓
b	herb – herb interactions			✓
c	herb – food interactions			✓
d	herb – natural health product interactions			✓
5. Fundamentals of Biomedicine				
5.1	Apply basic biomedical concepts to TCM practice.			
a	human anatomical structures	✓		
b	biochemical processes	✓		
c	control mechanisms	✓		
d	infectious diseases and infection control	✓		
e	dysfunctions and common diseases	✓		
5.2	Relate biomedical diagnostic and treatment approaches to TCM practice.			
a	diagnosis and treatment methods	✓		
b	pharmacology	✓		
5.3	Integrate TCM and biomedical concepts.			
a	Relate biomedical information concerning patient's condition and treatment to TCM state of health.	✓		
b	Communicate TCM diagnostic and treatment information for use by other health-care workers, and to third parties.	✓		
6. Diagnostics and Treatment				
6.1	Establish priorities for assessment and treatment planning.			
a	Identify chief complaint.	✓		
b	Initiate assessment based upon chief complaint.	✓		
c	Recognize conditions that require urgent medical treatment and direct patient appropriately.	✓		
d	Modify assessment strategy based upon emerging information.	✓		

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
e	Initiate collaboration, consultation or referral as appropriate.	✓		
6.2	Assess patient.			
a	Collect information using <i>wang zhen</i> (TCM diagnostic inspection method).	✓		
b	Collect information using <i>wen zhen</i> (TCM diagnostic inquiry method).	✓		
c	Collect information using <i>wen zhen</i> (TCM diagnostic auscultation and olfaction methods).	✓		
d	Collect information using <i>qie zhen</i> (TCM diagnostic palpation method).	✓		
e	Measure vital signs.	✓		
f	Conduct relevant non-invasive physical examination.	✓		
6.3	Analyze assessment information.			
a	Organize and interpret the collected information using the following TCM syndrome differentiation methods:	✓		
	i <i>ba gang bian zheng</i> (eight principles differentiation)	✓		
	ii <i>zang-fu bian zheng</i> (organ theory differentiation)	✓		
	iii <i>wu xing bian zheng</i> (five elements differentiation)	✓		
	iv <i>san jiao bian zheng</i> (triple warmer differentiation)	✓		
	v <i>wei qi ying xue bian zheng</i> (four levels differentiation)	✓		
	vi <i>liu jing bian zheng</i> (six stages differentiation)	✓		
	vii <i>qi xue jin ye bian zheng</i> (qi, blood, body fluid differentiation)	✓		
	viii <i>bing yin bian zheng</i> (pathogenic factors differentiation)	✓		
	ix <i>jing luo bian zheng</i> (meridian differentiation)	✓		
b	Incorporate information obtained from biomedical diagnostic data and medical and health history.	✓		
c	Make TCM diagnosis.	✓		
6.4	Establish treatment plan based on diagnosis.			
a	Determine treatment goals and strategies.	✓		
b	Take into account precautions and contraindications.	✓		
c	Adapt treatment according to patient characteristics and needs.	✓		
d	Select appropriate points, point combinations and/or treatment areas.		✓	

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
e	Select appropriate course of acupuncture treatment and therapeutic modalities.		✓	
f	Devise applicable TCM herbal formula.			✓
g	Devise appropriate course of herbal treatment.			✓
6.5	Provide acupuncture treatment.			
a	Adapt clinical setting to enhance comfort and safety.		✓	
b	Position patient for treatment.		✓	
c	Locate selected points on patient.		✓	
d	Apply treatment techniques.		✓	
e	Monitor and respond to patient condition during treatment.		✓	
6.6	Implement herbal treatment plan.			
a	Instruct patient on accessing TCM herbal formula.			✓
b	Instruct patient on administration of TCM herbal formula.			✓
6.7	Monitor effectiveness of treatment plan and modify where necessary.			
a	Evaluate effectiveness of treatment plan on an ongoing basis.	✓		
b	Modify treatment plan to enhance effectiveness.	✓		
6.8	Educate and counsel patient.			
a	Explain etiology and pathogenesis of condition.	✓		
b	Explain TCM concepts as they apply to patient condition.	✓		
c	Inform patient of possible side effects and reaction to treatment.	✓		
d	Advise patient on <i>yu fang</i> and <i>yang sheng</i> (prevention and health preservation).	✓		
e	Counsel patient on compliance with treatment recommendations.	✓		
7. Acupuncture Techniques				
7.1	Perform needling.			
a	Perform filiform needling.		✓	
b	Perform dermal (plum blossom, seven star) needling.		✓	
c	Perform intradermal tack needling.		✓	
d	Perform three edge needling.		✓	
7.2	Perform moxibustion.			

