Achieving Cardiovascular Health Through Continuing Interprofessional Development

David M. Kaufman, EdD,1 Jacqueline McClaran, MD,2 Millicent Toombs, MHA,3 Sue Beardall, MHSc,3 Isra Levy, MD,3 Arun Chockalingam, PhD 4

Cardiovascular disease remains Canada’s number one health problem. The health care system can no longer support the disease model as its rationale, as cost to the system and cost in human suffering can no longer be contained in this model. As with most western nations, Canada’s success rate leaves much room for improvement in the promotion of cardiovascular health and healthy cardiovascular lifestyles, and prevention of cardiovascular disease. Continued focus on the inevitable results (i.e., disease care) simply repeats the past performance of developing nations in which millions of dollars were poured into the treatment of malaria, but no one stopped to drain the swamp. The rhetoric of Canadian health promotion must be put into practice.

The thesis of this paper is that incorporating professional education specialists as essential members of interprofessional health care and health promotion teams will improve the effectiveness of the health care system and promote true empowerment of patients and the public. Education specialists can provide tools and best practices for bringing about behaviour change in health professionals and their patients, utilizing the most effective continuing interprofessional development (CID) interventions. These multifaceted interventions are based on change theory and are necessary for the integration of health promotion oriented to the practice site. A “stage” model of behaviour change is then introduced, which has shown positive results in promoting healthy lifestyles in patients and may provide an important link in improving health outcomes. Figure 1 shows the essence of the argument being made in this paper.

To achieve behaviour change in health providers, their patients and the public, particular expertise is required from educational specialists. Necessary knowledge and skills include such things as: practical approaches to changing practice; helping professionals enhance and measure behavioural modification skills in patients; measuring and enhancing motivation to learn and change; designing, delivering and evaluating interventions; and knowledge of the shared agendas of health promotion and public health.

These ideas are applied to the field of cardiovascular health promotion by describing specific actions recommended by the national intersectoral partnership, Achieving Cardiovascular Health in Canada (ACHIC). ACHIC advocates the integration of health promotion into the health care system and the achievement of healthy patient lifestyles. In order to accomplish this, the ACHIC partnership has incorporated expertise in education and CID. Further, to develop skills in teamwork, and professional skills leading to behaviour change in patients, expertise is needed in CID beyond traditional continuing education in the health professions.

A B S T R A C T
In order to achieve cardiovascular health for all Canadians, the ACHIC (Achieving Cardiovascular Health in Canada) partnership advocates that health promotion for healthy lifestyles be incorporated into practice, and that the consistent messages and professional skills required to motivate patients and the public be acquired through interprofessional education and development. Professional education specialists are essential members of health care promotion teams with expertise to develop educational interventions that impact behaviours of health professionals and subsequent patient outcomes. Continuing medical education (CME) is in evolution to continuing professional development (CPD), and then to continuing interprofessional development (CID). Providers of health promotion, public health, and health care can work with health educators to complete the cascade of learning, change in practice, and improvement in patient outcomes. The Canadian health care system can empower Canadians to achieve cardiovascular health, the most important health challenge in the 21st century.

A B R É G É
Afin d’assurer la santé cardiovasculaire pour tous les Canadiens, l’Initiative RSCC (Réaliser la santé cardiovasculaire au Canada) propose que les intervenants de la santé intègrent la promotion d’un mode de vie sain dans leur pratique. RSCC propose également que ces intervenants acquièrent, par le biais de l’éducation et du développement interprofessionnel, une approche cohérente et des expériences professionnelles leur permettant de motiver les patients et le public. Les spécialistes en éducation professionnelle représentent des partenaires essentiels au sein des équipes qui promouvoient la santé, car ils sont en mesure de développer des interventions éducatives permettant de modifier les comportements des professionnels de la santé et par conséquent d’avoir un impact sur la santé des patients. Le système de l’éducation médicale continue (EMC) évolue actuellement vers le développement professionnel continu (DPC) puis vers le développement interprofessionnel continu (DIC). Les intervenants qui promeuvoient la santé, qui œuvrent à la santé publique, et qui fournissent des soins peuvent collaborer avec des éducateurs de la santé afin de compléter la boucle d’apprentissage, opérer un changement dans la pratique, et ultimement améliorer la santé des patients. Il est possible pour le système de santé canadien de donner à la population canadienne le pouvoir de réaliser sa santé cardiovasculaire, le plus grand défi en matière de santé du 21e siècle.