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
a	Perform direct moxibustion.		✓	
b	Perform indirect moxibustion.		✓	
c	Perform needle warming moxibustion.		✓	
7.3	Perform treatment utilizing supplementary devices.			
a	Perform stimulation using heat lamps.		✓	
b	Perform stimulation using electro-acupuncture devices.		✓	
7.4	Perform cupping.		✓	
7.5	Perform <i>tui na</i>.		✓	
8. Herbal Dispensary Management				
8.1	Maintain herbal inventory.			
a	Identify appropriate supply for herbs.			✓
b	Assess quality of herbs with reference to:			
	i packaging			✓
	ii labelling			✓
	iii physical properties			✓
	iv available quality assurance information			✓
c	Store herbs in appropriate conditions, including:			
	i environment			✓
	ii security			✓
	iii monitoring			✓
d	Maintain records with respect to inventory.			✓
8.2	Prepare and dispense herbal formulas.			
a	Verify formula information is clear, complete and accurate.			✓
b	Verify availability of components and confirm substitution if required.			✓
c	Confirm identity of components.			✓
d	Compound formula.			✓
e	Apply packaging.			✓
f	Apply labelling.			✓

Pan-Canadian Clinical Case-Study Examinations

Occupational Competencies		Common	Acupuncture	Herbology
g	Provide instructions for storage and use.			✓
h	Maintain dispensing records.			✓
9. Safety				
9.1	Evaluate patient risk profile.			
a	Determine risk profile relative to acupuncture treatment.		✓	
b	Determine level of risk relative to TCM herbal treatment.			✓
9.2	Provide a safe working environment.			
a	Maintain current knowledge of communicable diseases and infection control techniques.	✓		
b	Apply universal precautions for infection control.	✓		
c	Ensure effective supervision of staff and/or students.	✓		
d	Inspect facilities on a regular basis for electrical hazards, fire risk and physical hazards that may cause accidents, and take action to minimize.	✓		
e	Establish procedures and route for emergency evacuation of facilities.	✓		
f	Establish procedures to maximize protection of self, staff and patients in the event of abusive or violent behaviour.	✓		
9.3	Manage risks to patients.			
a	Include safety precautions in herbal treatment plan.			✓
b	Manage adverse reactions and accidents resulting from treatment.	✓		
c	Respond appropriately to medical emergencies.	✓		
d	Manage blood-to-blood contact and provide direction for post exposure follow-up.		✓	
e	Clean spills of blood and other body fluids.		✓	
f	Control and extinguish small fires.		✓	
9.4	Ensure that equipment is safe and functional.			
a	Select equipment that enhances patient safety.	✓		
b	Maintain equipment in good working order.	✓		
c	Clean and equipment regularly, and disinfect as appropriate.	✓		

APPENDIX C: List of TCM Illnesses

	Internal Medicine (Nei Ke)
1	abdominal mass (ji ju)
2	abdominal pain (fu tong)
3	atrophy-flaccidity (wei zheng)
4	bleeding disorders (xue zheng)
5	chest impediment (xiong bi)
6	common cold (gan mao)
7	constipation (bian bi)
8	consumptive disease (xu lao)
9	consumptive thirst (xiao ke)
10	convulsive syndromes (jing zheng)
11	cough (ke shou)
12	depression (yu zheng)
13	diarrhea (xie xie)
14	drum distension (gu zhang)
15	dysentery (li ji)
16	dysphagia occlusion syndrome (ye ge)
17	dyspnea (chuan zheng)
18	edema (shui zhong)
19	epigastric pain (wei tong)
20	epilepsy (xian zheng)
21	fainting (jue zheng)
22	goitre (ying bing)
23	headache (tou tong)
24	hiccupping and belching (e ni)
25	hypochondrial pain (xie tong)
26	impediment syndrome (bi zheng)
27	impotence (yang wei)
28	insomnia (bu mei)
29	internal damage fever (nei shang fa re)
30	ischuria (long bi)
31	jaundice (huang dan)
32	lumbago (yao tong)
33	lung distention (fei zhang)
34	malaria (nue ji)
35	mania (dian kuang)
36	palpitation (xin ji)
37	pulmonary abscess (fei yong)
38	pulmonary tuberculosis (fei lao)