1. Division of Medical Education, Dalhousie University, Halifax, NS
2. McGill Centre for Continuing Medical Education, Montreal, Qc, and Co-Chair, ACHIC Partnership
3. Canadian Medical Association, Ottawa, ON
4. Centre for Chronic Disease Prevention and Control, Health Canada, Ottawa, ON, and Co-Chair, ACHIC Partnership

Name of department & institution to which the work should be attributed: ACHIC (See Appendix A for full list of partners), CMA Secretariat, Attn: Millicent Toombs, Canadian Medical Association, 1867 Alta Vista Drive, Ottawa, ON K1G 3Y6

Correspondence and reprint requests: Dr. David M. Kaufman, Professor & Director, Faculty Development, Division of Medical Education, Clinical Research Centre (C115), Dalhousie University, Halifax, NS B3H 4H7, Tel: 902-494-1260

This work was in part funded by a Health Canada grant to the Achieving Cardiovascular Health in Canada (ACHIC) partnership administered by the Canadian Medical Association ACHIC secretariat. ACHIC is a national intersectoral partnership for improving cardiovascular lifestyles of Canadians through improved practice.
ACHIEVING CARDIOVASCULAR HEALTH

BACKGROUND

The previous article in this insert described ACHIC, a national intersectoral partnership for improving cardiovascular lifestyles of Canadians through improved practice. ACHIC resolved to determine how continuing professional education theory, structure, practice and research could be incorporated into ACHIC strategies, and what structures are required to allow continuing interprofessional education to go forward to impact practice. Using a collaborative model, ACHIC identified consistent messages that are key to healthy cardiovascular lifestyles for patients and the public, and suitable for interprofessional practice and education for health professionals and health educators.

To implement the national agenda of cardiovascular health promotion, ACHIC favours high quality interprofessional collaboration and teamwork at the heart of clinical practice, using a patient- or client-centred approach. ACHIC identifies as necessary to its mission:

- interprofessional education for health care providers that is focused on patient communication and professional behaviour modification skills to help patients to achieve healthy cardiovascular lifestyles;
- consistent messages across professions about the definitions of healthy cardiovascular lifestyles in the context of Canadian health status;
- collaboration with experts, providers and researchers in the fields of continuing education in the health professions in interprofessional partnerships for cardiovascular health promotion;
- systems change that encourages continuing education experts to provide the national educational network required for interprofessional development in cardiovascular health promotion.

ACHIC advocates that experts, providers and researchers in the field of continuing education in the health professions should develop educational interventions suitable for interprofessional learning and development, and should identify formative experiences appropriate to a patient-centred approach to cardiovascular health promotion.

Further, ACHIC identified existing tools and clinical practice guidelines for the promotion of healthy cardiovascular lifestyles. It selected the Healthy Heart Kit (HHK) as most suitable because the kit includes a broad range of modifiable risk factors, focusing on healthy lifestyles that patients and the public could achieve through behaviour modification. The HHK is a clinical tool providing the basis for “consistent messages” to patients, from all health professions in clinical practice. ACHIC proposes that evidence-based clinical tools such as the HHK be employed as educational tools, defining the content of patient-centred cardiovascular health promotion and adaptable to interprofessional learning and development. Educators and health promotion specialists could use the HHK as the basis of educational interventions and outcomes research because there is evidence that the very clinical pathways and practice guidelines that identify effective practice can be used as effective educational tools.

ACHIC is working with educators to provide clear perspectives on adult learning and change theory that will permit the health promotion sector to collaborate effectively with educational providers and researchers. Success will be measured by the degree to which behaviour modification skills specific to cardiovascular health are inserted into practice by multiple professions, and by the achievement of healthy cardiovascular lifestyles by patients.

"It is quite obvious that any traditional preventive program, primary or secondary, that tries to influence CVD incidence will need to include knowledge and techniques for behavior change, and consider the interactions between physiological and behavioral effects that are so commonly present."

This will require a national education and continuing professional development (CPD) network to enhance practice. At present, such a network exists only for continuing medical education (CME) based in medical schools at universities. The Canadian university-based CME network must be harnessed by educators in the health professions to assure health promotion in practice for Canada’s number one priority – cardiovascular health.

From CME to CPD to CID: A primer on the evolution of continuing education in the health professions for intersectoral health promotion

CME is the scope of educational activities used to improve competencies of practicing physicians. CME is an evolving field seated both in academic environments and
in the private sector where it has become big business, an important division in most health provider firms. In the past ten years or so, the scope of activities that constitute CME has broadened considerably and newer interventions have increased CME’s effectiveness. Literature evaluating the effectiveness of CME is extensive and when examined as a body of evidence, it tells us that formal CME interventions can change physician knowledge and skills.\textsuperscript{8,13} Two influential papers constitute the most comprehensive systematic reviews of CME effectiveness completed to date.\textsuperscript{8,13} Davis and his colleagues concluded that “physical performance may be altered by many CME interventions and, to a lesser extent, so may health care outcomes.”\textsuperscript{8,13} Oxman and colleagues identified the following types of CME interventions: 1) educational materials; 2) conferences, lectures, workshops, trainee ships; 3) outreach visits; 4) local opinion leaders; 5) patient-mediated interventions; 6) audit and feedback; 7) reminders; 8) marketing; 9) multifaceted interventions; and 10) local consensus processes.\textsuperscript{13} New research in CME has begun to extend our knowledge; for example, recent research has begun to re-examine the role and influence of opinion leaders, called ‘educational influencers’.\textsuperscript{15,16} These physicians now need to be employed in systematic interventions to determine their impact on the practice of their peers.

ACHIC has learned from analyzing the evidence-based literature to date that even a unidisciplinary CME approach can effect change in physician behaviour, and in some cases this can lead to improved patient outcomes. However, providers of CME need to follow the principles of best practice in order to achieve success. Guidelines for effective CME have been developed for providers through consideration of educational principles, expert opinion, and conclusions from research on CME interventions.\textsuperscript{17,18} These guidelines can be summarized as follows: 1) conduct an appropriate needs assessment; 2) use a planning process involving target audience representatives from program inception to completion; 3) state clear learning objectives; 4) use appropriate educational strategies, i.e., practice-based and multi-faceted; 5) incorporate principles of adult learning.\textsuperscript{19,20} The above principles can apply to continuing education in other health professions (e.g., nursing, pharmacists), although most research on these principles has been carried out with physicians.

From CME to CPD

ACHIC also recognizes that it is even more important that the definition of CME be broadened to include all interventions with physicians that provide professional development toward behaviour modifications in practice. Toward this end, several CME writers have called for the broadening of the concept of CME. The term “continuing professional development” (CPD) has been suggested by British educators.\textsuperscript{21} These authors contend that CPD is grounded in principles of reflective practice and is more effective than traditional CME in sustaining relevance, coherence and progression of professional learning. CPD includes the scope of educational activities used to enhance growth and competence of physicians, but is not limited to conventional education. CPD parallels the continuing quality improvement movement in that feedback and practice monitoring methods are inherent to the process. Sitting on an audit committee would be an example of learning and development that stems from activities not necessarily intended to be educational.