Pan-Canadian Clinical Case-Study Examinations

39	seminal emission (yi jing)
40	spontaneous sweats, night sweats (zi han, dao han)
41	stranguria (lin zheng)
42	tinnitus and deafness (er ming er long)
43	vertigo (xuan yun)
44	vomiting (ou tu)
45	watery phlegm/sputum (tan yin)
46	wheezing syndrome (xiao zheng)
47	wind stroke (zhong feng)
External Medicine (Wai Ke)	
48	acne (fen ci)
49	acute mastitis (ru yong)
50	alopecia areata (you feng)
51	anal fissure (gang lie)
52	bedsore (ru chuang)
53	boil (ding chuang)
54	breast cancer (ru yan)
55	breast lump (ru pi)
56	carbuncle (yong)
57	contact dermatitis (jie chu xing pi yan)
58	digital gangrene (tuo ju)
59	drug rash (yao wu xing pi yan)
60	eczema (shi chuang)
61	erysipelas (dan du)
62	furuncle (jie)
63	goitre (ying)
64	hemorrhoid (zhi)
65	herpes zoster (she chuan chuang)
66	phlegmon (fa)
67	prostatic hyperplasia (qian lie xian zeng sheng zheng)
68	prostatitis (qian lie xian yan)
69	scrofula (luo li)
70	sebaceous cyst (zhi liu)
71	shank ulcer (lian chuang)
72	tinea (xian)
73	urticaria (yin zhen)
74	varicose veins (jin liu)
75	warts (you)
Obstetrics and Gynecology (Fu Ke)	
76	abdominal masses (zheng jia)
77	amenorrhea (bi jing)
78	bleeding during pregnancy, unstable pregnancy (tai lou, tai dong bu an)
79	dysmenorrhea (tong jing)

80	infertility (bu yun)
81	insufficient breastmilk (que ru)
82	intermenstrual bleeding (jing jian qi chu xue)
83	irregular menstruation (yue jing bu tiao)
84	leukorrhagia (dai xia)
85	lochiorrhea (chan hou e lu bu jue)
86	menstrual breast aching (jing xing ru fang zhang tong)
87	menstrual edema (jing xing fu zhong)
88	menstrual headache (jing xing tou tong)
89	menstrual hematemesis and epistaxis (jing xing tu niu)
90	menstrual mental disorder (jing xing qing zhi yi chang)
91	menstrual oral ulcer (jing xing kou mei)
92	metrorrhagia and metrostaxis (beng lou)
93	miscarriage (zhui tai, xiao chan, hua tai)
94	morning sickness (ren chen e zu)
95	perimenopausal syndrome (jue jing qian hou zhu zheng)
96	postpartum abdominal pain (chan hou fu tong)
97	postpartum convulsion (chan hou jing zheng)
98	postpartum dizziness (chan hou xue yun)
99	postpartum fever (chan hou fa re)
100	postpartum retention of urine (chan hou pai niao yi chang)
101	uterine prolapse (yin ting)
	Pediatrics (Er Ke)
102	anorexia (yan shi)
103	asthma (xiao chuan)
104	chang dao chong zheng (intestinal parasitic worms)
105	chickenpox (shui dou)
106	common cold (gan mao)
107	convulsions (jing feng)
108	cough (ke shou)
109	diarrhea (xie xie)
110	enuresis (yi niao)
111	epilepsy (xian zheng)
112	erysipelas (chi you dan)
113	fetal jaundice (tai huang)
114	food retention (ji zhi)
115	malnutrition (gan zheng)
116	measles (ma zhen)
117	mumps (zha sai)
118	pneumonia (fei yan ke sou)
119	purpura (zi dian)

Pan-Canadian Clinical Case-Study Examinations

120	retardation and flaccidity (wu chi wu ruan)
121	rubella (feng sha)
122	scarlatina (dan sha)
123	sweating (han zheng)
124	thrush (e kou chuang)
125	whooping cough (dun ke)
126	infantile edema (xiao er shui zhong)
Orthopedics and Traumatology (Gu Shang Ke)	
127	Achilles tendon injury (gen jian sun shang)
128	acute lumbar muscle sprain (yao bu niu cuo shang)
129	bone fracture (gu zhe)
130	calcaneodynia (gen tong zheng)
131	carpal tunnel syndrome (wan guan zong he zheng)
132	cervical spondylosis (jing zhui bing)
133	frozen shoulder (jian guan jie zhou wei yan)
134	ganglionic cyst (jian qiao nang zhong)
135	joint dislocation (tuo wei)
136	knee joint collateral ligament injury (xi guan jie ce fu ren dai sun shang)
137	lumbar muscle strain (yao bu lao sun)
138	meniscal injury (ban yue ban sun shang)
139	prolapse of lumbar intervertebral disc (yao zhui jian pan tu chu zheng)
140	piriformis syndrome (li zhuang ji zong he zhang)
141	sprained ankle (huai guan jie niu cuo shang)
142	strained neck (luo zhen)
143	tennis elbow (hong gu wai shang ke yan)