Grant also advocates replacing the term “continuing medical education” by the term “continuing professional development” because: 1) topics that doctors study are wider than medical issues; 2) learning is increasingly shared with other members of the health care team; 3) there is a need for education to be linked with performance enhancement; and 4) the government (UK) intends to develop a framework for CPD in health services that can apply to all health professions.\textsuperscript{22}

In Canada, the Royal College of Physicians and Surgeons of Canada (RCPSC) recently published its Maintenance of Certification Guidelines, entitled “Information Guide for Fellows”.\textsuperscript{23} This refers to a framework for CPD which extends beyond traditional CME. It includes subject matter which goes beyond traditional medical themes, such as patient-doctor communication, interdisciplinary team skills, risk management, as well as competencies defined by
ACHIEVING CARDIOVASCULAR HEALTH

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>CME (traditional)</th>
<th>CID</th>
</tr>
</thead>
<tbody>
<tr>
<td>Knowledge type</td>
<td>Specialized</td>
<td>Generic</td>
</tr>
<tr>
<td>Knowledge constructed by</td>
<td>Individual experts</td>
<td>Communities of practitioners</td>
</tr>
<tr>
<td>Knowledge source</td>
<td>Deficit identified</td>
<td>Professional practice</td>
</tr>
<tr>
<td>Continuing education</td>
<td>Training, determined by experts</td>
<td>Active, self-directed learning</td>
</tr>
<tr>
<td>Instructional methods</td>
<td>Typically didactic and/or classroom-based</td>
<td>Practice-based, multi-faceted, focused on behaviour change</td>
</tr>
<tr>
<td>Place of theory</td>
<td>Imported to practice (decontextualized, depersonalized, value-free)</td>
<td>Grounded in professional practice, traditions, values</td>
</tr>
<tr>
<td>Type of learning</td>
<td>Fragmented, isolated, individualized</td>
<td>Interactive, cross-disciplinary, multilevel</td>
</tr>
<tr>
<td>Learning in groups</td>
<td>Unprofessional (physicians)</td>
<td>Interprofessional</td>
</tr>
<tr>
<td>View of professionalism</td>
<td>Dependency on experts</td>
<td>Empowerment, right to know</td>
</tr>
<tr>
<td>Access to knowledge</td>
<td>Owned by professional elites, closed to non-professionals</td>
<td>Open to non-professional audiences, lay participation</td>
</tr>
<tr>
<td>Model of evaluation</td>
<td>Scientific/experimental</td>
<td>Participatory/illuminative</td>
</tr>
</tbody>
</table>

* Adapted from Brigley et al., 1996; p. 24.

From CPD to CID

ACHIC advocates that health promotion for healthy cardiovascular lifestyles be incorporated into practice, and that the consistent messages and professional skills required to motivate patients and the public be acquired via interprofessional education and development. As an interprofessional partnership, ACHIC promotes the notion that effective CPD needs to include various health professionals and educators. Although an interprofessional approach is not necessary for every patient encounter or episode of illness, it is facilitatory to the behaviour modification necessary to achieve lifestyle changes for improved cardiovascular health. Fortunately, CME is in transition to CPD, but another step is needed by experts working in continuing education in the health professions in order to implement an interprofessional approach. Table I suggests the next step, which is to extend professional development activities to include various members of the health care team. In other words, this would mean extending CPD to CID. Table I contrasts the traditional CME discussed earlier with our proposed CID approach.

It should be noted that the principles listed above for effective CME also apply to effective CID. The continuing education literature calls for multidisciplinary forums for all health professions. This collaborative learning has been referred to in several ways in the literature: transdisciplinary, multidisciplinary, interdisciplinary, and interprofessional. Fitzpatrick provides a nice set of definitions for these terms, which she points out have been used interchangeably. The term “interprofessional” is used in this paper as it has come to be used increasingly in recent literature.

CID educational activities can be categorized into two types: 1) activities that focus on effective clinical practice, i.e., improving health care delivery to patients, and 2) activities that address the issues involved in collaboration and teamwork. The former activities have been described earlier as forms of CME. Their complexity increases when they are provided to health teams rather than individual health professionals. CID implies a collaborative team process for learning and working in the service of the patient and wider community, and can facilitate intersectoral collaboration for health promotion, as was discovered by ACHIC.

Thus, interprofessional collaboration has become an essential skill for all health care professionals. In this regard, a major study in Ontario concluded that among the highest of priorities for future physicians is to be able to understand and work effectively with other health providers. The study found widespread dissatisfaction in all groups with the effectiveness of physicians in relating to other health care providers. The authors suggested that patients’ needs could be better met by placing greater emphasis on shared values and beliefs, and blurring the somewhat arbitrary boundaries between various health providers. This recommendation is supported by the findings of McClaran and her colleagues, in a study of educational experience designed to improve a collaborative team function and improve case management in busy clinical settings including medical wards and university hospitals. Consonant valuing (shared values and beliefs) of components of care by multiple health professions facilitated learning for all professional groups. The authors suggest that this consonance of values may permit educators to develop universal educational packages adaptable to a variety of cultures, settings, health care systems, and team members.

Interprofessional teams can take many forms. Four such forms have been referred to as sequential, primary, nuclear and dynamic. The intervention needs to fit the process used by the team to provide care in a particular setting. Achieving the lifestyle changes for the promotion of cardiovascular health in Canadians will require interprofessional learning and working together that must be tailored to the needs of a community.

Several writers have discussed the characteristics of interprofessional collaboration and teamwork. Several key issues need to be addressed, such as the nature of the...
care setting, team membership, roles of team members, reporting relationships, team structure (discussed above), and operating procedures. The characteristics of high quality interprofessional collaboration and teamwork have been described by Headrick et al. and are shown in Table II.32 These provide a close match with the practice-based educational interventions described earlier in this paper.

There are several benefits of effective interprofessional collaboration and teamwork,32-37 however, several elements are required for effective CID. These include: 1) a well-functioning health care team, using an appropriate organizational structure; 2) high-quality CID activities that address both the content – e.g., clinical competencies, clinical practice guidelines, achieving patient adherence – and the process – e.g., improving the functioning of the health care team; 3) agreement on the consistent messages to be given to patients and to the community at large; and 4) sustained action on the political level to redirect the health care system towards a health promotion rather than disease-oriented model. This will result in changes to reimbursement policies for all health professions. The focus of this article has been on the second point above which refers to high-quality CID activities. The goal of these activities is to increase professional competence by improving the quality of interventions made by health professionals. This ultimately will result in improved patient and population outcomes. This evolution of CME to CPD and CID parallels the evolution of health promotion towards practice-based change for multiple professionals. ACHIC asserts that interprofessional collaboration in learning and working is essential if we are to achieve behavior modification in health professionals, their patients and the public. This section has argued for this collaboration and has touched upon the elements required for its success. However, the question of how these changes will be effected remains.

Transtheoretical model of behaviour change

The transtheoretical model provides a framework for delivering health promotion at the practice site. ACHIC supports the application of this model of behaviour change, which has been applied successfully in the disease prevention and health promotion arenas.38 Positive results have been reported for the elimination of negative behaviours identified as risk factors – particularly smoking – as well as for the development of positive behaviours, such as physical exercise.39 This model holds much promise for assisting CID providers in changing the behaviour of health professionals, and for interprofessional teams working in health promotion with their patients.

The transtheoretical model has recently begun to receive attention in the literature on education in the health professions.40 It attempts to address the inconsistent results in changing professional behaviour and to suggest a new approach. This model is based on a view that change occurs as a series of five stages through which the health professional as an adult learner progresses (and recycles). At each stage, the individual’s readiness to change behaviour is altered and a new system of beliefs develops. The five stages are: 1) precontemplation – no perceived need or intention to change is present; 2) contemplation – there is awareness of the problem and consideration of change, but no commitment to take action; 3) preparation for action – the individual begins to make plans (intention); 4) action – the individual takes action to modify his/her behaviour, which requires significant time and effort (< 6 months); and 5) maintenance of change – efforts are made to sustain change over the long term (6-12 months). Individuals may encounter relapses and recycle through some of the stages. However, there is evidence that all stages must be passed through.

The most promising practice tool currently available to achieve successful health

---

**TABLE II**

Characteristics of High Quality Interprofessional Collaboration and Teamwork*

<table>
<thead>
<tr>
<th>Collaboration</th>
<th>Teamwork</th>
</tr>
</thead>
<tbody>
<tr>
<td>Attainable, evolving shared vision</td>
<td>Direction is clear.</td>
</tr>
<tr>
<td>Clear, shared objectives</td>
<td>Goals and objectives are stated, restated and reinforced.</td>
</tr>
<tr>
<td>Mutual support</td>
<td>Member roles and tasks are clear and known.</td>
</tr>
<tr>
<td>Effective participation</td>
<td>Atmosphere is respectful.</td>
</tr>
<tr>
<td>Task orientation</td>
<td>Responsibility for team success is shared among members.</td>
</tr>
<tr>
<td>Information and appropriate management structures</td>
<td>Member participation is balanced appropriately to task at hand.</td>
</tr>
<tr>
<td>Support for innovation</td>
<td>Conflict is acknowledged and processed.</td>
</tr>
</tbody>
</table>

promoting in the area of cardiovascular health is the HHK, which is based on the transtheoretical model. 

The use of this practice tool could provide a focus for assessing an individual’s readiness to change, and for providing effective and consistent messages to support this change. However, further research needs to be conducted to develop CID interventions based on the kit, to render it an effective educational tool. ACHIC proposes to conduct applied research studies, using the HHK with interprofessional teams in various settings with health care providers and their patients. In this way, CID can help achieve the vision of cardiovascular health for all Canadians through lifestyle modification, using an evidence-based tool at the practice site which is based on a conceptual model of behaviour change.

CONCLUSIONS

The ACHIC partnership has evolved a new vision of cardiovascular health promotion that proposes a paradigm shift in health care from a focus on death and disability to one of health and empowerment for all Canadians. ACHIC has shown that the education and health sectors can be empowered to work together to realize the goals of health promotion and disease prevention. ACHIC recognizes that CID through the transtheoretical model can ensure that ACHIC’s “consistent messages” are shared across professions, thereby contributing to interprofessional education and development.

This paper has argued that health professionals collaboratively working together for patient-centred health promotion implies learning and developing together. CID activities and methods enhance skill-building not only in terms of the content of health promotion, but also in terms of the process of high-quality interprofessional collaboration and teamwork (how best to learn and work together) – the key to “consistent messages.”

Models of collaboration and team organization may vary (e.g., rural-urban, university hospital to small group private practice). CID interventions will need to flow from the particular composition, structure and mandate of each particular health care team. ACHIC asserts that failure to achieve intersectoral collaboration with experts in CID will continue to impede advancement of health promotion and render ineffective devices such as CPGs, care maps, and enabling tools such as the HHK. The challenges and solutions to effective interprofessional collaboration have been outlined in this paper.

While the basic education principles apply – e.g., use of adult learning principles, use of practice site interventions – new research questions need to be addressed about the transfer of effective interventions from a single to multispecialty setting and to teams forged from the move to regionalization and capitation. There is a significant body of knowledge and skill around interventions to change attitudes and behaviours. These tools and approaches can be put to use, with accompanying research and education studies to increase effectiveness of each professional and of the team in helping patients achieve a healthy cardiovascular lifestyle. Educational approaches such as the transtheoretical model, and practical clinical guideline tools such as the HHK, can assist in these endeavours. This is a rich field for research and many unanswered questions remain on the theoretical and applied levels. ACHIC advocates that further study be conducted to design educational modules for interprofessional use, to test their impact on knowledge, skills, and attitudes and to determine if CID can improve quality of care while containing costs.

"...the impact of transdisciplinary education...with actual health care teams remains unknown; and receptivity of teams to learning in their existing multidisciplinary teams remains unknown, as does impact on care and patient outcomes.”

CID providers have expertise to empower health professionals to work and learn together to achieve knowledge, skills, and attitudes for health promotion to adapt cognitive-behavioural approaches required to improve patient and population lifestyles. ACHIC and other intersectoral partnerships aimed at improved health status cannot achieve these objectives without educational expertise. CID theorists, providers and researchers must take their place in the health promotion movement. University-based CME structures affiliated with medical schools need to expand their mandate to serve all health professionals, to focus on priority national agendas, and to become instruments to help integrate health promotion into practice. Various intervention models will need to be tested and evaluated in specific interprofessional team settings, using existing tools based on behaviour change principles, e.g., HHK. Together, health promotion and CID health professionals can complete the cascade of learning, retention, assimilation, change in practice, and improvement in patient outcomes. In this way, the Canadian health care system and health promotion agencies will be effective in empowering Canadians to achieve cardiovascular health, the most important health challenge in the 21st century.

ACKNOWLEDGEMENTS

The authors wish to acknowledge Ms. Millicent Toombs for her helpful comments on an earlier draft of this paper.

The authors would also like to thank ACHIC members, contributors and consultants for expertise and energy devoted to the development of these viewpoints: Mr. Owen Adams, Ms. Sue Beardall, Dr. Ellen Burgess, Dr. Norm Campbell, Mr. Robert Carrier, Dr. Anne Carter, Ms. Cathy Ann Casault, Dr. Arun Chockalingam, Dr. Ruth Collins-Nakai, Ms. Janet Cooper, Mrs. Sue Cousineau, Dr. Gilles Dagenais, Dr. Véronique Déry, Dr. Rhona Hanning, Ms. Carol Harkness, Dr. Steve Hotz, Dr. David Kaufman, Dr. Kathryn King, Dr. Isra Levy, Ms. Brenda Loveridge, Dr. David MacLean, Dr. Lydia Makrides, Dr. Jacqueline McClaran, Dr. Andrew Pipe, Ms. Pat Reller, Ms. Carol Rochefort, Dr. John Service, Dr. Mark Smilovich, Ms. Dorothy Strachan, Ms. Barbara Straus, Mr. Guy Tanguay, Dr. Greg Taylor, Mr. William Tholl, Ms. Millicent Toombs, Ms. Brenda Trepanier, Dr. Peter Vaughan, Dr. Elinor Wilson.

The authors also express their gratitude to Ms. Rosemarie Canonico for her tireless efforts to ensure that the process was completed by way of corresponding with all parties concerned.
Appendix A

List of ACHIC Participants

<table>
<thead>
<tr>
<th>Acronym</th>
<th>Full Name of Organization</th>
</tr>
</thead>
<tbody>
<tr>
<td>CACR</td>
<td>Canadian Association of Cardiac Rehabilitation</td>
</tr>
<tr>
<td>CCCN</td>
<td>Canadian Council of Cardiovascular Nurses</td>
</tr>
<tr>
<td>CCS</td>
<td>Canadian Cardiovascular Society</td>
</tr>
<tr>
<td>CAHERD</td>
<td>Canadian Association for Health, Physical Education, Recreation, and Dance</td>
</tr>
<tr>
<td>CCHBPPC</td>
<td>Canadian Coalition for High Blood Pressure Prevention and Control</td>
</tr>
<tr>
<td>CFPC</td>
<td>College of Family Physicians of Canada</td>
</tr>
<tr>
<td>CHHI</td>
<td>Canadian Heart Health Initiative</td>
</tr>
<tr>
<td>CHS</td>
<td>Canadian Hypertension Society</td>
</tr>
<tr>
<td>CMA</td>
<td>Canadian Medical Association</td>
</tr>
<tr>
<td>CNA</td>
<td>Canadian Nurses Association</td>
</tr>
<tr>
<td>CPHA</td>
<td>Canadian Pharmacists Association</td>
</tr>
<tr>
<td>CPA</td>
<td>Canadian Physiotherapy Association</td>
</tr>
<tr>
<td>CSS</td>
<td>Canadian Psychological Association</td>
</tr>
<tr>
<td>DC</td>
<td>Dietitians of Canada</td>
</tr>
<tr>
<td>HC</td>
<td>Health Canada</td>
</tr>
<tr>
<td>HSFC</td>
<td>Heart and Stroke Foundation of Canada</td>
</tr>
<tr>
<td>PMAC</td>
<td>Pharmaceutical Manufacturers Association of Canada</td>
</tr>
</tbody>
</table>

REFERENCES